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VOL. XXVI.
BULLETIN I.
FEBRUARY 18th 1948

## TABLE OF CONTENTS

United Kingdom : The Economic Position ..... PAGE 1
New Index of Industrial Production ..... 2
Aggregate Supply and Demand at end of 1948 ..... 9
Finance ..... 16
Retail Prices ..... 18
Wages ..... 19
External Trade in 1947 ..... 20
World Commodity Survey ..... 23
Output of Building and Civil Engineering Industries ..... 27
Statistical Tables ..... 29-33
Overseas : The Second Half of 1947 in the U.S.A. ..... 34

## THE ECONOMIC POSITION.

February 2nd, 1948.
During the past quarter the country has moved some distance towards the solution of the difficulties in which it finds itself. The higher output of coal since the modification of the five-day week and the hitherto mild winter have combined to ensure a satisfactory level of coal stocks, and a modest beginning of coal exports has now become possible. For the same reasons, together with the staggering of hours of work, interruptions of electricity supplies have been relatively infrequent. The cut in the capital construction programme, regrettable in itself, will appreciably reduce the strain on the economy, and with this and the accelerated rate of release of men from the forces there are signs that (in some industries at least) difficulties due to shortage of labour will become less acute. The chief materials shortage is now in steel, stocks of which are falling and the output of which, having fully recovered from the dislocation of last spring, can in future rise only gradually.

There are also appearing signs of some slackening of inflationary pressure, at least in the consumption goods sector. It is hoped that, with the recent increases in taxation, and the continued fall in government expenditure on the armed forces and overseas commitments, a genuine budget surplus is now beginning to emerge, sufficient to obviate the need for renewed credit expansion as the sale of
assets and borrowing abroad gradually diminish.
While, however, the internal position shows some signs of improvement, the external position of the country remains extremely dangerous. The visible adverse balance of trade fell from $£_{2} 200 \mathrm{Mn}$. in the third quarter of 1947 to $£ 120 \mathrm{Mn}$. in the fourth, but this was due mainly to a fall in imports. The volume of exports continues to rise extremely slowly, and for the quarter was still only $17 \%$ above the 1938 level. With the approaching end of the sellers' market abroad in many types of consumption goods and the slow rise in the output of some of our more readily saleable products, the task of reaching the 1948 export targets, and of restoring our own balance of payments to equilibrium, will be great indeed. In addition, we are providing substantial amounts of gold and dollars to finance the repayments of sterling balances held by other countries, so that, whereas our own deficit was probably running below $£ 500 \mathrm{Mn}$. a year in the last quarter, we were losing gold and dollars at the rate of nearly $£ 700 \mathrm{Mn}$. a year. At this rate, our last reserves would be exhausted well before the end of 1948. Even if the present very high rate of withdrawals from overseasowned sterling balances can be greatly reduced, it is difficult to see how a permanent equilibrium in our balance of payments can be reached and maintained except as part of a great and general expansion in the level of world trade.

# NEW INDEX OF INDUSTRIAL PRODUCTION 

By C. F. Carter, W. B. Reddaway, J. R. N. Stone and F. Winter

The student of trends in economic activity has been much better off since the war than he was before it in two respects: there has been a much more plentiful supply of information on particular commodities, appearing at frequent intervals ; and there has been an annual White Paper on the national income. There has, however, been a decided lack of information appearing at relatively short intervals which would provide him with a comprehensive view of movements in activity covering either the whole economy, or a large section of it. In addition, whilst the series on particular items have largely been in quantitative terms, the comprehensive information in the national income White Paper has for the most part been given only in terms of value, without any adjustment for price changes.

This article presents a new set of index numbers which, it is hoped, will serve to fill part of the gap in both respects, by giving monthly information about the volume of industrial production, covering both industry as a whole and the major industrial groups.

Scope of the Index.-There is, of course, no special merit in covering that particular section of economic activity which is covered by the phrase "industrial production ". The choice of this field has been dictated largely by expediency, since it is the most clearly defined one for which adequate short-period information is available. For certain other parts of the field (e.g., many kinds of agriculture) the concept of a monthly index of production is almost impossible; for other sections of the economic field there are partial indicators, such as the railway returns, but it seemed best, as a first step, to produce an index covering the relatively clear-cut field of " industrial production ". At a later date it may be possible to produce an index with a wider coverage, extending over other fields of economic activity.

Even within the field of what would ordinarily be classed as industrial production, it was necessary to eliminate certain parts for lack of adequate information. The most important of these were the production of finished munitions, construction work done by public utilities for themselves, road work, the supply of water, and all repair work other than ship-repairing. The index presented here may therefore most simply be thought of as covering the same field as the pre-war Censuses of Production, with these
omissions. On the whole, the field which remains does represent something which it is useful to study, though it is most important to remember that the production of finished munitions has been excluded.

A separate paper describing fully the construction of the index will be included among the publications of the Department of Applied Economics, Cambridge, and will deal, inter alia, with the question of scope in more detail than is possible here.

Nature of the Index.-There are two distinct things which it might be useful for an index of industrial production to measure. The distinction may be seen most clearly by considering first a single industry, for which it might be useful to measure either the quantity of goods emerging from the industry in completed form, or the amount of production which was done in the industry, including any change in work in progress. Thus, if we were considering the building of houses, the first measure would relate to the number of houses completed in the period, whilst the second would measure the amount of work done in the period, covering any change in work in progress (positive or negative) as well as the number completed.

When we consider industry as a whole, there is no great difficulty in aggregating the results for the separate industries if they have been recorded on the second basis. Where a product passes through more than one industry during the process of its manufacture, each stage will be given a weight based on the "net output" or "value added" at that stage, and the results for the different industries can be aggregated to reflect the total production of the goods.

When, however, the first basis is used, the logical concept to apply to industry as a whole is that of the deliveries of goods to people outside the field to which the index relates, all transfers between industries being ignored; broadly speaking, this means deliveries of completely finished goods, together with any exports of raw materials or semi-manufactures, and each item should be weighted by its gross value (less the value of imported materials) so as to reflect all stages of production. It is clearly not possible to arrive at this sort of aggregate by combining information obtained from the separate industries, if this relates to their total deliveries to users of all kinds.

There can be little doubt, therefore, that the
natural first choice is for an index on the second basis. Unfortunately, however, the data which are available for individual industries nearly always relate to their deliveries of goods, without covering any change in their work in progress. Consequently it is not possible to construct index numbers for the individual industries on this basis, even though it would be possible to combine such index numbers if they were available.

The result of this impasse is almost inevitably that the index numbers for individual industries reflect their deliveries of goods which are completed so far as that stage is concerned, and that these are combined on the "net output" principle. The result is to produce an index for industry as a whole which is a sort of cross between an index of "work done in the period "" and one of "goods emerging in the period". It reflects the rate at which goods are passing certain landmarks on the route towards completion, including the finishing point, but it ignores the fact that a period may close with a much greater (or smaller) quantity of goods almost at the end of some of these stages. Thus, in the case of houses, it takes account of the number of bricks, etc., produced in the period, whether or not a corresponding number is emerging in the period as finished houses, and also of the number of houses completed, weighting the latter by the value added in the building process; it ignores any work done on the building site in adding to the stock of halffinished houses, but takes account of the work done in making the bricks.

In industries where the period of production is relatively short this problem is not serious, but for others (e.g., building, engineering) it is of real significance when there is a marked trend in output, as there has been since the war. For two of these industries-building and ship-building-it has been possible to compute alternative index numbers which broadly reflect work done instead of completions. These are shown separately in the table, together with an alternative calculation of the total index. The result is to show a slightly slower rate of growth during the period covered; if it were possible to put all the series (notably engineering and vehicles) on to a " work done" basis the rise in output would be shown as even less steep. If, on the other hand, it were possible to construct a true index of goods emerging from the industrial system-a concept of considerable importancethe rise would be steeper than that shown in the table.

Principles of Construction.-The principle on
which the new index numbers have been compiled is to consider each industry separately, as they were defined for the 1935 Census of Production, and to select one or more indicators of changes in the volume of its output as compared with the level in 1946, which was chosen as the base year. To combine the movements for the different industries it was necessary also to estimate the value of the net output of the industry in 1946 (modified as explained below) which would serve as the weight. The industries were arranged in groups for the calculation of subsidiary index numbers which were thought likely to be useful.

Apart from the omissions mentioned above (notably finished munitions, water supply, and construction work by utilities) it was found necessary to omit only two or three very minor trades on the ground that no indicator was available which was "better than nothing "i.e., because no series could be found which was likely to give a better indication of changes in the volume of these industries' output than one would obtain by assuming it to move with the total output of all industry.

The Nature of the Indicators used.-A list of the indicators used for each group is given below ; for reasons of space they cannot be fully described, but this will be done in the separate publication mentioned above. Altogether some 250 basic series were used for the index.

The type of indicator which is normally preferred, and which covers $63 \%$ of the weight, is a record of the physical quantities of the various goods produced by the industry, and this is the type which has been used in the majority of cases for the new index. Such an indicator does, however, suffer from certain defects, especially where the industry is one which produces either a large number of different products or a large number of grades or types of a single product. Where there is a large number of different products the work involved in compiling the index becomes very heavy if all of them are used, and it is sometimes necessary to make a selection (which may not prove truly representative), or to add together the figures for different products; where the latter procedure is followed, or where the original figures relate to goods of very varying qualities, the result will be deceptive if there is any trend towards a greater proportion of the more (or less) valuable types or towards the resumption of production of goods not made during the war. This kind of trend is particularly likely in a period such as the years following a war.

In certain cases (e.g., furniture) it was possible to make some allowance for the changing proportions of high-grade types even though the original published series did not record these differences ; in other cases (e.g., cotton yarn and motor vehicles) the danger was at least partly avoided by taking separate series for the main groups of types, rather than a single total.

A second type of indicator consists of the value of the goods produced by the industry in the period. This usually covers the whole output of the industry and gets over the difficulty of heterogeneity, but calls for a price correction to give a volume series. This kind of indicator has been used in a number of cases, covering $12 \%$ of the total weight, and although the information on price movements is usually very sketchy, it is likely to give much better results for the industries in question than would be obtained by any other method. In many cases the movement in the value of production is clearly far greater than the movement in prices, so that firm information is available for the more important factor; the danger of error only becomes serious if comparisons are made over a long period.

A third type of indicator is the quantity of some important materials consumed in the industry, used to cover $14 \%$ of the weights. Clearly this is, strictly speaking, a measure of input rather than of output ; but in cases where the period of production is short the difference is not of great importance, though it might temporarily become significant if the production period were changed considerably. A more serious objection arises in cases where the series used is not the quantity of materials consumed by the industry in the period, but rather the quantity delivered to it, since changes in its stock may be significant, especially in a monthly index. Here again, however, the error involved is not one which can accumulate indefinitely, but there is likely to be an upward bias at some period as stocks rise from their present low level.

In a few cases it was necessary to use figures which were presumed to move broadly with the quantity of materials delivered to the industry, though in fact they related to the total supply becoming available for all users in the country. This applied, for example, to the quantity of printing and writing paper (other than newsprint) becoming available for home use, which was used as an indicator for the general printing and manufactured stationery trades combined. Similarly, a series for total disposals of maize was used as an indicator of the amount of maize used by the grain-milling trade; figures for the
amount milled are not published, but a study of the available statistics shows that it must move more closely with the total supply of maize than with the amount of wheat milled, which would be the implied assumption if the whole weight for the trade were given to wheat milling.

The only other general category of indicator used was that of the number of people employed in the industry. It would clearly be unsatisfactory if an index of production were found to be based largely on employment series, but for small industries where there is no satisfactory measure of output or input it is better to use employment rather than to leave them out. In the result, $11 \%$ of the total weight of the index is represented by employment series.

Consideration will be given later to the possibility of introducing an allowance for changes in productivity, based on the results for other industries and for changes in the average number of hours actually worked per week.

Weighting. - As between industries, the weights needed for the index were the net outputs in 1946. As no results for the partial Census of Production taken in that year have yet been published it was necessary in all cases to estimate them by other means. We are, of course, only concerned with the ratios of the net outputs in different trades, and even these do not need to be very accurate.

For a number of industries-e.g., electricity and coal-information collected by other agencies has been published for a recent year, from which it is possible to make a direct calculation of the net output in 1946 on a definition similar to that used by the Census. For building the figures of gross output given in the national income White Paper provided a basis from which net output could be estimated for the various sections.

In general, however, the procedure was to start from the net output in 1935, and to estimate the net output in 1946 by one of two methods.

The first was to take the percentage movement between 1935 and 1946 in the total annual wages bill for a closely corresponding industry, on the Ministry of Labour definition, as deduced from the earnings enquiries and the numbers employed; wages represent a large constituent of net output and one which tends to be a fairly stable proportion of the whole, so that this percentage movement gave a reasonable multiplier to apply to the net output in 1935.

The second method was to use an indicator of the percentage movement in the quantity produced and in the average price, so as to obtain
the movement in the gross output of the industry between 1935 and 1946. This factor was then assumed to apply also to the net output.

Two adjustments were needed to the net output of certain industries as computed by the first of these methods. Firstly, in industries where repair work or the production of finished munitions in 1946 was substantial, a deduction had to be made on this account. Secondly, in industries where a substantial part of the work done in 1946 represented an increase in work in progress, a deduction had to be made for this part, as the indicator to be used reflects deliveries of completed products; if the 1946 net output were left on a basis corresponding to work done, the weight of that industry in later years would be far too high, as the indicator would show a substantial rise.

One special point should be mentioned in connection with this last problem : the building group has a higher weight for the B index, based on work done, than it does for the A index, based on completions. For shipbuilding the change in the amount of work in progress during the year was not great enough to justify the complication of a different weight. Where more than one indicator was used for the output of a single industry, it was necessary to split up the weight for the whole industry between the various series. Sometimes this was done by assessing the relative values of the quantities produced in 1946 (e.g., by multiplying them by estimated prices or average export values) ; in other cases the 1935 proportions were used. The greatest difficulty arose in cases where the available indicators really covered only a part of the output of the industry. In principle, the correct procedure was to consider whether the remaining products of the industry would be more likely to move with any one of the available series rather than with the others, and to spread their weight accordingly. With a number of industries which do repair work as well as new construction it seemed clear that the repair work was unlikely to move with any of the construction series, and this part of the weight was therefore omitted as described above. In the case of chemicals it seemed most unsatisfactory to regard the output of drugs and medicines as moving with any of the available series, which related essentially to heavy chemicals, and an estimated series was inserted to carry the weight of this group ; it was assumed that the output would be relatively stable with a slight upward trend.

The detailed weights and the way in which they were arrived at will be described in much more detail in the separate paper mentioned
above. The weight for each group is given in the table.

The Effect of using 1946 as a Base Year.-The choice of 1946 as the base year for the index was rendered almost inevitable by the nature of the data, as it is not possible to produce comparable figures for any pre-war year. As it may seem a rather unsatisfactory year to take as base, in view of its " transitional " nature, it is desirable to consider the consequences of using it.

The index may be thought of as being constructed by multiplying the quantities of various articles produced in each period by their average "price" ${ }^{\star}$ in the base year, and then adding up the products. We then record the movements of this total from period to period, and these proportionate movements will be altered as a result of using a different base year only if the ratios of these "prices" to one another are different. If they are the same, then the index will show the same proportionate movement between any two periods, even though some industries may have had a very high output in 1946 relatively to pre-war and others a very low one.

In so far as the ratios of the "prices" of different products were different in 1946 from those which prevailed before the war, it seems at least as justifiable to use the 1946 values as to use the pre-war ones. Thus the pre-war figures for textiles were extremely low, reflecting both low wages and low profits, and it seems more likely that something like the post-war relationships will continue, rather than that there should be a reversion to the pre-war position.

What does have to be borne in mind as a result of using 1946 as base, however, is that the output of certain industries, such as textiles and the building group, was depressed in that year because of their wartime contraction, so that we should expect the index numbers for such groups to show a substantial rise in the future. Little is to be gained by comparing the relative levels of the index numbers for the different groups in any particular month when the base year is an unrepresentative one like 1946.

There remains the separate question of attempting to include some pre-war years in the series. It is clear that this cannot be done exactly, since many of the series used for the index are not available in that form for pre-war years. It should, however, be possible to make

[^0]an estimate of the movement between 1946 and some pre-war years, though only on an approximate basis. This has not yet been attempted, but if it is successful the figures will be included in later Bulletins.

Shorter Notes.-The index will, as noted above, be described fully in a separate paper, but the following brief notes deal with some of the points involved.
(a) Time Periods.-The basic statistics are collected on numerous different bases; for the purpose of the index they have all in effect been reduced to weekly averages. In consequence, the index does not show a decline in February merely because February is a short month, as would happen with an index based on calendar months. In spreading the series which relate to longer periods than one month (which account for $10 \%$ of the total weight of the index) an attempt has been made to allow for the fact that some months in the period should be below the average because of holidays, and special allowance was also made for the fuel crisis in February, 1947.
(b) Seasonal Factors.-No attempt has been
made to adjust the series for seasonal factors. Quite apart from the advantage of starting with an index which reflects the actual rate of production in each month, the use of seasonal corrections based on either pre-war or war-time experience would be of little or no value under current conditions.
(c) Holidays.-As a particular case of the above, no adjustment has been made to take account of statutory or other holidays; the index reflects the rate at which goods were actually being produced in the month in question.
(d) Geographical Coverage.-In principle the index relates to the United Kingdom, but some of the series cover only Great Britain ; it is unlikely that the movements would be significantly different for the United Kingdom in these cases.
(e) Provisional Index Numbers.-Some of the data for any month become available earlier than others; provisional index numbers for a group have been calculated wherever there is sufficient information available to justify a reasonable estimate, and the same applies to the index

INDEX OF INDUSTRIAL PRODUCTION (Excluding Finished Munitions) 1946 average $=100$

| Period |  | Total Index |  |  |  |  | Ships |  |  |  |  |  |  | Building, etc. |  | $\begin{aligned} & \text { E } \\ & \text { E } \\ & 0 \\ & 0 \\ & 0 \end{aligned}$ |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | A | B |  |  |  | A | B |  |  |  |  |  | A | B |  |  |  |
| Weight... | $\ldots$ | 1000 | 1010 | 76 | 51 | 61 | 23 | 23 | 31 | 124 | 116 | 120 | 66 | 101 | 111 | 143 | 50 | 38 |
| Av. 1946 | $\ldots$ | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 |
| Av. 1947 | $\ldots$ | 109 | 108 | 106 | 108 | 101 | 98 | 96 | 120 | 124 | 108 | 100 | 96 | 121 | 111 | 103 | 105 | 117 |
| JAN. |  | 90 | 90 | 92 | 89 | 92 | 81 | 85 | 62 | 87 | 87 | 100 | 96 | 73 | 76 | 101 | 91 | 83 |
| FEB. | $\ldots$ | 94 | 96 | 97 | 96 | 98 | 134 | 127 | 79 | 90 | 92 | 99 | 99 | 75 | 90 | 103 | 94 | 88 |
| MAR. . | $\ldots$ | 95 | 97 | 101 | 95 | 103 | 93 | 107 | 79 | 87 | 93 | 98 | 100 | 81 | 90 | 106 | 95 | 101 |
| APR. . |  | 94 | 95 | 95 | 94 | 101 | 80 | 98 | 88 | 96 | 92 | 100 | 99 | 84 | 88 | 94 | 92 | 89 |
| MAY |  | 101 | 101 | 104 | 105 | 106 | 109 | 100 | 93 | -101 | 99 | 103 | 104 | 92 | 96 | 103 | 101 | 100 |
| JUNE |  | 97 | 97 | 96 | 97 | 97 | 103 | 101 | 112 | 100 | 98 | 97 | 97 | 93 | 94 | 94 | 93 | 105 |
| JULY |  | 97 | 97 | 96 | 99 | 95 | 72 | 78 | 85 | 93 | 100 | 98 | 103 | 108 | 106 | 90 | 101 | 95 |
| AUG. | $\ldots$ | 92 | 92 | 95 | 97 | 90 | 97 | 85 | 99 | 89 | 95 | 93 | 92 | 103 | 102 | 84 | 91 | 89 |
| SEPT. . |  | 106 | 106 | 105 | 108 | 102 | 130 | 123 | 119 | 102 | 108 | 99 | 104 | 117 | 115 | 99 | 101 | 117 |
| OCT. .. |  | 112 | 111 | 109 | 113 | 108 | 123 | 106 | 125 | 115 | 113 | 106 | 105 | 130 | 120 | 105 | 115 | 110 |
| NOV. ... | $\ldots$ | 113 | 113 | 111 | 112 | 109 | 73 | 95 | 128 | 120 | 116 | 107 | 106 | 128 | 117 | 109 | 119 | 116 |
| $\begin{aligned} & \text { DEC. } \\ & 1947 \end{aligned}$ | $\ldots$ | 107 | 106 | 97 | 95 | 99 | 111 | 102 | 133 | 120 | 107 | 97 | 97 | 118 | 107 | 108 | 108 | 111 |
| JAN. ... | . | 107 | 106 | 103 | 116 | 104 | 102 | 104 | 117 | 112 | 110 | 98 | 95 | 111 | 102 | 110 | 108 | 110 |
| FEB. . | $\ldots$ | 85 | 84 | 72 | 77 | 83 | 83 | 66 | 60 | 96 | 75 | 81 | 74 | 78 | 74 <br> 89 | 109 | 90 100 | 85 106 |
| MAR. | $\ldots$ | 104 | 103 | 100 | 95 | 93 | 89 | 95 | 100 | 128 | 107 | 97 98 | 91 94 | 96 113 | 89 107 | 109 100 | 100 105 | 106 120 |
| APR. |  | 104 | 104 | 102 | 103 | 102 | 80 | 97 | 133 | 105 | 104 | 98 103 | 94 99 | 113 122 | 107 113 | 100 99 | 105 113 | 120 |
| MAY |  | 108 | 107 | 109 | 108 | 103 | 77 | 83 | 142 | 111 | 109 | 103 104 | 99 102 | 122 | 1131 | 99 98 | 117 | 124 |
| JUNE. | $\ldots$ | 116 | 115 | 111 | 120 | 109 | 135 | 123 | 127 | 145 | 114 | 104 | 102 | 129 | 121 | 98 | 17 |  |
| JULY |  | 106 | 105 | 104 | 112 | 94 | 91 | 89 | 127 | ¢119 | 104 | 102 | 101 | 126 | 116 | 89 | 97 | 120 |
| AUG. |  | 102 | 101 | 104 | 103 | 95 | 93 | 88 | 108 | 116 | 98 | 98 | 90 | 122 | 114 | 88 | 104 | 105 125 |
| SEPT. |  | 116 | 115 | 113 | 117 | 108 | 102 | 101 | 133 | 139 | 117 | 104 | 103 | 132 | 121 | 100 108 | 109 | 125 |
| OCT. |  | 120 | 119 | 119 | 123 | 111 | 109 | 109 | 137 | 142 | 121 | 107 | 105 105 | 139 141 | 127 | 108 115 | 109 | 132 |
| $\begin{array}{ll}\text { NOV. } & . . \\ \text { DEC. } & . .\end{array}$ | $\ldots$ | 121 | 120 | 122 | 119 | 112 102 | 85 125 | 85 107 | 129 | 147 | 122 | 107 96 | 105 | 149 | 121 | 111 | 108 | 132 |

Figures in later months are subject to revision.
NO ГE.-In general the index is based on the quantity of goods delivered by an industry ('A' series); the ' $B$ ' indices use additional serios reflecting the changes in work in progress in house and shipbuilding. The composition of the trade groups is indicated by the list of series on p. 8.
number as a whole. It is inevitable that there will be some revisions on account of later information.

## Main Results for 1946/7.

Considerations of space forbid any attempt to examine more than a very few of the topics on which light is thrown by index-numbers of this kind. Two striking features may first be briefly noted: the marked drop in output caused -by holidays in August (and to a lesser extent December), and the still more marked drop caused by the fuel crisis and the severe weather in February, 1947. The fall in February applied to every index except that for fuel and power. The combined index, however, fell only to 85, and the main impression created by the figures is probably that the fall in output was less catastrophic than many people imagined at the time, and the recovery remarkably rapid. Other sectors of the economy, such as services, were doubtless even less affected.

The most important feature of the statistics is, however, the rising trend shown by the combined index and most of the components. For the A index (deliveries) it is likely that 1947 will show a rise of $9 \%$ over 1946, and the last six months for which full figures are available (JuneNovember) show an increase of some $10 \%$ over the corresponding period in 1946, and one of about $19 \%$ over the first half of 1946 . The last comparison, which is broadly fair so far as holidays are concerned, implies that there has been a rise of about $1 \%$ per month during the period for which the index has been running.

These figures call for much more extended analysis than is possible here. One reminder is perhaps justified: the index omits both the finishing stages of munitions production and any changes in work in progress, and over this period both these omissions have made for a swifter rise. For many purposes, however, the volume of civilian goods emerging from industry is a more significant concept than the total amount of work done in the period; as explained above, a true index of such " final deliveries" would show an even steeper rise than the A series.

It is extremely difficult to compare the rise in output with the rise in the number of people engaged in producing it, but the subject is so important that a rough attempt has been made on the following lines for the index as a whole. The starting point on the labour side is the official estimate of the total number of people at work in manufactures, mining, building, etc., and gas, water and electricity. This is wider
than the scope of our index, because it includes munitions, repair work, etc., and in a comparison between 1946 and 1947 allowance must clearly be made for the changing proportion of people in these sectors. A rough estimate was therefore made of how many of the workers recorded as engaged on manufacturing work for the Forces should be deducted in each period, and similarly for those in building and civil engineering.

A further difficulty arises over the number of workers to include for February, 1947, as no official estimates of employment are available. From some points of view it might seem better to include all the workers " available "-e.g., if we want to measure our progress under a semiplanned economy-but in that case some credit should be taken for the smaller number of people unemployed in most other months. For other purposes it is in any case desirable to compare the movement in output with that in the number actually at work, and an estimate of this figure was therefore made for February.

The result for this calculation was to show the percentage rise between 1946 and 1947 in the average numbers employed in the field covered by the index as almost identical with the rise shown by the A series. The margin of error is far too great to justify any stress being placed on the exactness of the coincidence, but it is unlikely that the difference (if any) is significant. It is not possible to consider here the conflicting factors which have led to this result-e.g., the indirect effects of the fuel crisis, the shorter hours worked, the reduced amount of effort going into work-in-progress, the increased proportion of men in the labour force, shifts between industries, material difficulties, etc.

A similar comparison between June November, 1947, and the corresponding period of 1946 showed output as having risen about $2 \%$ more than the "corresponding" numbers employed : the adjustments for munitions work, etc., are of less importance in this case, and there is no " fuel crisis" problem, but even so, the margin of error is too great to justify any more definite statement than that output probably rose a little more than employment. A comparison between the first and last six months for which the index is available produced a similar result, but the margin of error is particularly great when it is necessary to eliminate the more substantial proportion of workers who were on munitions in the first half of 1946.

Contrasts between Component Series.-It is interesting to compare the differing rates at which the component indices have been rising,

If we measure this by the percentage rise between the averages for the first and last six months for which the indices are available, then the following show movements which are very different from the average ( $19 \%$ ) :-

| Large Increases |  | Small Increases |
| :---: | :---: | :---: |
| Building, ete., A series | 58\% | Shipbuilding, A series. |
| B series | 36\% | Chemicals, etc. |
| Motors, ete. | 48\% | Food, drink, tobacco |
| Machinery, etc. | 44\% | Metal production |
| Sundry Trades | 31\% |  |

Fuel and power has been omitted from the list, because the seasonal drop in gas and electricity in the summer makes this particular comparison unsuitable ; it would, however, show a relatively small increase on any reasonable basis. The only other series for which the seasonal factor is of real importance under present conditions is the building, etc., group, which is flattered by this particular comparison.

It is interesting to contrast the small rise in metal production with the much bigger ones for all the metal-using trades (except shipbuilding). A partial explanation is the exclusion of both munitions and work-in-progress from the latter, but in the first half of 1946 a much larger proportion of our steel output was being exported, and the supply position was altogether "easier ".

List of Series Used.
The series used for each group index are shown below, classified into four main types: quantities produced, value of output (deflated), input series, and employment. A series is classed under "input" if it is meant to reflect the materials used in a certain trade, even if, in fact, it has a somewhat different basis (e.g., total supply). The series will be fully described in the separate paper mentioned in the text ; all the employment series relate to industries as defined by the Ministry of Labour, except that for industrial building.

Textile Group.
Quantities produced.-Single cotton yarn (3 groups) ; doubled cotton yarn; woven cotton fabrics; worsted yarn; woven wool fabrics; carpets and rugs ; rayon (a) continuous filament, (b) staple fibre ; woven rayon fabrics ; knitted garments (2 groups).

Input Series.-Raw silk ; flax ; jute ; hemp.
Employment.-Lace; "other textiles."
Clothing, Leather and Footwear Group.
Quantities produced.-Non-rubber footwear (2 groups) ; finished leather (a) heavy, (b) light.

Value of output, deflated.-Leather goods.
Input Series.-Cloth for civilian clothing (a) wool, (b) other.

Employment.-Hats and Caps; " Other dress industries."

Metal Production Group.
Quantities produced.-Iron ore; pig iron; steel ingots and castings; finished steel (net deliveries); copper intermediate products (a) alloyed, (b) other ; virgin aluminium; aluminium intermediates; tin metal (total disposals).

Input Series.-Refined lead ; virgin zinc.
Shipbuilding and Ship-repairing Group.
Index (A) covers vessels completed and an assumed figure for repairs.

Index (B) also includes vessels laid down, so as to give some weight to changes in work in progress.

Motors, Cycles and Aircraft Group.
Quantities produced.-Cars ( 2 size groups); goods vehicles ( 2 size groups); public service vehicles; motor cycles ; pedal cycles; aircraft for export or home civilian use (index of structure weight).

## Industrial Machinery Group.

Quantities produced.-Main line locomotives; coal cutters ; coal conveyors; earth-moving machinery (2 types); turbines; turboalternators ; railway coaches ; railway wagons.

Value of Output, deflated.-About 20 major types of machinery (all added).

Other Metal-using Group.
Quantities produced.-Iron castings; metal windows and doors; gas meters; radio sets and components ; electric meters ; domestic electric appliances ( 6 series) ; electric lamps; dry batteries; prams and folders; table cutlery, spoons, forks; watches and clocks; hulls for temporary houses, aluminium and other.

Value of output, deflated.-Accumulators; wires and cables ; jewellery ; goldsmiths' and silversmiths' wares.

Input Series.-Deliveries of intermediate products of brass, etc.

Employment.-Bolts, nuts, etc. ; " other metal industries "; scientific instruments, etc.

Food, Drink and Tobacco Group.
Quantities produced.-Biscuits; cocoa; chocolate and sugar confectionery (8 groups) ; jam and marmalade ; bacon and ham ; butter; cheese ; condensed milk; milk powder; margarine; beet sugar; breakfast cereals; soft drinks; cider; British wines; beer (bulk barrels); spirits (a) total distilled, (b) potable spirits delivered.

Input Series.-Wheat milled; maize; flour for food in U.K. ; unmanufactured tobacco ; oilcake and meal (to "reflect" manufacture of cattle food, etc.) ; unrefined sugar ; fish landed (to "reflect" fish curing).

Employment.-Bread, biscuits, cakes, etc.

Chemical and Allied Trades Group
Quantities produced.-Alkalis; chlorine; hydrochloric acid ; sulphuric acid; copper sulphate; finished dyestuffs; coal tar distilled; salt; superphosphate; compound fertilisers; nitrogenous fertilisers; industrial explosives ; soap (a) toilet, (b) other; starch; drugs and medicines (assumed series); wax polishes; matches.

Value of output, deflated.-Toilet preparations.
Input Series.-Oilseeds, etc., crushed; wax for candles.

Employment.-Paint, varnish, etc.
Building, etc., Group.
Quantities produced-Index A: Houses completed (a) permanent, (b) temporary; wardestroyed houses rebuilt; conversions to flats, etc.; war-damaged houses repaired; bricks; clay roofing tiles; glass; w.c. pans; stoneware pipes; wall and floor tiles; cement; roofing slates; softwood; hardwood; utility furniture ; mattresses.
Index $B$ gives some weight to changes in uncompleted work by including: Houses begun (3 series) ; site developed for local authorities.

Input Series.-Timber consumed (a) hard, (b) soft-to reflect sawmilling, machined woodwork, etc.

Employment.-Cast stone, etc.; stone quarries ; clay, sand, and gravel pits; labour force on building work for industry and agriculture.

Fubl and Power Group.
Quantities produced. - Coal ; metallurgical coke; gas (at gasworks) ; electricity; refined petroleum.

Paper and Printing Group.
Quantities produced.-Newsprint ; other paper and board.

Input Series.-Newsprint ; other printing and writing paper.

Employment.-Wallpaper ; cardboard boxes.
Sundry Trades Group.
Quantities produced. - Glass containers ; domestic pottery (a) for export, (b) other; rubber footwear ( 2 groups) ; plastic materials (4 types) ; linoleum ; felt base ; brushes; golf and tennis balls; footballs; racquets and cricket bats; incandescent mantles; British films (3 categories).

Value of output, deflated.-Domestic and fancy glassware ; toys and games.

Input Series.-Plastic materials (4 types); rubber for tyres ( 2 series) ; rubber for belting.
Employment.-Wood boxes; " other woodworking " ; stationery requisites ; musical instruments.

# AGGREGATE SUPPLY AND DEMAND AT THE END OF 1948. 

by J. E. Meade and F. W. Paish

## I Introduction

The purpose of this article is to consider the total demands which are likely to be made in the future upon the community's resources and to compare them with the total resources at the disposal of the community for the satisfaction of those demands. All our estimates are, of course, extremely tentative. Not only is it in the nature of things that any forecasts of this kind should be hypothetical ; but, in the present fluid condition of economic affairs, to make any such forecasts without access to detailed governmental programmes and plans is a bold and perhaps rash undertaking. Nevertheless, the Government has already published enough of its main intentions in the economic field to make it possible to paint a broad picture of total resources and total demands on resources some little time ahead.

We have chosen to examine the probable position at the end of the year 1948. This is a con-
venient, and, in many ways significant date, as very great changes in the structure of the United Kingdom economy are planned ta be made and completed in the course of this year. The outstanding change is, of course, to bring the balance of current payments into equilibrium by that date, and in this sense we may hope to have reached by then a new post-war norm. In 1946 the excess of imports over exports (visible and invisible) was some $£ 400 \mathrm{Mn}$. In 1947, it was considerably larger than this, perhaps $£ 600 \mathrm{Mn}$. To have closed this gap by the end of 1948 will, therefore, mean that by that time we shall be living in a community which, if its total production has not increased, will have some $£ 600 \mathrm{Mn}$. less goods and services a year to use at home than it had on the average during 1947. We shall be exporting more, or importing less, to this extent.

But this does not mean that our 1947 standards of personal consumption will have to be reduced
by the whole of this amount.* The year 1947 was the year of the fuel crisis which led to unemploymęnt, bottlenecks, shortages of stocks and inefficiencies in industry. We may for this reason, if for no other, hope to be producing more by the end of 1948 than during 1947. We shall have a somewhat larger cake to divide. Moreover, there are two other demands on the national cake which are likely to be significantly reduced in the course of the year : the investment programme is to be ruthlessly pruned; and, presumably, government expenditure on goods and services will be substantially reduced as further reductions occur in defence expenditure. Our first main task is to enquire to what extent the reduced demands on resources under these two heads, together with the probable increase in the national product, are likely to balance the increased demand upon resources for the balance of payments. Will there remain a gap which must fall on personal consumption?

So much for the question of our real resources and their disposal among personal consumption, government consumption, home investment and the balance of payments. There remains a financial problem of great significance. By the end of 1948, when these important re-adjustments have been made, what will be the balance between money demand and the real supply of goods and services available for consumption ? Will there still be " too much money chasing too few goods"? Will the inflationary pressure of demand be greater or less than it is at present?

This monetary problem is, of course, intimately connected with the real problem discussed above. The closing of the balance of payments gap, as it will pro tanto reduce the supply of goods and services on the internal market without doing anything to reduce internal demand, will exert a very significant inflationary influence. On the other hand, the reduction in the government demand for goods and services will relieve the inflationary pressure-provided, of course, that it is not accompanied by a reduction in taxation which would swell private demand as quickly as government demand was reduced. The cut in the capital investment programmes, in so far as it will involve a more stringent use of direct controls-such as building licensing-to reduce the amount of bricks and mortar, plant and machinery which private investors may purchase, will entail an increased inflationary pressure in the markets for such capital goods ;

[^1]there will be a reduced supply of capital goods to meet the available capital funds. But in so far as such action releases labour and other resources which will be available to produce goods for export or home consumption, the inflationary pressure in consumption markets will be correspondingly relieved.

On the other hand, an increase in productivity and so in the real national income, which is the most effective and desirable way of meeting the problem of real scarcities, is of somewhat less importance from the point of view of the inflationary pressure. Increased production raises real incomes as well as supplies. In so far as the increased incomes lead to an increased willingness to save or, through increased tax payments, to a larger budget surplus, the inflationary pressure will be relieved. But for the rest, the increased supplies are matched by an equal increase in spendable purchasing power.

The extent, if any, of the total inflationary pressure is, however, unlike the problem of real scarcities, greatly affected by the future level of tax rates. High rates of taxation combined with reduced government expenditure will suck monetary purchasing power out of the hands of private purchasers without replacing it with government purchases. We have assumed in this article, purely for the purpose of defining the issues, that public revenue at the end of 1948 exceeds current public expenditure by $£ 400 \mathrm{Mn}$. a year; and we have proceeded to enquire what would be the balance between the supplies of goods and services available for personal consumption, on the one hand, and, on the other hand, the private incomes available either for expenditure on consumption or for saving, after the payment of taxes on the scale necessary to produce this surplus in the public budget. $\dagger$ We have con-

[^2]sidered how great a proportion of such incomes private persons would have to save voluntarily in such circumstances if inflationary expenditure was to be avoided and how much they may in fact wish to save. This we have done as a means of clarifying the main issue: how far, if at all, such voluntary private savings must be supplemented by still heavier taxation and a still greater surplus in the public budget in order to avoid the continuation of inflationary pressures.

We have analysed the issues involved by means of tables of National Income and National Expenditure of the kind now made familiar by the publication of a White Paper at the time of each April budget. (Cf. Cmd. 7099.) We have constructed four such tables. $\dagger$ Table 1 shows the value of the total national product which we may hope to be producing at the end of 1948 ; it sets against this the claims which are likely to be made on this product for the carrying out of the announced investment programme and for a probable level of governmental activity ; and it thus shows by difference the value of the goods and services which will be left over for personal consumption if these demands are satisfied and the balance of payments on current account is balanced. Table 2 shows the amount of funds which private persons and businesses are likely to receive and to have available for payment of taxes, for saving and for consumption. Thus, for the end of 1948 it shows how much the private section of the economy will have to save per annum if (i) it purchases no more goods and services for personal consumption than the amount which Table 1 suggests will be available from current production after satisfying government requirements, fulfilling the investment programme, and balancing the balance of payments, and (ii) taxation is levied on a scale sufficient to produce our illustrative surplus of $£ 400 \mathrm{Mn}$. in the public budget. Table 3 shows the public revenue and expenditure and makes some attempt to isolate the main items of revenue and expenditure which may be regarded as clearly

[^3]having the nature of capital transactions. Table 4 summarizes the national investment in domestic and foreign capital formation and the finance of this sum by personal, business and governmental savings.

We have in all the Tables, in addition to the figures for the end of 1948, given comparative figures for 1938, 1946 and 1947. We are conscious of our extreme rashness in publishing our private estimates for 1947, when, presumably, official estimates for 1947 will be published a few weeks after the appearance of this article. But however accurate or inaccurate our private estimates for 1947 may prove to be we hope that they will not be so wildly wrong as to distort the general picture. In any case, we felt that we could not honestly or intelligently discuss the end-1948 problems without disclosing our hand on 1947.

## II. The National Product and Its Use

Our first question is to consider the size of the national product at the end of 1948 and to see how much will be left over to satisfy personal consumption after fulfilling the requirements of government consumption, the investment programme and the restoration of equilibrium to the balance of payments.

The National Product is measured by the national income on the right-hand side of Table I, as this measures the value of the goods and services which the community's land, labour and capital will be producing. In reaching the figure given in this Table for the end of 1948 we have not assumed any marked change in the volume of employment ; but (consistently with our estimate for the level of government expenditure at the end of 1948) we have assumed some further transfer of manpower from the Armed Forces to industry and some increase in the proportion of male to female labour. These changes account for some slight increase in the real national product between 1947 and the end of 1948.

Apart from this there are two main factors which account for the assumed increase of $£_{1}, 000 \mathrm{Mn}$. in the value of the net national product between 1947 and end-1948. First, we have assumed some 5\% increase in the productivity of labour. Apart from the larger proportion of male labour, already noted, there will be other factors likely to raise productivity. In particular, 1947 was a year of fuel crisis and of many essential stock shortages and bottlenecks, largely resulting from that crisis. Output per man ought to be some $3 \%$ better than in 1947 on this account alone, if we can avoid-as seems on the whole probable
-similar trouble in the future. Moreover, there has already been some increase in hours of work; and we may assume that the investment expenditures which were in the process of being carried out in 1947 will have resulted in a helpful addition to our capital equipment (including an increased supply of dwelling houses) by the end of 1948.* Secondly, there has already been an appreciable rise in money wage-rates above the average level for 1947. We are assuming that, in addition to a $5 \%$ increase in real productivity, there is also a $5 \%$ rise in the factor prices of goods and services as a result of the continued upward movement of wage-rates and prices of imported

[^4]goods. These two items, a $5 \%$ increase in output per man year and a $5 \%$ rise in the level of prices (before imposition of indirect taxes or payment of subsidies), account for practically the whole of the assumed rise in the net national income between 1947 and end-1948.

Our figure of $£ 1,850 \mathrm{Mn}$. for the annual rate of Government Consumption of Goods and Services at the end of 1948 is based upon the assumption that Armed Forces of some 750,000 men are maintained. We have allowed for a decrease in our dollar expenditure for Germany and for increased expenditure on the national health scheme, etc. We have allowed also for the assumed rise of prices of $5 \%$.

The figure of $£ 750 \mathrm{Mn}$. for Net Capital Formation at Home by the end of 1948 needs some comment. From Table 4 it will be seen

TABLE I.
SOURCES AND DISTRIBUTION OF NATIONAL INCOME (£Mn.).


TABLE 2.
PRIVATE RECEIPTS AND OUTLAY ( $£ \mathrm{Mn}$.).


* Annual rate.
that this is made up of Gross Capital Formation of $£ 1,450 \mathrm{Mn}$. less Depreciation and Maintenance of $£ 700 \mathrm{Mn}$. The Gross figure corresponds with $£ 1,320 \mathrm{Mn}$. given in Cmd. 7268 for the end of 1948 for gross investment in fixed capital. We have merely added a small sum to allow for certain expenses connected with investment and perhaps for some small net increase in stocks, neither of which items are included in the above White Paper, and have adjusted the result to allow for our assumed rise in prices. After allowance for this price change, the real gross figure for end1948 is not very different from the figure for 1946, but it is three or four hundred millions lower than the probable 1947 performance in this field. These movements require some explanation. Though in its claim on real resources the investment programme at end-1948 will be about that of 1946 , in its immediate usefulness to the com-
munity it is likely to be considerably greater, since 1946 was a year when many new projects were being started, whereas by end-1948 the new plants and buildings, etc., will, in many cases, be completed. A considerable part of the fall in real gross investment between 1947 and end-1948 may be explained by the fact that stock-building will be less necessary at end-1948 than it was during 1947.

Nevertheless, the cuts on the investment programme for end-1948 are very severe. The full severity can be appreciated only after translating the gross figures into true net figures after making adequate allowance for depreciation. The figure of $£ 700 \mathrm{Mn}$. for depreciation and maintenance at end-1948 is based upon current income-tax allowances, which in turn are based upon the original cost of the depreciating assets. The figure is, in fact, altogether too low to represent the true value

TABLE 3.
REVENUE AND EXPENDITURE OF PUBLIC AUTHORITIES (£Mn.).


TABLE 4.
NATIONAL SAVING̣S AND INVESTMENT (£Mn.).
SAVINGS.


* Annual rate.
of depreciation of capital assets at current prices. A figure which really represented the value of that part of gross capital formation necessary to maintain existing real assets intact might well be of the order of $£ 1,000 \mathrm{Mn}$. Thus it can be seen that a more accurate figure for net capital formation might be only about $£ 450 \mathrm{Mn}$. as compared with the pre-war figure of $£ 320 \mathrm{Mn}$., which-if the price of capital goods be taken now as more than twice as high as pre-war-would mean that our net additions to real capital at the end of 1948 would be barely two-thirds the pre-war level. At this rate it might take us some years to restore the deficiencies in the domestic capital equipment of the country, due to the ravages and competing demands of the war, even after allowance has been made for the increases in the capital equipment of industry due to Governmental improvements in industrial equipment for war-time purposes.* This is, of course, quite apart from our loss of external capital assets. The cut in the investment programme is thus seen to be an exceedingly drastic one.

As has been indicated above, it is assumed that the gap in our balance of payments on current account will have been closed by the end of 1948, which means that Net Foreign Investment will be nil. For our present purpose of estimating the total strain on our domestic resources it is irrelevant thăt this figure may contain a continued loss, or net borrowing, of gold and dollars of, say, $£ 250-£ 300 \mathrm{Mn}$. a year ; for if, as is planned by the Government, the net figure is to be nil, this excess of imports from ' hard currency' markets must be offset by an excess of exports of our goods of a similar magnitude to other markets, financed by funds which we lend to these other purchasers for that purpose or which we permit these other purchasers to use out of their accumulated sterling balances.

As can be seen from Table 1 this would leave at the end of 1948 annual supplies worth $£ 8,300 \mathrm{Mn}$. at market prices for the satisfaction of Personal Consumption. This is on the assumption that the subsidies to consumption continue at $£ 400 \mathrm{Mn}$., a figure somewhat lower than the 1947 figure because of the assumed elimination of subsidies other than on food. After allowing for the higher prices of consumption goods and services due to this reduction in subsidies, a full year of the increased rates of indirect taxes imposed last autumn and our assumed general increase in prices of $5 \%$, this in real terms would leave us with

[^5]total supplies available for personal consumption appreciably higher than the 1947 level. This conclusion, important though it is, must not be misunderstood. In the first place, it depends essentially upon achieving the assumed $5 \%$ increase in productivity. If this failed to materialise and the other demands on our resources were maintained, we should be no better off than in 1947. Secondly, as has been seen, it is at the expense of a very drastic cut in home investment. Thirdly, it is an overall picture. The total supply of goods and services may be better. But if we have to cut down on clothing because of the need to export more textiles and because of bottlenecks in the production of more textiles, and on food because we must restrict imports, this will not necessarily be compensated by a still greater increase in the supply of lamp shades and hand-bags.

## III.-The Inflationary Pressure

In order to see how much private income will be available for savings or for expenditure on consumption one must take the national income, as estimated in Table 1, add to it transfer incomes (i.e., interest on the national debt, war pensions, children's allowances, old-age pensions and other incomes paid out by the state but not included in the value of the national product), deduct Government income from property which never reaches the private sector, and deduct direct taxes payable to the state. The remainder is the income which private businesses or persons have available either for personal expenditure or for savings. This is shown in Table 2.

As against some increase in National Debt Interest allowance is there made for a considerable decline in other Transfer Incomes between 1946 and the end of 1948. The nature of this change is made clearer in Table 3. There will be a quite considerable rise in " social security" incomes of one kind or another, but this will be more than offset by a very sharp decline in income transfers in respect of the Armed Forces (such as war gratuities and payments for demobilisation leave).

We have, then, for the end of 1948 a total private income of $£ 10,350 \mathrm{Mn}$. After allowing for direct tax payments of $£ 1,700 \mathrm{Mn}$., this would leave $£ 8,650 \mathrm{Mn}$. But if there are $£ 8,300 \mathrm{Mn}$. of goods and services available for consumption, this would mean that there must be voluntary private savings, by businesses and by persons, of $£ 350 \mathrm{Mn}$. per annum if an inflationary pressure in the markets for consumption goods is to be avoided. Is this probable?

This would represent a lower rate of private saving than pre-war, as can be seen from the
following figures of private savings as a percentage of private income after payment of direct taxes:-

| 1938 | $\ldots$ | $\ldots$ | $7 \cdot 4$ | per cont |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1946 | $\ldots$ | $\ldots$ | $9 \cdot 9$ | , | ,$"$ |
| 1947 | $\ldots$ | $\ldots$ | $7 \cdot 1$ | $\prime \prime$ | $"$, |
| 1948 | $\ldots$ | $\ldots$ | $4 \cdot 0$ | ,$"$ | ,$"$ |

This does not distinguish between business and personal savings. There is no doubt that business savings at the end of 1948 will be much greater than in 1946. Profits, after tax, will be considerably higher. Moreover, in 1946 there was heavy "dissaving" by businesses in paying taxation out of reserves already accumulated in previous years. At end 1948 such "dissaving" will probably be lower, although it may be on a considerable scale. Business savings might, therefore, account for a very large part, if not the whole, of the private savings required at end 1948.

But it must not be assumed that even so persons would automatically abstain from spending on goods and services for consumption to the required degree. Conditions have changed in such a way that, apart from the special stimulation of patriotic motives, there are many reasons for expecting a very low propensity to save. Indeed, in the absence of controls over consumption, personal savings might well be a negative figure. In the first place, there is still $a^{-}$considerable back-log of real requirements for clothes, furniture, motor-cars, and other such durable consumption goods which could not be purchased during the war. In the second place, individuals have at their disposal for prompt expenditure considerable funds which they have accumulated out of war-time savings, past repayments of post-war credits and receipts for wardamage under war insurance schemes and which they have invested in liquid forms, in cash, deposits, special " small savings" assets or other readily realisable Government securities.*

[^6]Thirdly, at the end of 1948 the private sector of the economy will probably still be receiving substantial sums of money on "capital transfer account" (see Table 2) in respect of post-war credits and war damage payments. All these sums must be held off the market for consumption goods, in addition to the savings out of income discussed above. Fourthly, as a glance at Table 10 in Cmd. 7099 will show, the distribution of income after payment of direct taxation is now incomparably less unequal than before the war ; but we must expect a more equalised distribution of income to tell against the maintenance of a high propensity to save, since the rich probably used to save a larger proportion of their tax-free income than the poor. This conclusion is reinforced by recent increases in the rates of death duty on the largest properties, since such levies, though counted by the Government as current revenue, must often be paid by "dissaving" some part of past savings.

## IV. Conclusion

In this Article we have not attempted to forecast what in fact the future may hold in store. We have attempted merely to consider the implications of certain official targets. These are (i) that the balance of current payments is restored to equilibrium by the end of 1948 (a difficult task indeed), and (ii) that there is an exceedingly drastic cut in home investment. In addition we have assumed a $5 \%$ improvement in productivity over the average of 1947. On these assumptions, we should have sufficient supplies available for an appreciable rise in personal consumption, though this is consistent with a continued shortage of many things of which we stand most urgently in need. If, further, we maintain the recently increased rates of taxation, we shall require appreciably lower rates of private savings than in recent years. But whether or not this will suffice to remove the inflationary pressure from consumption markets is doubtful because of the backlogs of consumers' needs, the great accumulated holdings of liquid funds and much greater equality in the distribution of income. In the absence of domestic measures to control the use of accumulated liquid funds, if it were possible to raise the public budget surplus by yet another $£ 100$ to $£ 200 \mathrm{Mn}$. the financial position would be more secure. This would be particularly true if it were possible to do so by a reduction of expenditure rather than by further increases in taxation, for in that case the relief to the inflationary pressure would occur without any further disincentive
effects from increased taxation. In present circumstances it would seem advisable to over-do, rather than to under-do the measures of financial austerity. For if, in the event, the demand on resources should appear to have been reduced too severely, it is always possible to let up on the
very drastically reduced investment programme, which would seem to have a high priority for relaxation if any such relaxation should be possible, through Marshall aid, through still greater productivity or through unexpected abstinence on the part of consumers.

## FINANCE

By F. W. Paish

Government Finance.-Both Revenue and Supply Expenditure showed a slight fall from the third to the fourth quarter of 1947, and as the cost of the Consolidated Fund Services showed a seasonal decline there was a surplus of $£ 26 \mathrm{Mn}$. for the quarter. This brings the total surplus for the year to date to $£ 244 \mathrm{Mn}$., as compared with a revised estimate of $£ 308 \mathrm{Mn}$. for the whole financial year. If we exclude the extraordinary items of revenue-which may very roughly be taken as the proceeds of Sales of Surplus War Stores, Surplus Receipts from Trading, and Miscellaneous Receipts-the deficit for the first three quarters of the financial year is $£ 162 \mathrm{Mn}$. With revenue from most sources running well above estimate and expenditure rather below it, it looks as if this deficit might be wiped off before the end of the financial year and a genuinely balanced budget achieved :-

TABLE 1.
ORDINARY REVENUE AND EXPENDITURE.


Extra-budgetary expenditure again rose sharply, from $£ 152 \mathrm{Mn}$. to $£ 266 \mathrm{Mn}$., mainly as a result of heavier payments on account of War Damage and Post-war Credits :-

TABLE 2.
EXTRA-BUDGETARY PAYMENTS. £Mn.

| 1947 | Oct. <br> (25 days) | Nov. (35 days) | Dec. (32 days) | $\begin{aligned} & \text { Total } \\ & \text { (92 days) } \end{aligned}$ |
| :---: | :---: | :---: | :---: | :---: |
| Net E.P.T. Refunds ... | $1 \cdot 6$ | $2 \cdot 5$ | $2 \cdot 8$ | $6 \cdot 9$ |
| Post-war Credits | $14 \cdot 4$ | $12 \cdot 9$ | $6 \cdot 1$ | $33 \cdot 4$ |
| Net War.Damage Payts. |  |  |  |  |
| W.D.C. ... ${ }^{\text {a }}$ | 4.5 | $79 \cdot 5$ | $35 \cdot 0$ | $119 \cdot 0$ |
| Board of Trade |  |  | 10.0 | $10 \cdot 0$ |
| Housing . ... | 26.9 | $32 \cdot 0$ | $23 \cdot 1$ | $82 \cdot 0$ |
| Coal Nationalisation ... | $5 \cdot 0$ | - | - | $5 \cdot 0$ |
| Civil Contingencies Fund | d - | - | $10 \cdot 0$ | $10 \cdot 0$ |
| Other (Net) ... | 1.6 | 1.6 | $-3.7$ | $-0.5$ |
|  | $54 \cdot 0$ | 128.5 | 83-3 | $265 \cdot 8$ |

Of the quarter's net deficit of $£ 240 \mathrm{Mn}$. on the Ordinary and Extra-budgetary accounts combined, about $£ 165 \mathrm{Mn}$. appears to have been covered by various types of foreign borrowing and net sales of gold abroad. $£ 25 \mathrm{Mn}$. was drawn from the recently released $£ 100 \mathrm{Mn}$. balance of the U.S. credit, nearly as much under the Canadian credit, and $£ 45 \mathrm{Mn}$. from the International Monetary Fund. Gross gold sales for the quarter totalled $£ 108 \mathrm{Mn}$., but of this something like $£ 35 \mathrm{Mn}$. seems to have been made good by purchases of new gold, leaving net sales of rather over $£ 70 \mathrm{Mn}$. The drawings from the International Monetary Fund are reflected in the Exchequer Returns by a net rise of $£ 43 \mathrm{Mn}$. in " Other Debt-Internal," and the drawings on the U.S. and Canadian credits by a rise of nearly $£ 48 \mathrm{Mn}$. in " Other DebtExternal." The effects of the gold sales are more difficult to trace. The direct result of a net sale of $£ 70 \mathrm{Mn}$. gold by the Exchange Equalisation Account would normally be a corresponding increase in its holdings of Tap Treasury Bills or Ways and Means Advances; but during the quarter more than the whole of the rise of $£ 53 \mathrm{Mn}$. in Treasury Bills seems to have occurred in Tender Bills, while Ways and

Means Advances by Departments fell by $£ 17 \mathrm{Mn}$. This apparent discrepancy may perhaps be largely accounted for by the fact that over $£_{\mathrm{d}} 79 \mathrm{Mn}$. of the Treasury's Ordinary Revenue during the quarter was obtained from "Surplus Receipts from certain Trading Services," and "Miscellaneous Receipts." In so far as these " receipts" in fact consisted of the cancellation of Treasury Bills held by government departments, they would offset the rise in the bills held by the Exchange Equalisation Account. It is probable that there was also some further decline in overseas-owned balances held in the form of Treasury Bills.

TABLE 3.
GOVERNMENT BORROWING. £Mn.

| 1947 | October (25 days) | November (35 days) | December (32 days) | $\begin{aligned} & \text { Total } \\ & (92 \text { days }) \end{aligned}$ |
| :---: | :---: | :---: | :---: | :---: |
| Nat. Savings Certs. | -0.4 | $6 \cdot 9$ | $9 \cdot 9$ | 16.4 |
| 21\% Defence Bonds... | $3 \cdot 0$ | , 5-2 | $4 \cdot 4$ | $12 \cdot 6$ |
| Other Debt: Internal... | $28 \cdot 9$ | 14.7 | $-0.4$ | $43 \cdot 2$ |
| External... | $7 \cdot 6$ | $5 \cdot 4$ | 34-7 | $47 \cdot 7$ |
| Repayments ... ... | $-11 \cdot 3$ | $-16.9$ | $-16.9$ | $-45 \cdot 1$ |
| Long and Medium term Borrowing ... | $27 \cdot 8$ | $15 \cdot 3$ | 31.7 | $74 \cdot 8$ |
| Tax Reserve Certs. ... | $-6.9$ | 6.1 |  | $23 \cdot 3$ |
| Treas. Dep. Recpts. .. | $-40 \cdot 0$ | $85 \cdot 5$ | $65 \cdot 0$ | $110 \cdot 5$ |
| Treas. Bills: Tender ... Tap | $44 \cdot 3$ | $\left\{\begin{array}{r}20.0 \\ -0.5\end{array}\right\}$ | $-10 \cdot 3$ | 53.5 |
| W. \& M. Advances : Govt. Depts. Bank of England ... | 10.0 | 6.0 | $-33.0$ | $-17 \cdot 0$ |
| Short-term borrow. ing | $7 \cdot 4$ | $117 \cdot 1$ | 45.8 | $170 \cdot 3$ |
| Total net borrowing | $35 \cdot 2$ | $132 \cdot 4$ | $77 \cdot 5$ | $245 \cdot 1$ |

Even with foreign borrowing and gold sale ${ }^{\mathrm{S}}$ still running at a high level, the low level of internal long-term borrowing,* which was less than repayments, and the effect of so much of the quarter's " revenue " being in the form of the cancellation of bills held by Departments, obliged the Treasury to resume borrowing from the banks. Treasury bills issued by tender rose by some $£ 60 \mathrm{Mn}$. during the quarter and Treasury Deposit Receipts by $£ 110 \mathrm{Mn}$. Thus the process of credit expansion, which during the first nine months of 1947 had almost ceased, has been resumed. During the first two months of 1948 the usual seasonal surplus on Ordinary Account will presumably suffice to cover the Treasury's total needs, but thereafter, if the gap in our balance of international payments is progressively closed, a real and substantial budget surplus will be needed if the Chancellor is to avoid either renewed credit expansion or the issue of a new long-term loan on terms appealing to the ordinary investor.

[^7]Other Finance.-The effect of the Treasury's renewed recourse to the banks during the last quarter of 1947 is clearly reflected in the Clearing Bank returns. The T.D.R. holdings of Nine Clearing Banks rose from $£ 1,138 \mathrm{Mn}$. in September to $£ 1,241 \mathrm{Mn}$. at the end of the year, and Discounts from $£ 736 \mathrm{Mn}$. to $£ 768 \mathrm{Mn}$. With these increases added to the continued steady expansion in Advances, which rose by a further $£ 54 \mathrm{Mn}$. during the quarter, net deposits increased by $£ 210 \mathrm{Mn}$. to $£ 5,395 \mathrm{Mn}$.

TABLE 4
NINE CLEARING BANKS

|  | Gross Deposits <br> £Mn. | Balances with other Banks \& Items in transit £Mn. | Net Deposits <br> £ Mn. | Increase in Net Deposits in <br> Preceding 12 months |
| :---: | :---: | :---: | :---: | :---: |
| 1945 March | 4,241 | 137 | 4,104 | 447 |
| June | 4,517 | 174 | 4,343 | 622 |
| September | 4,654 | 135 | 4,519 | 599 |
| December | 4,609 | 195 | 4,414 | 283 |
| 1946 March ... | 4,513 | 158 | 4,355 | 251 |
| June ... | 4,797 | 187 | 4,610 | 267 |
| September | 5,040 | 155 | 4,885 | 366 |
| December | 5,407 | 251 | 5,156 | 742 |
| 1947 March . | 5,285 | 168 | 5,117 | 762 |
| June ... | 5,382 | 215 | 5,167 | 557 |
| September | 5,344 | 159 | 5,185 | 300 |
| October ... | 5,417 | 181 | 5,236 | 266 |
| November | 5,494 | 186 | 5,308 | 263 |
| December | 5,651 | 256 | 5,395 | 239 |
| 1948 January... | 5,498 | 196 | 5,302 | 145 |

An interesting development of the past quarter has been the marked decline in the note circulation, which, even at the height of the Christmas peak, was $£ 7 \mathrm{Mn}$. lower than at the end of the previous September (whereas during the corresponding period of 1946 it rose by $£ 68 \mathrm{Mn}$.), and $£ 60 \mathrm{Mn}$. lower than a year before. This sudden reversal of the previous rising trend, which had continued without any but a seasonal break since 1932, may be due in part to the antecedent check to the rise in bank deposits, but is probably mainly due to fears by certain large note-holders of some scheme for a compulsory exchange of notes. This explanation finds some confirmation from the present very low level of the Bank of England's reserve of silver coin, which suggests that some notehoarders have converted part of their holdings into the only form of specie available. The fall in the note circulation permitted a decrease in the Fiduciary Issue on January 7th from $£ 1,450$ Mn . to $£ 1,400 \mathrm{Mn}$.

Little attempt was made by the Treasury to influence prices of gilt-edged securities in anticipation of the conversion of railway securities
into Transport Stock on January 1st, and yields remained fairly steady at about a 3\% level. The terms of the Transport Stock-3\%, 1978-88 at par-were regarded as a little ungenerous, and the new stock opened at a discount. For the greater part of January prices were maintained at the December level, but towards the end of the month some further weakness occurred as a result of the French devaluation.

Partly owing to purchases by sellers of railway stocks before conversion, prices of indus-
trial securities rose during November and more sharply during December, until by the end of the year they had recovered more than two-thirds of the fall from the peak of last June. A reaction occurred during the first half of January, and despite some recovery in the second half of the month prices remain below their end-December peak. Even at this lower level, the narrow margin between the yields on gilt-edged and on leading industrial securities appears to be discounting a further rise in dividends.

## RETAIL PRICES.

By R. G. D. Allen.

In the Bulletin for August 11th, 1947, p. 75, there was published an estimate of the change from 1938 to mid-1947 in the level of retail prices paid by working-class families. The Ministry of Labour has now given more accurate weights for the groups of the new Interim Index of Retail Prices. A rather more refined calculation of the change is thus possible and the revised estimate for mid-1947 is 160, average prices in 1938 being 100. This increase of $60 \%$ may still be a little on the low side.

The Table shows the official index-numbers of the Cost of Living and of Retail Prices. It also shows our estimated index-number going back to 1938 on a continuous basis, with consumption in 1937-38 as weights. The yearly figures of the estimated index from 1938 to 1946, inclusive, use price changes in the main consumption goods as shown in the White Paper on National Income and Expenditure (Cmd. 7099, 1947). The figure for June, 1947, uses extrapolations of these price changes. Subsequent figures are obtained by applying the new Interim Index to our figure for

June, 1947. The series can be kept up to date by continued use of the Interim Index.

The divergence between the estimated index of price changes and the old Cost of Living Index became important only after 1941. The Cost of Living figure increased very little after 1941, remaining at about $30 \%$ above 1938 , while our estimate shows the level of prices rising fairly steadily from $30 \%$ above 1938 in 1941 to $60 \%$ above 1938 in 1947. This is, of course, the effect of the narrow coverage of the old Cost of Living Index and the concentration of subsidies upon the items which appear in it.

There was relatively little change in the general level of retail prices between the two Budgets of 1947 ; rising prices of coal and some household goods were offset by seasonal falls in food prices. Increased duties introduced in the November budget were, in part, reflected in the jump in the index of retail prices in November and further rises are to be expected. There was an increase of $4 \%$ in the drink and tobacco price groups in November. More significant, how-

CHANGES IN RETAIL PRICES FOR WORKING-CLASS FAMILIES

|  | Averages |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 1938 | 1939 |  | 1940 | 1941 | 1942 | 1943 |  | 1944 |
|  | 101 | $\begin{aligned} & 102 \\ & 103 \end{aligned}$ |  | $119$ | $128$ | $\begin{aligned} & 129 \\ & 142 \end{aligned}$ | $\begin{aligned} & 128 \\ & 146 \end{aligned}$ |  | $\begin{aligned} & 130 \\ & 149 \end{aligned}$ |
| Estimated index-numbers $(1938=100) \ldots$ | $100$ |  |  | 120 | 132 |  |  |  |  |
|  | Averages |  | 1947 |  |  |  |  |  |  |
|  | 1945 | , 1946 | 17 June | 15 July | 12 Aug. | 16 Sept. | 14 Oct. | 18 Nov. | 16 Dec . |
| Official index-numbers* | 131 | 131 | 131/100 | 101 | 100 | 101 | 101 | 103 | 104 |
| Estimated index-numbers $(1938=100) \ldots$ | 150 | 152 | 160 | 161 | 160 | 161 | 162 | 165 | 166 |

* Until June, 1947, based on September 1st, $1939=100$; then on June 17 th, $1947=100$.
NOTES.-Official index-numbers from Ministry of Labour. Estimated index-number obtained by combining price ohanges for main expenditure groups ; price changes from White Paper on National Income and Expenditure (Cmd. 7099); weights from new Interim Index of Retail Prices. The method is that used in the Bulletin of August 11th, 1947 (Table 2, p. 75) improved in detail by use of the group weights now given for the Interim Index.
ever, were the price increases for fuel, household and miscellaneous goods; prices in these groups as a whole rose by $6 \%$ between June and November and further in December.
$A^{\prime}$ full description of the Interim Index of Retail Prices has not yet been published by the Ministry of Labour and we do not know the
relative importance of different sub-groups within each of the main categories, e.g., the weight which vegetables have in the food category. Such information is essential to the proper interpretation of variations in the Index. It is important that the Ministry should publish, as soon as possible, the technical description of the index as now calculated.


# WAGES AND HOURS OF WORK 

By A. L. Bowley

From July, 1946, to June, 1947, there were relatively few changes in wage rates and our index rose only 1 or $2 \%$. In the latter half of 1947 there were increases in agriculture in September (reported in the November Bulletin), in building in November (3d. an hour to artisans and $2 \frac{1}{2} \mathrm{~d}$. to labourers), and in coal-mining, where time and piece rates were raised about $14 \%$, also in November. Increases in cotton and some other industries in January and February this year will raise the cotton index to 204 in February and the weighted average to 178 , in January and 179 in February so that by the date of writing there has been an increase in the average of 5 or $6 \%$ ( 10 units in the index) since June of last year.


For coal it is assumed that the normal week's work is still five shifts and that last May the reduction in the number of shifts was just compensated by increased rates. For the method of computing the changes in miners' wages reference should be made to Bulletin, November, 1947, p. 112.

If, as explained there, it is assumed that there was no change in rates for similar work between December, 1944, and May, 1947, the entry for coal in the Table above would be 220 instead of 244 in December, and the general average 174 instead of $176 \frac{1}{2}$. The greater rise in the coal entries in the Table is due to an increase in average earnings per shift in a period when there was no change in time or piece rates.

There have been no reductions of hours affecting any large numbers since September.

Time Rates of Wages and Hours of Labour, 1st September, 1947.-This publication from the Ministry of Labour and National Service is a sequel to the similar one for 1st August, 1946, with the inclusion of an additional small number of minor industries.

Since there are no appropriate data for the numbers employed, it is not possible to assemble the wages into a general average. The importance of these records is mainly in their detail, but there is considerable interest in studying the great variety of wage bargainings and the minor changes in relative rates in this period of thirteen months.

A tabulation has been made of the wage-rates and hours in all the cases where there appears to be strict comparability. Setting aside coal and cotton where piece - rates are prevalent, and agriculture (where the increase of the minimum from 80 s. to 90 s. took place during the period), there are about 111 industries where minimum rates and normal hours of work have been agreed between employers' and workmen's associations or decided by Wages Regulation Orders under the Wages Council Act, in the main part of the Report. There is also (at the end) a summary of the statutory rates fixed by the Wage Councils which includes about 40 additional minor industries.

The sequel relates to wages of men only．
The interval between the Reports includes a great part of the movement towards reduction of hours．In about half of the 111 industries hours were unchanged，but in many of these hours were already 44 or 45 weekly．A rough computation suggests ：－
NUMBER OF INDUSTRIES WITH HOURS UNCHANGED

Wages Risen
Unchanged
Fallen

| Hours | Hours |  |
| :---: | :---: | :---: |
| 47 or 48 | 44 or 45 | Total |
| 25 | 7 | 32 |
| 10 | 11 | 21 |
| 1 | 2 | 3 |
| 36 | 20 | 56 |

Where hours were reduced，from 48,47 or 46 ，to 45 or 44 ，weekly wages in most cases rose， but were unchanged in 6 cases，and suffered a slight reduction in 5 others．

No．of Industries with hours reduced＊ Wages－risen 44，unchanged 6，fallen 5 ：total 55.
＊Including a few cases where the reduction in hours did not take place till October， 1947

The information relating to the minimum rates for men fixed by Wage Councils＊＊may be summarised thus ：－

| No．of industries | ．．． | $\begin{gathered} \text { Hours } \\ \text { unchanged } \end{gathered}$ | Hours reduced 33 | Together 58 |
| :---: | :---: | :---: | :---: | :---: |
| Weekly minima ： |  |  |  |  |
| Average 1946 | ．．． | 75 s .3 d ． | 77s．1d． | 76 s .2 d ． |
| Average 1947 | $\ldots$ | 84s． 8 d ． | 80s．8d． | 82s．3d． |
| Hourly minima ： |  |  |  |  |
| Average 1946 | $\ldots$ | 1s． $6 \frac{3}{4} \mathrm{~d}$ ． | 1s． $7 \frac{1}{2} \mathrm{~d}$ ． | Is． $7 \frac{1}{4} \mathrm{~d}$ ． |
| Average 1947 | $\ldots$ | 1s． $9 \frac{1}{4} \mathrm{~d}$ ． | 18．9 ${ }^{\text {d }}$ d． | 1s． $9 \frac{1}{2} \mathrm{~d}$ ． |

＊＊Including about 18 industries already in the preceding tables．

## EXTERNAL TRADE IN 1947

By T．Barna＊

The external trade of the United Kingdom in 1947 disappointed expectations．Imports at three－quarters of the 1938 volume were $5-10 \%$ less than expected；exports fell in the first half of the year and hardly surpassed their end－of－1946 volume in the second half；and the terms of trade continued to worsen．As a result of these factors，and of the absolute rise in the prices of both exports and imports，the visible trade gap reached almost $£ 600 \mathrm{Mn}$ ．（which，in real terms，is less than the pre－war gap）．：The situation worsened in the second quarter and became critical in the third as imports expanded relatively to exports；but in the last quarter imports fell．The gap between imports valued f．o．b．and exports was，of course，smaller but difficult to estimate．As import prices rose relatively to freight charges，it is believed that average f．o．b．prices were about $10 \%$ less than c．i．f．prices，as against about $14 \%$ in 1946. The values of exports and imports，together with the volume indexes，are shown in Table 1， with details relating to classes of trade in the main tables on p． 32.

[^8]TABLE 1
VALUE AND VOLUME OF EXPORTS AND IMPORTS

|  |  | VALUE |  |  |  | $\begin{aligned} & \text { VOLUME INDEX- } \\ & \text { NUMBERS } \end{aligned}$ |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\stackrel{0}{6}$ | $\stackrel{9}{4}$ | $\frac{0}{6}$ |  | $\begin{gathered} \text { Exp } \\ \text { U. } \\ \text { Prod } \end{gathered}$ | ports <br> K． <br> duce | $\begin{aligned} & \text { Rets } \\ & \text { ImI } \end{aligned}$ | ined orts |
|  |  |  |  |  | $\begin{aligned} & \text { 會 } \\ & \text { © } \\ & \text { 弟 } \end{aligned}$ |  |  |  | 袁采 |
|  |  | $£ \mathrm{Mn}$ ． | $£ \mathrm{Mn}$ ． | £ Mn． | £ Mn． |  | \％of | 1938 |  |
| 1936 |  | 440 | 61 | 847 | 346 | 104 | － | 99 | － |
| 1937 |  | 521 | 76 | 1，028 | 431 | 113 | － | 105 |  |
| 1938 |  | 471 | 62 | 920 | 387 | 100 | 100 | 100 | 100 |
| 1946 |  | 915 | 50 | 1，301 | 336 | 99 | 95 | 68 | 64 |
| 1947 | ．． | 1，137 | 59 | 1，787 | 591 | 108 | 102 | 77 | 75 |
|  |  |  |  |  |  |  |  |  |  |
| 1st Qtr． | $\ldots$ | 185 | 13 | 279 | 82 | 84 | 81 | 63 | 60 |
| 2nd ， | ．．． | 222 | 11 | 318 | 84 | $\begin{array}{r}98 \\ 104 \\ \hline 10\end{array}$ | 93 99 | 69 | 65 |
|  | $\cdots$ | 240 266 | 13 | 329 369 | 76 89 | 104 | 99 106 | 70 | 65 69 |
| $\text { 4th } 1947$ |  | 266 | 14 | 369 | 89 | 111 | 106 | 72 | 69 |
| 1st＂， |  | 250 | 18 | 364 | 96 | 101 | 96 | 67 | 65 |
| 2nd |  | 265 | 18 | 456 | 173 | 102 | 96 | 77 | 76 |
| 3rd＇， |  | 302 | 11 | 517 | 204 | 114 | 107 | 88 | 86 |
| 4th＂． | $\ldots$ | 320 | 12 | 451 | 119 | 117 | 107 | 77 | 72 |

NOTE．－The volume index－numbers at ourrent weights are calculated from the Board of Trade volume indexes for each group of commodities，and not from complete data．

The official volume indexes are calculated using 1938 "weights". An alternative calculation can be made using current weights ; this is based on the separate volume indexes published for each group of commodities and not on full data, and to this extent it gives only approximate results $\dagger$. The alternative volume indexes are, on the whole, some $5 \%$ below the Board of Trade indexes. This happens normally because there are shifts in the composition of exports and imports from relatively expensive to relatively cheap commodities $\ddagger$. In the case of exports, for instance, coal and textiles have risen in price more than the average, while sales are low. The difference between the two indexes is less in the case of imports, as the demand for raw materials (which have risen most in price) is fairly inelastic ; this is especially true for 1947, when stocks, run down in 1946, were built up.

Table 2 shows the price index-numbers. The Board of Trade index-numbers of " average values," which are the complement of their volume indexes, are based on current weights; hence the alternative indexes, based on 1938 weights, which are calculated from our volume indexes, show a greater rise since 1938. As the difference is greater for exports than for imports,

[^9]the terms of trade on the 1938 base look somewhat more favourable than on a current-weights base. The Board of Trade indexes show the value of current exports and imports compared with their corresponding values in 1938, and the alternative indexes show what 1938 exports and imports would have cost to-day as compared with 1938.

In addition, the Board of Trade publish index-numbers of export and import prices.* These are weighted by expected quantities of exports and imports in the current year. The new series are therefore more suitable for month-to-month comparisons, but for long comparisons not superior to the Board of Trade index of " average values". The new indexes are based on a sample of commodities (covering about $70 \%$ of imports and $50 \%$ of exports) and may, therefore, be less accurate than the other index. On the other hand, care is taken to obtain price-relatives for homogeneous commodities (while " average value" refers to items, the composition of which may change) and in this respect they are better indexes of price changes. But the index eliminates the effects of shifts in purchases from one country to another, and hence it is not a suitable measure in a world where commodity prices are by no means uniform ; our terms of trade have deteriorated to some extent because we have to buy from high-

[^10]TABLE 2
EXPORT AND IMPORT PRICE INDEX-NUMBERS (\% of 1938)

|  |  | U.K. Exports, f.o.b. |  |  | Retained Imports, c.i.f. |  |  | Terms of Trade |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Average <br> Base-vear Weights | Values Current Weights | Prices <br> Current <br> Weights | Average Base-year Weights | Values Current Weights | Prices <br> Current <br> Weights | Average <br> Base-year Weights | Values Current Weights | Prices Current Weights |
| 1936 |  |  | 90 | ... | ... | 93 |  | ... | 97 | ... |
| 1937 | $\ldots$ |  | 988 |  | 100 | 105 |  |  | 93 100 |  |
| 1938 | $\ldots$ | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 |
| 1946 | $\ldots$ | 204 | 195 | 198 | 223 | 212 | 206 | 92 | 92 | 92 |
| $\begin{aligned} & 1947 \\ & 1946 \end{aligned}$ | ... | 238 | 223 | 228 | 268 | 260 | 245 | 89 | 86 | 92 |
| 1st Qr. | $\ldots$ | 194 | 186 | 190 | 207 | 196 | 199 | 94 | 95 | 95 |
| 2nd , | $\cdots$ | 203 | 191 | 195 | 220 | 206 | 201 | 92 | 93 | 97 |
| 3rd , | ... | 206 | 197 | 199 | 226 | 210 | 206 | 91 | 94 | 97 |
| $\begin{aligned} & \text { 4th } \\ & 1947 \end{aligned}$ | $\ldots$ | 213 | 204 | 207 | 241 | 228 | 217 | 89 | 89 | 95 |
| 1st , | $\ldots$ | 221, | 211 | 215 | 248 | 241 | 226 | 89 | 88 | 95 |
| 2nd ", | $\ldots$ | 234 | 221 | 224 | 267 | 265 | 240 | 88 | 83 | 93 |
| 3rd 4 th | $\ldots$ | 241 254 | ${ }_{232}^{226}$ | 233 240 | 272 283 | ${ }_{264}^{267}$ | 253 259 | 89 90 | 85 88 | ${ }_{93}^{92}$ |
|  |  | 254 | 232 | 240 | 283 | 264 | 259 | 90 |  |  |

NOTE.-The price index-numbers at base-year weights are calculated from the Board of Trade indexes of average values for each group of commodities, and not from complete data.
price countries, and for this reason the indexes of " average values" are preferable to use.

The progress of the export drive is shown in Table 3. By mid-1948 it is proposed to reach $143 \%$ of the 1938 volume for all exports, and $163 \%$ for manufactures only. The table shows that progress has been uneven and success is by no means certain yet.

TABLE 3
PROGRESS OF THE EXPORT DRIVE : EXPORTS OF MANUFACTURES

| Group |  | Volume Index Number |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\begin{gathered} \text { Value } \\ \text { Y } 1947 \\ \text { 4th Qr. } \end{gathered}$ | $\underset{\text { Year }}{1946}$ | $\begin{aligned} & 1947 \\ & \text { Year } \end{aligned}$ | $\begin{gathered} 1947 \\ 3 \mathrm{rd} \mathrm{Qr} \end{gathered}$ | $\begin{gathered} 1947 \\ 4 \mathrm{th} \text { Qr. } \end{gathered}$ | $\begin{array}{\|c} \text { Target } \\ \text { Mid } \\ 1948 \end{array}$ |
|  | eMn. | \% of 1938 |  |  |  |  |
| Coke and manu factured fuel Pottery, glass, ete. | 0.03 | 22 |  |  |  |  |
|  |  |  |  |  |  |  |
|  | 9.40 | 149 | 154 | 157 | 169 | 194 |
| Iron and Steel, <br> etc. | 22.88 | 115 | 107 | 11 | 110 |  |
|  | 11.34 | 192 | 173 | 180 | 181 | 96 |
| Cutlery, etc | 9.70 | 163 | 183 | 201 | 191 | 202 |
| Electrical | $14 \cdot 44$ | 166 | 164 | 180 | 179 | ${ }_{2} 210$ |
| Machinery | 51-15 | 112 | 158 | 167 | 169 | 224 |
| Timber ${ }^{\text {a }}$. | 0.37 | 47 | 43 | 40 | 38 | 4 |
| Cotton | 21.50 | 42 | 43 | 45 | 46 | 56 |
| Wool ... | 18.05 | 79 | 88 | 91 | 102 | 146 |
| ${ }_{\text {Sther }}^{\text {Silk }}$ OTextile | 8.25 7.01 | 150 76 | 148 78 | $\begin{array}{r}140 \\ 75 \\ \hline\end{array}$ | $\begin{array}{r}164 \\ 74 \\ \hline\end{array}$ | 8 |
| ${ }_{\text {Apparel }}$ I ${ }^{\text {athe }}$ | ${ }_{7.46}$ | 147 | 137 | 123 | 74 125 | 198 |
| Footwear | 1.92 | 122 | 141 | 127 | 140 | 221 |
| Chemicals, etc. | 17.54 | 162 | 140 | 153 | 139 | 188 |
| Oils, etc. | 2.16 | 66 | 71 | 83 | 71 | 96 |
| Leather | ${ }_{4}^{1.91}$ | ${ }_{98}^{69}$ | ${ }^{60}$ | - 19 | ${ }_{13}^{62}$ | 125 |
| ${ }^{\text {Vaphioles }}$ | ${ }_{51.55}^{4.51}$ | 140 | 185 | 202 | ${ }_{219}$ | ${ }_{258}$ |
| Rubber | 1.65 | 154 | 174 | ${ }^{166}$ | 174 | 340 |
| Miscellaneous | 18.45 | 103 | 111 | 123 | 116 | 152 |
| Total | 281-31 | 111 | 123 | 131 | 132 | 163 |

Table 4 shows the volume of imports in certain selected categories. It seems that in 1947 the three main classes were all well below the 1938 volume. In the food groups the fall in meat and dairy produce was comparatively light, but grain imports were only one-half, and feeding-stuffs one quarter, of 1938. In raw material imports such restrictions were impossible, especially as stocks were run down. Some metals were actually imported in excess of 1938 quantities, but imports of textile materials, timber and paper were low. Among manufactures are included refined oil and a number of semi-manufactures; manufactures proper were severely restricted.

Table 4 also shows the proportions of the values* of imports of groups of commodities bought from the three main hard-currency countries (U.S.A., Canada and Argentina). In

[^11]TABLE 4
TOTAL IMPORTS

|  | $\begin{aligned} & \text { Value } \\ & 1947 \end{aligned}$ | Volumes |  | From <br> U.S., Canada, Newfoundland and Argentina |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 1946 | 1947 | 1938 | 1946 | 1947 |
|  | £Mn. | \% of 1938 |  | \% of total values |  |  |
| Grain and Flour | 142 | 46 | 64 | 57 | 97 | 94 |
| Feeding Stuffs... | 14 | 7 | 28 | 26 | 62 | 85 |
| Meat ... | 147 | 82 | 81 | 35 | 53 | 52 |
| Dairy Produce... | 125 | 69 | 66 | 4 | 51 | 45 |
| Fresh fruit, etc. | 84 | 46 | 71 | 20 | 7 | 10 |
| Beverages, etc... | 89 | 79 | 82 | $\frac{1}{4}$ | 1 | 2 |
| Other food ... | 146 | 67 | 83 | 26 | 21 | 21 |
| Tobacco <br> Total food, drink, tobacco | 47 | 125 | 86 | 81 | 86 | 72 |
|  | 805 | 68 | 73 |  |  |  |
| Mined Products (ex. coal and metal) | 15 | 87* | 116* | 29 | 51 | 34 |
| Iron ore, scrap Non-ferrous ore, scrap ... | 20 | 105 | 105 | 30 | 10 | 9 |
|  | 24 | 75 | 74 | 30 | 17 | 17 |
| Wood, timber .... | 107 | 43 | 79 | 26 | 57 | 52 |
| Raw cotton, etc. Wool, etc. | 59 | 68 | 65 | 34 | 21 | 32 |
|  | 62 | 58 | 74 | 7 | $\frac{1}{2}$ | 1 |
| Seeds for oil, etc. | 119 | 79 | 98 | 6 | $2^{2}$ | 23 |
| Hides, skins ... | 40 | 75 | 73 | 26 | 40 | 40 |
| Paper, matting, mats | 27 | 53 | 54 | 6 | 2 | 17 |
| Total raw materials | 560 | 69 | 81 |  |  |  |
| Iron and steel, etc. | 15 | 31 | 42 | 23 | 64 | 61 |
| Non-ferrous | 79 | 66 | 86 | 43 | 46 | 45 |
| Machinery Chemicals, etc... | 30 | 32 | 60 | 51 | 78 | 79 |
|  | 27 | 60 | 94 | 27 | 41 | 47 |
| Oils, etc. | 92 | 110 | 100 | 28 | 34 | 36 |
| Paper, cardboard etc. <br> Total manufactures ... | 22 | 33 | 49 | 31 | 39 | 28 |
|  | 399 | 54 | 68 | - |  |  |

* Exclusive of diamonds imported and recorded in 1946, such imports not having been recorded in 1938.
each food group the proportion is higher than in 1938, with the exception of fruit and vegetables. Grains, meat and dairy produce are especially serious problems. The same general picture applies to raw materials and manufactures with the exception of iron ore and scrap, and textile materials. Timber and oils are categories particularly affected.

The sources of total imports are shown in Table 5. In $193830 \%$ of all imports came from the Western Hemisphere and recently almost $45 \%$; there was no marked change in this proportion during the year. The compensating fall is to be found in imports from Europe and dependent territories, a fall from $34 \%$ to $19-23 \%$; there has been a slight improvement lately. Though the proportion of imports coming from the "rest of the world" was always small, it is still smaller now, particularly because of slow recovery in the Far East.

TABLE $\sigma$
THE DIRECTION OF IMPORTS AND EXPORTS (PERCENTAGES OF TOTAL)

| 1948 |
| :--- | ---: | ---: | ---: | ---: | :---: | :---: | :---: |

[^12]As against the changed direction of imports, the direction of exports shows a remarkable, and disturbing, consistency. The proportion going to the Western Hemisphere, only $17 \%$ in 1938, was less in 1947 and has shown no signs of increasing. The proportion going to Europe, $36 \%$ in 1938, has gradually fallen to about $30 \%$, whilst the proportion going to British sterling countries has increased from $41 \%$ to $49 \%$, and there has also been a slight increase to the "rest of the world ". It is not difficult to draw conclusions from the table.

The broad picture which emerges is that (a) the absence of any appreciable increase in the proportion of British output exported in 1947, together with a slight expansion of imports, has caused a serious over-all balance of payments problem ; (b) the proportion of imports from the Western Hemisphere has continued at a high level, while the proportion of exports going there has failed to increase, thus continuing the special dollar problem; and (c) imports were far from sufficient to stimulate labour productivity at the current level of employment. This picture is quite different from the one which might have been expected on the basis of the announced intentions of the Government during the year and earlier. It may be added that failure to obtain raw materials (e.g., timber) in sufficient quantities is less due to absolute world shortages than to shortages with reference to Britain's means of payments, that is, exports to the Western Hemisphere.

## WORLD COMMODITY SURVEY

By C. F. Carter

Cotton.-World production in the year beginning August 1st, 1946, was about $70 \%$ of the 1935-9 average, and in the current season it will approach $80 \%$ of that level. Production in the late 1930's was high (1937 being a record year), and is approached only by the middle 'twenties. From a peak of nearly 37 Mn . bales in 1937, production declined steadily to less than 21 Mn . bales in 1945. But American production, which averaged 15 Mn . bales in the mid-'twenties, and 13 Mn . in the late 'thirties touched a low point of $8 \frac{1}{2} \mathrm{Mn}$. in the 1946 season. In the current season it has recovered to $11 \frac{1}{2} \mathrm{Mn}$. ; but this level is hardly likely to be maintained, for cotton prices have fallen during 1946-7, while other farm products in the U.S.A. have risen in price by $30-70 \%$. Of the other major producers,
the U.S.S.R. and China show production onethird below the 1935-9 average ; Indian production of " commercial" types is also down by a third, in part because of a restriction of cotton acreage in favour of food production. A small decrease is registered in Brazil, and a substantial fall (again of about one-third) in Egypt. Only a handful of minor producers (Mexico, Spain, Argentina, the Belgian Congo, Mozambique, etc.) have increased their output during the war.

United States output is now averaging about $45 \%$ of the world's total, against nearly $60 \%$ in the mid-'twenties. The share lost by the U.S.A. had gone, by 1939, mainly to Brazil and the U.S.S.R.; and the war made little difference to the relative importance of the producers, as measured by their total output. But the im-

## WORLD COMMODITY SURVEY

| Commodity | Season | Unit | - $\begin{gathered}\text { Pre-war } \\ \text { base }\end{gathered}$ | WORLD PRODUCTION |  |  | WORLD CONSUMPTION |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  | $\begin{gathered} \text { Last } \\ \text { season (e) } \end{gathered}$ | $\begin{gathered} \text { Last } \\ \text { season (e) } \\ \% \text { of } \\ \text { pre-war } \end{gathered}$ | Current season (e) \% of pre-war | $\begin{aligned} & \text { Last } \\ & \text { season (e) } \end{aligned}$ | $\begin{gathered} \text { Last } \\ \text { season (e) } \\ \text { \% of } \\ \text { pre-war } \end{gathered}$ | Current season (e) \% of pre-war |
| Wheat... | All crops harvested in calendar year | Mn. bush. of 60 lb . | $\begin{gathered} \text { Average } \\ 1935-9 \end{gathered}$ | 3,940 (a) | 98 | 92 | n.a. | - | - |
| Fats and Oils ... | Calendar year | 000 tons | $\begin{aligned} & \text { Average } \\ & 1935-9 \end{aligned}$ | $\begin{gathered} 15,800 \\ \text { (oil equiv.) } \end{gathered}$ | 82 | - 87 | n.a. | - | - |
| Sugar ... | Begins Sept. | 000 tons | 1937-8 | $\begin{gathered} 25,971 \\ \text { (raw value) } \end{gathered}$ | 89 | 94 | $\begin{gathered} 24,556 \\ \text { (raw value) } \end{gathered}$ | 86 | 95 |
| Tea ... | Calendar year | Mn. lb. | Average 1936-8 | $\begin{gathered} 662 \\ \text { (exports) } \end{gathered}$ | 75 | n.a. | n.a. | - | - |
| Cocoa ... | Begins October | 000 tons | $\begin{aligned} & \text { Av. } 1935 / 6 \\ & \text { to } 1938 / 9 \end{aligned}$ | 630 | 92 | 94 | (630) | (95) | (97) |
| Cotton... | Begins August | $\begin{aligned} & \text { Mn. bales } \\ & \text { (480 lb. } \\ & \text { net) } \end{aligned}$ | $\begin{aligned} & \text { Av. } 1935 / 6 \\ & \text { to } 1939 / 40 \end{aligned}$ | 21.5 | 70 , | 80 | $26 \cdot 3$ | (94) | (94) |
| Wool (apparel) | Begins July (d) | $\mathrm{Mn} . \mathrm{lb}$. | $\begin{aligned} & \text { Av. } 1935 / 6 \\ & \text { to } 1938 / 9 \end{aligned}$ | 2,900 greasy | 99 | 99 | 3,400 | 110 | 110 |
| Flax ... | Calendar year | 000 tons | $\begin{gathered} \text { Average } \\ 1934-8 \end{gathered}$ | 360 | 47 | 42 | n.a. | - | - |
| Jute ... | Begins July | 000 tons | $\begin{aligned} & \text { Av. } 1934 / 5 \\ & \text { to } 1938 / 9 \end{aligned}$ | 1,020 | 60 | 88 | n.a. | - | - |
| Sisal . | Calendar year | 000 tons | $\begin{gathered} \text { Average } \\ \text { 1934-8 } \end{gathered}$ | 195 | 83 | 85 | n.a. | - | - |
| Rubber | Calendar year | 000 tons | $\begin{gathered} \text { Average } \\ 1936.9 \end{gathered}$ | $\underset{\text { natural }}{1,641 \text { incl. } 835}$ | 158 | 154 | $\underset{\text { natural }}{1,472 \text { incl. }} 557$ | 132 | (165) |
| Copper | Calendar year | 000 tons | $\begin{gathered} \text { Average } \\ \text { 1937.8 } \end{gathered}$ | 1,850 (mine basis) | 87 | 108 | 2,150(i) | 115 | n.a. |
| Lead . | Calendar year | 000 tons | 1938 | 988 (mine basis) | 60 | 80 | 1,060 | 74 | n.a. |
| Tin . | Calendar year | 000 tons | $\begin{gathered} \text { Average } \\ \text { 1936.8 } \end{gathered}$ | 90 | 51 | 62 | 116 | 69 | 83 |
| Zine ... | Calendar year | 000 tons | 1938 | 1,310 (ore basis) | 91 | n.a. | 1,300 (virgin) | 100 | 108 |

It will be appreciated that many figures included above are rough estimates only. This applies especially to those in brackets. All tons are long tons of $2,240 \mathrm{lbs}$. n.a. $=$ not available. (a) excluding U.S.S.R. and China. (b) apparent supplies. (c) average 1936.9.
(d) Some minor producers on other seasons.

Acknowledgments are due to many firms and individuals who have supplied facts and figures.

## WORLD COMMODITY SURVEY

|  | WORLD STOCKS |  | U.K. CONSUMPTION |  | PRICES (1947) |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Date | Amount | \% of pre-war | Last season (e) | $\begin{gathered} \% \text { of } \\ \text { pre-war } \end{gathered}$ | Date | Representative price | $\begin{gathered} \% \text { of } \\ \text { pre-war (g) } \end{gathered}$ |
|  | n.a. | - | (220) (b) | (81) | Jan., 1948 | Chicago March futures $\$ 3 \cdot 11$ per bush. | $\begin{gathered} 320 \\ 380(\mathrm{~g}) \end{gathered}$ |
| - | n.a. | - | $(1,070)$ | (75) | Sept., 1947 | U.S. Dept. of Labor index ( $1926=100$ ) | $\begin{aligned} & 260 \text { (c) } \\ & 310 \text { (g) } \end{aligned}$ |
|  | n.a. | - | $\begin{aligned} & 1,660 \text { refined } \\ & =1,820 \text { raw } \end{aligned}$ | 78 | Jan., 1948 | Raws, f.o.b. Cuba $\$ 3.75$ per 100 lb . | $\begin{gathered} 260 \\ 315(\mathrm{~g}) \end{gathered}$ |
|  | n.a. | - | 380 absorption | 87 | $\begin{gathered} \text { Av. May } \\ \text { to Dec., } 1947 \end{gathered}$ | Calcutta auction average, with export rights $2 / 5 \mathrm{lb}$. | (250) |
|  | n.a. | -. | 110 (1) | 104 | Jan., 1948 | Accra, c.i.f. New York 42.5 c . per lb. | $\begin{gathered} (595) \\ (725)(\mathrm{g}) \end{gathered}$ |
| 31 July, 1947 | 18 | 60 | $1 \cdot 66$ | 60 | Jan., 1948 | New York spot, middling $15 / 16^{\prime \prime} \quad 37 \mathrm{c}$. per lb. | $\begin{gathered} (345) \\ (410)(\mathrm{g}) \end{gathered}$ |
| 30 June, 1947 | 4,415 | n.a. | 660 actual weight, all uses | 99 (f) | Nov., 1947 | Dominions wool, average clean delivered cost out of <br> London Sales <br> $64 \mathrm{~s} .=72 \mathrm{~d}$. 1 b . <br> $48 \mathrm{~s} .=31 \frac{1}{2} \mathrm{~d} . \mathrm{lb}$. | $\begin{aligned} & 280(\mathrm{k}) \\ & 237 \\ & \text { (k) } \end{aligned}$ |
| - | n.a. | - | $37 \cdot 5$ | 58 | Dec., 1947 | Medium Courtrai, water retted $\quad 4,050 \mathrm{fr}$. per bale | $\begin{aligned} & 324(\mathrm{~h}) \\ & 240(\mathrm{~g}) \end{aligned}$ |
| 1 July, | $\stackrel{200}{(\text { in India) }}$ | 20 | 94 | 54 | Jan., 1948 | First Marks, c.i.f. London £93 per ton | 510 |
| - | n.a. | - | n.a. | - | Dec., 1947 | No. 1 (free) $£ 100$ per ton | 597 (h) |
| 30 Sept., 1947 | $\begin{gathered} 800 \text { incl. } 710 \\ \text { natural } \end{gathered}$ | 140 | 127 incl. 97 nat. | 114 | Jan., 1948 | London R.S.S. spot $13 \frac{1}{2} \mathrm{~d}$. per lb. | 163 |
| Nov., 1947 | 190 refined | (55) (j) | 325 (virgin, home use) | 116 | Jan., 1948 | U.S. electro., Connecticut Valley $\quad 21.75 \mathrm{c}$. per lb. | $\begin{gathered} 184 \\ 228(\mathrm{~g}) \end{gathered}$ |
| - | n.a. | - | 218 (refined, home use) | 50 to 60 | Jan., 1948 | New York 15 c. per lb. | $\begin{gathered} 315 \\ 381(\mathrm{~g}) \end{gathered}$ |
| $\begin{gathered} 30 \text { June, } \\ 1947 \end{gathered}$ | (90) | (240) | $25 \cdot 6$ (home use) | 116 | Jan., 1948 | Refined, New York, 94c. per lb. | $\begin{gathered} 193 \\ 235(\mathrm{~g}) \end{gathered}$ |
| - | n.a. | - | 216 (virgin, home use) | 116 | Jan., 1948 | U.S. Prime Western (East St. Louis) 10.9 c . per lb. | $\begin{gathered} 235 \\ 285(\mathrm{~g}) \end{gathered}$ |

(e) Calendar year data for last season relate to 1946 ; for current season to 1947. (f) Average 1937-38. (g) Price ratios are in terms of the currency in which quoted ; the corresponding sterling ratios are added marked (g), where necessary. (h) \% of early 1939. (i) Including some secondary copper. (j) \% of 1937 . (k) \% of average 1934-8 for London sales. (1) Including some now used as a source of fats.
portance of the U.S.A. in world trade has declined further. American mill consumption is running at $9-10 \mathrm{Mn}$. bales a year, almost half as much again as in the 1930's ; and foreign consumption of American cotton, which ran at about 8 Mn . bales in the 1920's and 5 Mn . bales in the 1930's, dropped to 1.2 Mn . in 1941, recovered to 3.3 Mn. in 1946, and is expected to be no more than 2.5 Mn . in the current season. A consequence is that exports, which used to be over $50 \%$ of the American crop, are now the marginal $20 \%$; the prosperity of the South is much more closely bound up with the national prosperity of the U.S.A. But owing to the heavy decline of exports from India and Egypt, the U.S.A. still has its pre-war proportion of world raw cotton trade, about $40 \%$-a figure which compares with $70 \%$ at the beginning of this century.

The pattern of consumption has, of course, been upset by the war much more than that of production. German consumption is down to a quarter of the pre-war level, Japanese to a fifth, U.K. to two-thirds ; while U.S. consumption has risen by a half, Indian by a sixth, Brazilian by a half. The distribution in 1934-8 and in 1946-7 is roughly as follows :-

| Mill consumption, all growths, \% of total |  |  |
| :---: | :---: | :---: |
| U.K. | 10 | 61 |
| Rest of Europe (excl. U.S.S.R.) | 1912 | 14 |
| U.S.S.R. | 11 | 9 |
| Asia and the East | 31 | $21 \frac{1}{2}$ |
| Western Hemisphere | 28 | $48 \frac{1}{2}$ |
| Africa | $\frac{1}{2}$ | $\frac{1}{2}$ |
| Total | 100 | 100 |

Consumption is thus held down rather below the pre-war level by a sharp fall due to war devastation and shortage of labour in Europe and Japan, balanced by boom conditions in the Western Hemisphere. During the coming year the slow rise in the "depressed" countries is likely to be balanced by some recession from the exceptional consumer or re-stocking demand in the United States ; an offtake of some 26 Mn . bales is likely. Beyond that the future is obscure ; a world in full and general prosperity could well use 30 Mn . bales a year, but an American depression could easily push consumption back below 25 Mn . bales. It must be remembered that rayon yarn is now available for many uses at three-quarters of the price of comparable cotton yarn, whereas before the war it cost half as much again as cotton.

The phenomenon of falling production, recovering consumption, and constant or sagging prices is brought about by the continued weight of heavy stocks on the market. The world carry-over at July 31st is estimated at 18 Mn . bales, 5 Mn . less than a year before, but still above the 1935-9 average. The lowest carry-
over stocks of recent times (in 1924-5) were about four months' consumption ; the present level is over eight months'. But the carry-over of non-American cotton is a full year's consumption, higher than in any pre-war year, while the world carry-over of American cotton is under six months', and the U.S. carry-over of homeproduced cotton is only three month's. This would seem to promise some support to the U.S. price, were it not for the larger American crop in the current season and the effect of dollar shortage on her exports. U.K. stocks are $20 \%$ above pre-war, but falling; stocks in India, Egypt and the Argentine have more than doubled, and those in Brazil have tripled. The ruling New York spot price is 36 to 37 c . $/ \mathrm{lb}$., over three times pre-war, for middling $15 / 16 \mathrm{in}$.; Type 5 at Sao Paulo fetches $20 \%$ less, and Jarilla at Bombay $50 \%$ less, than American prices. Cotton is far from being a homogeneous commodity, however, and the prices for different growths do not move very closely together. But even the long staples which are Egypt's speciality are in surplus supply, so prices are hardly likely to rise in any market.

Hard and Soft Fibres.-It is hoped to survey developments in this field in a future issue ; but figures for sisal, flax, and jute have been included in the table. Flax is mainly grown in Eastern Europe, and the drop in production reflects a heavy fall which is believed to have taken place in the U.S.S.R. output. Jute is grown, as to $97 \%$ of the world output, in India and Pakistan ; some $80 \%$ is grown in Bengal. The fall in production is partly due to the diversion of land to rice growing. The Indian jute manufacturing industry consumes most of the crop, and the fall in raw jute exports has thus been much more severe than the fall in the crop itself. $80 \%$ of the production of sisal is in British East Africa and Portuguese Africa; the Netherlands East Indies, which used to produce a third of the crop, are temporarily of minor importance.

The following information for other fibres may be of interest :-

|  | Production (1947) |  | Price |
| :---: | :---: | :---: | :---: |
| True hemp... | 220 | 52 56 | Italian S.B. <br> Dec. '47 £230/ton ( $320 \%$ of 1939) Production lower in U.S.S.R., Italy \& Yugoslavia |
| Abaca (Manila hemp) | 95 | 56 | Type $K$, nonDavao, c.i.f. Europe, Dec. '47 £84/ton. ( $430 \%$ of 1939.$)$ |
| Henequen ... (Mexico and Cuba) | 115 | 106 | 'A' grade, landed New Orleans, Dec. ' $47 £ 84 / 14 /$ ton. |

Wool.-World figures have now been included in the table. Production rose steadily from $3,620 \mathrm{Mn}$. lbs. greasy in the 1935-6 season to $4,200 \mathrm{Mn}$. in $1941-2$, and has since fallen steadily, until in the 1947-8 season it is expected to amount to no more than $3,720 \mathrm{Mn}$. The reduction has been considerable in the U.S.A. and in Australia, while Uruguay and New Zealand show a rise. The fall in production has fallen with especial severity on merinos, good types of which are already in short supply in world stocks. As noted earlier, this has increased the price differential between medium and crossbred types ; but recently there have been signs of a corrective movement, first a switching of demand to fine crossbreds, and later to medium and coarse qualities. Prices have been maintained or increased despite the absence of any considerable American buying; but in view of the continued high demand in the U.S.A. and the small U.S. clip, substantial American buying (of the finer types at least) now appears probable. This will be assisted by the reduction in the U.S. tariff on imported wool.

The peculiar feature of the wool situation is the sensitive adjustment of world demand in response to merino prices. There is some increase in the proportion of merino in this year's Australian clip, but no major increase of supply can be expected for some time. Compared with other commodities, all types of wool are still fairly cheap ; but, even so, quite a modest increase in the price differential between the types has proved effective in shifting demand on to the crossbred types.

Cocoa.-The world production of cocoa is running at something under 650,000 tons, of which (in round figures) $50 \%$ is obtained from British West Africa (three-quarters from the Gold Coast and one-quarter from Nigeria), $20 \%$ from Brazil, $12 \frac{1}{2} \%$ from other Latin American countries, $10 \%$ from French West Africa, and the remainder from the Congo, the West Indies, Ceylon, Pacific Islands, Spanish Guinea and Portuguese Africa. As none of these areas have been devastated by the war, it is at first sight surprising that production is some $10 \%$ below
the immediately pre-war level. In part, this can be ascribed to the low prices of the war years, when large consumers were cut off from the market and shipping could not be spared to move the whole crop; but in part it is due to the increasing wastage through a virus disease in the Gold Coast, the richest producing area. Unless this disease can be checked, the Gold Coast is faced with economic ruin, and the centre of the cocoa industry will shift to areas (such as Brazil) which are so far unaffected by the disease. As cocoa is an important dollar-earner, Britain could ill-afford such a change.

During the war years the principal consumers drew down their stocks to a minimum working level, at which they have since remained. Although Germany is right out of the market (she used to take $12 \%$ of the production), and although the Netherlands and France are not yet taking their pre-war quantity, the potential demand remains very high. It is in part a demand from the Dominions and other nondevastated countries ; but it centres on the U.S.A., where high prosperity combines with a need for restocking in a market which is unregulated. The result is that the price c.i.f. New York (which determines all other world prices) has been ranging about $£_{2} 230-240$ per ton, more than ten times the lowest, and fully five times the highest of the annual prices of the 1930's. The price to the Gold Coast grower, at $\AA_{75} 75$ per ton at railhead, is less than a third of this, the profit going to a stabilisation fund for keeping up the price in bad years ; even so, it is eight times the grower's price in 1943.
ta Even in a world accustomed to violent changes in the prices of primary commodities, these fluctuations are enormous; and the present position is clearly unstable. Cocoa, whether used as a beverage, or in confectionery, or as a source of fats, is threatened by substitutes, and it cannot for long afford a price higher than theirs. A price recession is a possibility in 1948, and with it will disappear some of Britain's colonial dollar earnings ; but clearly it can go a long way before the marketing boards need fear a loss.

# OUTPUT OF THE BUILDING AND CIVIL ENGINEERING INDUSTRIES 

By Ian Bowen.

In the table below estimates are given of the value of output of the building and civil engineering industries for the third quarter of 1947, and for quarters preceding that date from the
beginning of 1946. The estimates have been reached by applying factors of output per head to the official returns of labour employed on different classes of work. The factor of output
per head is adjusted each quarter to allow for changes in wage-rates and in materials prices; an allowance has also been made for changes in hours of work, but not for holidays with pay.

The table shows a quarterly output for the period, July-September, 1947, of $£ 170 \mathrm{Mn}$. This compares with $£ 161 \mathrm{Mn}$. in the preceding quarter and with $£_{1} 145 \mathrm{Mn}$. in the corresponding quarter of 1946. The chief importance of this figure is that it enables a fairly close forecast to be made of the total value of work done by these industries in the whole of 1947; on information at present available this total is not likely to have exceeded $£ 620 \mathrm{Mn}$., $£ 444 \mathrm{Mn}$. in the first three quarters of the year, and perhaps $£ 175 \mathrm{Mn}$. in the last.

The Economic Survey for 1947 estimated that 52 per cent. of gross investment would be building and civil engineering work, or rather the output of the building and civil engineering industries plus the output of building and civil engineering labour directly employed in other industries (or by local authorities and public utilities, including roads, bridges, docks, etc.) Mr. Barna in the London and Cambridge Bulletin for 12th May, 1947, put gross investment for 1947 at $£ 1,720 \mathrm{Mn}$. on the basis of the Economic Survey. Thus, the building and civil engineering total (construction work of all industries) which the Government then appeared to bave in mind for 1947 was about $£ 900 \mathrm{Mn}$.

The annual rate for construction expenditure at mid-1947 was put at $£ 850 \mathrm{Mn}$. in the White Paper on Capital Investment in 1948 (Cmd. 7268) and at about $£^{775-800 ~} \mathrm{Mn}$. for the calendar year 1948, in the same document.

These figures, it should be noted, specifically include the output of directly employed building and civil engineering labour, and the whole
manufacturing cost of temporary houses.
To make the estimate of some $£ 620 \mathrm{Mn}$. output of the industries in 1947 comparable with the total for construction something must be added for directly employed labour, but no correction is needed for temporary housing, as their cost has been allowed for in the value of output factor. The question is whether directly employed labour has an output of some $£ 230 \mathrm{Mn}$. per annum ( $£ 850$ minus $£ 620 \mathrm{Mn}$.). Figures for the building and civil engineering labour employed directly by Local Authorities have been published from time to time, but adequate data for an accurate calculation of labour directly employed elsewhere is lacking. The output of the Local Authorities' labour force was, perhaps, of the order of $£ 110$ to $£ 130 \mathrm{Mn}$. in 1947.

It would thus appear that the Government's estimate of constructional work being done in 1947 and to be done in 1948 may be higher than the true figure. It is impossible to estimate the correct total with certainty, however, until data on the employment and output of building and civil engineering labour forces employed by industries other than building and civil engineering are collected and analysed. In general, it would seem likely that fears of gross " overinvestment" in constructional activities expressed on the basis of forecast figures for construction may have been exaggerated.

There are some differences between the figures for 1946 in the table below and those which have recently been released by the Ministry of Works in its Summary Report for the period 9th May, 1945, to 31st December, 1946 (Cmd. 7279). The main cause of the differences appears to be the allowances made for costs for the purposes of our table, as explained in earlier articles.

ESTIMATED GROSS OUTPUT OF THE BUILDING AND CIVIL ENGINEERING INDUSTRIES IN GREAT BRITAIN ( $£ \mathrm{Mn}$.).

|  |  |  | HOUSING |  |  |  | WORKOTHER THAN HOUSING |  |  | TOTAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | New houses | Conversions and adapta. tions |  | ```Repairs and mainten- ance for houses``` | Other war damage repairs | Industry and agrioulture | Other |  |
| 1946 | Qr. | $\begin{array}{r} \text { I } \\ \text { II } \\ \text { II } \end{array}$ | $30 \cdot 6$ 43.4 54.0 61.0 | 5.6 5.8 6.0 8.1 | $\begin{aligned} & 25 \cdot 1 \\ & 22 \cdot 9 \\ & 20 \cdot 9 \\ & 18 \cdot 8 \end{aligned}$ | $\begin{array}{r} 9 \cdot 0 \\ 11 \cdot 1 \\ 14 \cdot 1 \\ 15 \cdot 2 \end{array}$ | $3 \cdot 6$ $4 \cdot 0$ $4 \cdot 0$ 4.1 | $12 \cdot 3$ $17 \cdot 1$ $22 \cdot 3$ $24 \cdot 3$ | $20 \cdot 9$ $24 \cdot 2$ $23 \cdot 8$ $23 \cdot 2$ | $\begin{aligned} & 107.1 \\ & 128.7 \\ & 145.2 \\ & 152.8 \end{aligned}$ |
| 1847 | Qr. | $\begin{array}{r} \text { I } \\ \text { III } \end{array}$ | $\begin{aligned} & 42 \cdot 0 \\ & 52 \cdot 8 \\ & 56 \cdot 2 \end{aligned}$ | $\begin{aligned} & 4 \cdot 9 \\ & 6 \cdot 8 \\ & 6.7 \end{aligned}$ | $\begin{aligned} & 12 \cdot 6 \\ & 16.6 \\ & 15.5 \end{aligned}$ | $\begin{aligned} & 11.5 \\ & 16.5 \\ & 19.0 \\ & \hline \end{aligned}$ | $3 \cdot 1$ <br> 4.4 <br> 4.5 | $16 \cdot 9$ <br> $27 \cdot 2$ <br> $30 \cdot 6$ | $\begin{aligned} & 21.6 \\ & 36.7 \\ & 37.5 \\ & \hline \end{aligned}$ | $\begin{aligned} & 112.7 \\ & 161.0 \\ & 170.1 \\ & \hline \end{aligned}$ |

INDEX NUMBERS OF PRICES IN 13 COUNTRIES.
Mainly based upon the Monthly Bulletin of the United Nations. $\dagger$

I. WHOLESALE, \% OF JAN.-JUNE, 1939

III. RETAIL, FOOD ONLY, \% OF JAN.—JUNE, 1939


| Monthly Averages or Months． | STOCKS \＆SHARES \｜ |  |  |  | MONEY＊ |  | $\begin{gathered} \text { NEW } \\ \text { CAPITAL } \\ \text { ISSUES } \end{gathered}$ |  | OTHER BANKING． |  |  |  |  |  |  |  |  |  | TREASURY BILLS． |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Indu | $\frac{u \text { strials }}{\sqrt{n \frac{\pi}{s}}}$ | Fixed Interest |  | $\begin{aligned} & \text { 加\$ } \\ & \text { 台出 } \end{aligned}$ | 官要 |  |  | Bank of England． |  |  | Nine Clearing Banks |  |  |  |  |  |  |  | BILLS． |  |
|  | $\begin{aligned} & \text { A8 } \\ & 0.0 \\ & 0.0 \\ & \text { 日i } \end{aligned}$ <br> \％of <br> 1924 |  | $\begin{aligned} & \text { ó } \\ & \text { 4. } \\ & 0.0 \\ & 0 \\ & \text { B } \\ & \text { \% of } \\ & 1924 \end{aligned}$ | $\begin{aligned} & \text { o } \\ & \text { yo } \\ & \text { O. } \\ & \text { B } \\ & \text { \% of } \\ & 1924 \\ & \hline \end{aligned}$ |  |  | $\begin{aligned} & \text { for } \\ & \text { U.K. } \\ & \text { £ Mn. } \end{aligned}$ |  | £Mn． |  |  | ${ }^{\text {s silsoded }}$ <br> £Mn． |  <br> £Mn． | £Mn. |  |  | 오운 <br> 운ज훙 <br> ష్మై <br> － <br> \％ |  |  |  | 䂞 |
| 1913 Av． | $62 \cdot 5$ | － | 138 | $72 \cdot 5$ | － | $4 \cdot 38$ | $3 \cdot 7$ | $20 \cdot 2$ |  |  |  |  |  |  |  |  |  |  |  |  | EM |
| 1919 Av． | 106 | － | 91 | 110 | － | 3.95 | $15 \cdot 7$ | $19 \cdot 8$ |  |  | 411 |  |  |  |  |  |  |  |  |  |  |
| 1920 Av． | 106 | － | 79 | 127 | － | $6 \cdot 36$ | $27 \cdot 6$ | $32 \cdot 0$ |  |  | 449 |  |  |  |  |  |  |  |  |  | 949 1045 |
| 1921 Av． | 72 | － | 81 | 124 | $4 \cdot 3$ | $5 \cdot 20$ | $8 \cdot 3$ | $18 \cdot 0$ |  |  | 435 | 1768 | 361 |  | 815 | 309 |  |  |  |  | 1084 1148 |
| 1922 Av． | 82 |  | 96 | 105 | $2 \cdot 0$ | $2 \cdot 62$ | 8.4 | $19 \cdot 6$ |  |  | 399 | 1727 | 335 |  | 732 | 372 |  |  | 581 | 234 | 1148 815 |
| 1923 Av． | 101 | － | 102 | 98 | $2 \cdot 0$ | 2.78 | $5 \cdot 6$ | $17 \cdot 0$ |  |  | 385 | 1631 | 271 |  | 744 | 338 |  |  | 482 | 152 | 815 |
| 1924 Av． | 100 |  | 100 | 100 | $2 \cdot 4$ | $3 \cdot 45$ | $7 \cdot 4$ | 11.2 |  |  | 390 | 1632 | 242 |  | 791 | 324 | 11.7 | 48.5 | 442 | 159 | 601 |
| 1925 Av． | 109 | － | 98.3 | 101．8 | $3 \cdot 5$ | $4 \cdot 15$ | $11 \cdot 0$ | $7 \cdot 3$ | 72 | 55 | 383 | 1623 | 223 |  | 839 | 270 | 11.9 | 51.7 | 460 | 150 | 601 610 |
| 1926 Av． | 115 |  | 96.4 | 103.8 | $4 \cdot 0$ | $4 \cdot 48$ | 11.7 | $9 \cdot 4$ | 69 | 55 | 374 | 1626 | 214 |  | 876 | 249 | 11.8 | $53 \cdot 8$ | 490 | 130 | 620 |
| 1927 Av． | 124 | － | 96.9 | $103 \cdot 2$ | $3 \cdot 7$ | $4 \cdot 24$ | $14 \cdot 7$ | $10 \cdot 7$ | 66 | 53 | 373 | 1675 | 216 |  | 888 | 238 | 11.6 | $54 \cdot 5$ | 506 | 114 | 620 |
| 1928 Av． | 142 | － | $99 \cdot 2$ | $100 \cdot 8$ | $3 \cdot 6$ | $4 \cdot 16$ | $18 \cdot 3$ | 18.3 | 65 | 52 | 372 | 1729 | 235 |  | 933 | 239 | $11 \cdot 1$ | $53 \cdot 9$ | 496 | 117 | 6218 |
| 1929 Av． | 139 | － | $96 \cdot 3$ | 104．0 | $4 \cdot 6$ | $5 \cdot 3$ | $13 \cdot 3$ | $7 \cdot 9$ | 63 | 50 | 361 | 1762 | 226 |  | 974 | 242 | 10.7 | $55 \cdot 3$ | 521 | 239 | 760 |
| 1930 Av ． | 112 | － | $99 \cdot 4$ | $100 \cdot 7$ | $2 \cdot 4$ | $2 \cdot 62$ | $10 \cdot 6$ | $9 \cdot 1$ | 66 | 50 | 358 | 1763 | 262 |  | 948 | 243 | 10.7 | $53 \cdot 8$ | 462 | 187 | 60 |
| 1931 Av． | 87 |  | 98.7 | 106.8 | $2 \cdot 9$ | $3 \cdot 53$ | $3 \cdot 7$ | $3 \cdot 8$ | 65 | 54 | 354 | 1723 | 254 |  | 904 | 285 | 10.4 | $52 \cdot 5$ | 487 | 142 | E |
| 1932 Av． | 84 | － | 112.4 | $90 \cdot 3$ | $1 \cdot 7$ | 1.94 | $7 \cdot 0$ | $2 \cdot 4$ | 81 | 51 | 360 | 1752 | 307 |  | 830 | 332 | $10 \cdot 5$ | $47 \cdot 6$ | 533 | 188 | 72 |
| 1933 Av． | 103 | － | 124.4 | $80 \cdot 7$ | 5 | －71 | $7 \cdot 9$ | $3 \cdot 3$ | $\overline{102}$ | $\overline{55}$ | 371 | 1914 | 352 |  | 746 | 519 | $10 \cdot 9$ | $39 \cdot 0$ | 582 | 327 | 208 |
| 1934 Av． | 125 | － | 132.5 | $75 \cdot 7$ | ． 5 | －81 | $8 \cdot 9$ | $3 \cdot 6$ | 102 | 54 | 378 | 1842 | 288 |  | 740 | ＋543 | $11 \cdot 3$ | $40 \cdot 2$ | 473 | 377 | 80\％ |
| 1935 Av． | 139 | － | $136 \cdot 2$ | $73 \cdot 6$ | － 6 | －57 | 13.5 | $1 \cdot 7$ | 98 | 51 | 394 | 1961 | 264 |  | 755 | 598 | $10 \cdot 8$ | 38.5 | 473 | 393 | 66 |
| 1936 Av． | 161 | － | 136.9 | $73 \cdot 2$ | －5 | －61 | 15.9 | $2 \cdot 2$ | 96 | 54 | 432 | 2104 | 312 |  | 825 | 598 | $10 \cdot 3$ | 39.2 | 576 | 225 | 801 |
| 1937 Av． | 150 | － | $127 \cdot 7$ | 78.4 | ． 5 | －59 | 11.6 | $2 \cdot 7$ | 97 | 58 | 479 | 2172 | 276 |  | 910 | 607 | $10 \cdot 3$ | $41 \cdot 9$ | 560 | 229 | 789 |
| 1938 Av． | 123 | － | 126.6 | $79 \cdot 0$ | － 5 | －61 | $7 \cdot 7$ | $2 \cdot 1$ | 104 | 56 | 485 | 2161 | 274 |  | 930 | 593 | $10 \cdot 6$ | $43 \cdot 0$ | 547 | 330 | 877 |
| 1939 Av | 114 | － | 116．3 | $86 \cdot 2$ | － 8 | 1.20 | $3 \cdot 6$ | 1.9 | 103 | 58 | 507 | 2129 | 246 |  | 943 | 564 | 10.9 | 44－3 | 488 | 582 | 1070 |
| 1940 Av | 95 | － | $123 \cdot 0$ | $81 \cdot 6$ | $1 \cdot 0$ | 1.04 | $0 \cdot 3$ | 0.0 | 107 | 77 | 574 | 2377 | 357 |  | 906 | 621 | 10.7 | $38 \cdot 3$ | 793 | 915 | 1708 |
| 1941 Av－ | 101 | － | 131.0 | $76 \cdot 6$ | 1.0 | 1.03 | $0 \cdot 2$ | 0.0 | 118 | 69 | 652 | 2818 | 220 | $474{ }^{\circ}$ | 815 | 837 | $10 \cdot 4$ | $29 \cdot 1$ | 923 | 1466 | 2381 |
| 1942 Av－ | 113 | － | $135 \cdot 3$ | $74 \cdot 2$ | $1 \cdot 0$ | 1.03 | $0 \cdot 3$ | $0 \cdot 0$ | 131 | 60 | 807 | 3104 | 223 | 614 | 758 | 1006 | $10 \cdot 5$ | $24 \cdot 5$ | 970 | 1700 | 2670 |
| 1943 Av － | 135 | － | 134－1 | $74 \cdot 9$ | $1 \cdot 0$ | 1.03 | 0.6 | $0 \cdot 1$ | 148 | 65 | 966 | 3484 | 173 | 961 | 711 | 1072 | 10.5 | $20 \cdot 5$ | 1107 | 1871 | 2978 |
| 1944 Av | 148 | － | $133 \cdot 5$ | $75 \cdot 1$ | 1.0 | 1.03 | 0.5 | $0 \cdot 1$ | 176 | 66 | 1135 | 3953 | 164 | 1338 | 715 | 1082 | $10 \cdot 5$ | $18 \cdot 1$ | 1337 | 2148 | 3485 |
| 1945 Av ． | 156 | － | $135 \cdot 1$ | $74 \cdot 3$ | 0.9 | 0.93 | 1.4 | $0 \cdot 3$ | 207 | 68 | 1284 | 4461 | 181 | 1747 | 753 | 1072 | $10 \cdot 5$ | $16 \cdot 4$ | 1602 | 2288 | 3890 |
| 1946 Av ． | 170 | － | $140 \cdot 1$ | $71 \cdot 7$ | $0 \cdot 5$ | 0.53 | $9 \cdot 3$ | $1 \cdot 6$ | 242 | 71 | 1358 | 4846 | 443 | 1436 | 847 | 1251 | $10 \cdot 3$ | 17.5 | 1902 | 2534 | 4486 |
| JULY | 158 | $+3 \cdot 0$ | 135.6 | $74 \cdot 0$ | $1 \cdot 0$ | 1.03 |  | $\ddagger$ | 219 | 61 | 1298 | 4581 | 172 | 1924 | 725 | 1040 | $10 \cdot 4$ | $15 \cdot 8$ | 1680 | 2310 | 3990 |
| AUG． | 152 | $-4 \cdot 2$ | 135.2 | $74 \cdot 3$ | 1.0 | 1.03 | 3 | 1.5 | 211 | 67 | 1327 | 4635 | 188 | 1918 | 723 | 1043 | 10.5 | $15 \cdot 6$ | 1690 | 2285 | 3975 |
| SEPT | 154 | ＋1．7 | $134 \cdot 8$ | $74 \cdot 6$ | 1.0 | 1.03 |  |  | 219 | 73 | 1330 | 4654 | 207 | 1896 | 729 | 1062 | $10 \cdot 6$ | $15 \cdot 7$ | 1690 | 2365 | 4055 |
| OCT． | 156 | $+1 \cdot 3$ | $134 \cdot 9$ | $74 \cdot 5$ | 1.0 | 1.03 |  |  | 232 | 77 | 1325 | 4618 | 184 | 1854 | 755 | 1092 | $10 \cdot 6$ | $16 \cdot 4$ | 1710 | 2330 | 4040 |
| NOV．．．． | 161 | $+3 \cdot 5$ | $134 \cdot 8$ | 74.5 | $0 \cdot 5$ | 0.53 | ¢ $8 \cdot 7$ | 0.4 | 225 | 64 | 1326 | 4551 | 287 | 1640 | 763 | 1113 | $10 \cdot 3$ | 16.8 | 1790 | 2296 | 4086 |
| $\begin{gathered} \text { DEC. } \\ 1946 \end{gathered}$ | 155 | $-2.8$ | $133 \cdot 6$ | $75 \cdot 3$ | 0.5 | 0.53 |  |  | 217 | 78 | 1360 | 4609 | 360 | 1464 | 776 | 1146 | $11 \cdot 1$ | 16.8 | $\dagger \dagger$ | †† | 4226 |
| JAN．．． | 158 | $+3 \cdot 0$ | $135 \cdot 8$ | $74 \cdot 0$ | 0.5 | 0.53 |  |  | 221 | 79 | 1345 | 4493 | 350 | 1439 | 790 | 1142 | 10.5 | $17 \cdot 6$ | 1790 | 2421 | 4211 |
| FEB． | 159．5 | $-4 \cdot 2$ | $138 \cdot 1$ | 72.8 | 0.5 | 0.53 | ＜ $14 \cdot 4$ | $3 \cdot 2$ | 238 | 66 | 1329 | 4452 | 331 | 1414 | 800 | 1152 | $10 \cdot 3$ | 18.0 | 1720 | 2540 | 4260 |
| MAR． | 160 | $+1 \cdot 7$ | $137 \cdot 6$ | 73.0 | $0 \cdot 5$ | 0.53 |  |  | 221 | 67 | 1326 | 4513 | 368 | 1389 | 814 | 1157 | $10 \cdot 6$ | $18 \cdot 0$ | 1740 | 2683 | 4423 |
| APR． | 165 | ＋1．3 | 139.0 | $72 \cdot 3$ | $0 \cdot 5$ | 0.53 |  |  | 212 | 69 | 1346 | 4625 | 422 | 1394 | 797 | 1192 | $10 \cdot 4$ | $17 \cdot 2$ | 1820 | 2702 | 45.2 |
| MAY | 173 | $+3 \cdot 5$ | $141 \cdot 3$ | $71 \cdot 1$ | $0 \cdot 5$ | 0.53 | 25．5 | $3 \cdot 5$ | 219 | 66 | 1341 | 4653 | 457 | 1321 | 810 | 1232 | $10 \cdot 4$ | $17 \cdot 4$ | 1880 | 2559 | 4439 |
| JUNE | 179 | $-2.8$ | $140 \cdot 1$ | 71.7 | 0.5 | 0.53 |  |  | 248 | 65 | 1362 | 4797 | 510 | 1254 | 841 | 1286 | 10.4 | $17 \cdot 5$ | 1930 | 2560 | 440 |
| JULY | 179 | $+1.7$ | $140 \cdot 0$ | $71 \cdot 8$ | 0.5 | 0.53 |  |  | 258 | 63 | 1371 | 4863 | 506 | 1331 | 838 | 1309 | $10 \cdot 4$ | 17•2 | 1930 | 2479 | 4402 |
| AUG． | 176 | $+1 \cdot 7$ | $140 \cdot 1$ | $71 \cdot 8$ | 0.5 | 0.53 | \} $44 \cdot 6$ | $9 \cdot 1$ | 243 | 86 | 1383 | 4940 | 450 | 1452 | 855 | 1295 | 10.7 | $17 \cdot 3$ | 1940 | 2489 | 4429 |
| SEPT | 171 | $-0.6$ | $140 \cdot 5$ | 71.6 | 0.5 | 0.53 |  |  | 247 | 76 | 1366 | 5040 | 392 | 1610 | 879 | 1296 | 10.5 | 17．4 | 1950 | 2508 | 4458 |
| OCT． | 164 | $+3 \cdot 0$ | $140 \cdot 7$ | 71.4 | 0.5 | 0.53 |  |  | 260 | 74 | 1362 | 5132 | 457 | 1567 | 896 | 1308 | $10 \cdot 3$ | $17 \cdot 5$ | 1980 | 2535 | 4515 |
| NOV．．．． | 176 | $+5 \cdot 0$ | $144 \cdot 6$ | $69 \cdot 4$ | 0.5 | 0.53 | $27 \cdot 2$ | $3 \cdot 3$ | 271 | 70 | 1366 | 5234 | 481 | 1566 | 912 | 1315 | $10 \cdot 4$ | 17－4 | 2050 | 2464 | 4514 |
| DEC． 1947 | 184 | $+2.5$ | $144 \cdot 0$ | $69 \cdot 7$ | 0.5 | 0.53 | ） |  | 266 | 71 | 1398 | 5407 | ． 588 | 1499 | 934 | 1330 | $8 \cdot 8$ | $17 \cdot 3$ | 2100 | 2468 | 4568 |
| JAN． | 191 | $-0.5$ | 144•3 | $69 \cdot 5$ | 0.5 | 0.53 |  |  | 299 | 82 | 1386 | 5352 | 601 | 1503 | 947 | 1329 | $8 \cdot 4$ | 17－7 | 2150 | 2467 | 45 |
| FEB． | 179 | $-1.0$ | $143 \cdot 7$ | $69 \cdot 8$ | $0 \cdot 5$ | 0.53 | \} $36 \cdot 2$ | $8 \cdot 3$ | 274 | 84 | 1375 | 5250 | 640 | 1380 | 960 | 1339 | $8 \cdot 4$ | $18 \cdot 3$ | 2155 | 2441 | 45. |
| MAR． | 181 | $-2.9$ | 141.6 | $70 \cdot 9$ | $0 \cdot 5$ | 0.53 |  |  | 289 | 104 | 1385 | 5285 | 727 | 1265 | 975 | 1355 | $8 \cdot 4$ | $18 \cdot 4$ | 2185 | 2628 | 4813 |
| APR． | 181 | $-3 \cdot 8$ | 141.7 | $70 \cdot 9$ | 0.5 | 0.53 |  |  | 306 | 109 | 1397 | 5312 | 688 | 1294 | 1009 | 1360 | $8 \cdot 5$ | $19 \cdot 0$ | 2185 | 2709 | 4894 4817 |
| MAY | 193 | $+8 \cdot 3$ | 142.4 | $70 \cdot 5$ | 0.5 | 0.53 | ＜ $26 \cdot 8$ | $6 \cdot 2$ | 291 | 105 | 1390 | 5300 | 638 | 1297 | 1043 | 1368 | $8 \cdot 3$ | $19 \cdot 7$ | 2190 | 2627 | 4817 |
| JUNE．．． | 191 | $+4.9$ | 141.5 | $71 \cdot 0$ | 0.5 | 0.53 |  |  | 296 | 101 | 1395 | 5382 | 649 | 1278 | 1068 | 1378 | $8 \cdot 2$ | $19 \cdot 8$ | 2180 | 2592 | 477 |
| JULY | 188 | $-1.4$ | $140 \cdot 0$ | $71 \cdot 7$ | 0.5 | 0.53 | $32 \cdot 9$ | $12 \cdot 8$ | 304 | 103 | 1406 | 5370 | 679 | 1233 | 1076 | 1386 | $8 \cdot 4$ | $20 \cdot 0$ | 2180 | 2541 | 4721 |
| AUG． | 166 | $-11.9$ | 132.5 | $75 \cdot 6$ | 0.5 | 0.53 | $3 \cdot 1$ | 0.2 | 295 | 110 | 1412 | 5359 | 705 | 1199 | 1093 | 1390 | $8 \cdot 5$ | 20.4 | 2180 | 2428 | 4608 |
| SEPT | 160 | $-4.9$ | 133.0 | $75 \cdot 4$ | 0.5 | 0.53 | $1 \cdot 2$ | 3.9 | 291 | 103 | 1383 | 5344 | 736 | 1138 | 1094 | 1391 | 8.3 | 20.5 | 2190 | 2500 | 4690 4781 |
| OCT． | 159 | $-0.9$ | $135 \cdot 7$ | $73 \cdot 9$ | 0.5 | 0.53 | 3．7 | $0 \cdot 2$ | 296 | 106 | 1369 | 5417 | 800 | 1105 | 1120 | 1397 | $8 \cdot 2$ | $20 \cdot 6$ | 2220 | 2562 | 4781 4771 |
| NOV．．． | 168 | ＋4．6 | $137 \cdot 5$ | $73 \cdot 1$ | 0.5 | 0.53 | $7 \cdot 9$ | 0.9 | 298 | 108 | 1360 | 5494 | 778 | 1151 | 1140 | 1397 | 8.4 8.4 | 20.7 20.8 | 2250 2250 | 2527 2569 | 4771 4819 |
| DEC．．．． | 177 | $+5 \cdot 0$ | $136 \cdot 9$ | $73 \cdot 3$ | 0.5 | 0.53 |  | 1.0 | 304 | 106 | 1363 | 5651 | 768 | 1241 | 1148 | 1381 | $8 \cdot 4$ | $20 \cdot 8$ | 2250 | 2569 | 4819 |
| 1948 | 185 | $+2 \cdot 9$ | $137 \cdot 9$ | $72 \cdot 7$ | 0.5 | 0.53 | $38^{\circ}$ |  | 296 | 118 | 1285 | 5498 | 776 | 1172 | 1165 | 1378 | $8 \cdot 2$ | $21 \% 2$ | 2210 | 2474 | 4681 |

II Approximate before 1924．$\dagger$ Exclusive of Investments in Affiliated Banks it Not available．
＊Minimum rates from 1933.
$\ddagger$ Figures below are quarterly totals to mid－1947．

| STOCKS \＆SHARES－ | Index Nos．of Prices and Yield as percentage of |
| :---: | :---: |
|  | Sensitive Index．－Geometric Mean of monthly percentage changes． |
| NEW CAPITAL ISSUES | Issues during month in Gt．Britain（a），for U．K．（b），for Abroad，ex 1945 to mid－1947． |
| BANK OF ENGLAND－ | Deposits．11th－ 17 th of month． |
|  | Bank Notes and Currency Notes in circulation 11 th -17 th of month．Issues amalgamated，November 22 nd ， 1928. |
| PRINCIPAL BANKS－ | ＂Current Deposit and other accounts，＂etc．Before September，1939，averages for the month of 9 clearing banks （i．e．－excluding the National Bank，Ltd．，and the District Bank），afterwards，data for last making up day of |
| TREASURY BILLS－ | the month． |
|  | From June，1940，to May，1946，end of month ；otherwise 11th -17 th of month． |
|  | Issued by tender．Total of Bills issued by tender during 13 weeks preceding date of Exchequer Return． |
|  | Otherwise Issued．Total of Treasury Bills in existence less those issued by tender． |
| MONEY－ | Day－to－Day Rate and 3 Months＇Rate．Averages for week ending 15th of month． |


| WHOLESALE. |  |  |  |  |  |  |  |  | RETAIL. |  |  | WAGES |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Monthly Averages or Months. | Price of Gold. <br> s. per fine oz. | Bar Silver (Cash). <br> d. per oz. | Board of Trade Index Nos. Materials, General. Food. etc. <br> Per Cent of 1924. |  |  | Statist (Sauerbeok) <br> Index Nos. <br> Raw <br> Food. Materials. Total. <br> Per Cent of 1924. |  |  | M. of Labour. <br> Cost of Living. Food. <br> Per Cent of 1924. |  |  | Index of Average Weekly Wago-Rates \% of Dec. 1924 |
| M1913 Av.... | 84.75 |  | 60 | 60 | 60 | 59 | 62.5 | 61 | 57 | 59 | 68 | $57 \ddagger$ |
| 1919 Av.... | 90.33 | 57 | - | - | - | 142 | 152 | 148 | 123 | 129 | 71 | 110 |
| 1919 Av.... 1920 Av... | 112.0 | 61.4 | 185.0 | $163 \cdot 6$ | 198.0 | 180 | 181 | 180.5 | 142 | 150 | 82 | 130 |
| 1921 Av.... | 107.0 | $36 \cdot 9$ | 118.3 | $125 \cdot 7$ | 115.5 | 121.5 | 105 | 111.5 | 129 | 135 | 101 | 143 |
| 1922 Av.... | $89 \cdot 5$ | $34 \cdot 4$ | $95 \cdot 6$ | $99 \cdot 3$ | $93 \cdot 6$ | 100 | $90 \cdot 5$ | 94 | 105 | 103 | 104 | 110 |
| 1923 Av.... | $90 \cdot 25$ | 31 | 95.6 | 93.0 | +100 | 94 100 | 91 100 | 93 100 | 99 100 | 99 100 | 101 | 98 100 |
| 1924 Av.... | -93.62 | 34 32 | 100 95.7 | 100.1 | 100 93.4 | 100 98.5 | 100 98 | 100 98 | 101 | 100 | 100 | 1001 |
| 1925 Av... 1926 Av... | $85 \cdot 5$ 84.83 | 28.7 | 89.1 | 93.1 | 87.0 | 91.5 | 89.5 | 90.5 | 98 | 96 | 101 | 1002 |
| 1927 Av.... | ", | $26 \cdot 0$ | $85 \cdot 2$ | $91 \cdot 4$ | $82 \cdot 0$ | 87.5 | 88.5 | 88 | 96 | 94 | 103 | $100{ }^{2}$ |
| 1928 Av... | ", | 26.7 | $84 \cdot 4$ | $91 \cdot 6$ | $80 \cdot 7$ | $87 \cdot 5$ | 85 | 86 | 95 | 92 | 103 | 100 |
| 1929 Av.... | " | 24.4 | $82 \cdot 1$ | 87.4 | $79 \cdot 4$ | 84.5 | 81.5 | 83 | 94 | 90.5 | 104 | $99 \frac{1}{4}$ |
| 1930 Av.... | " | $17 \cdot 7$ | $71 \cdot 9$ | $76 \cdot 1$ | $69 \cdot 6$ | 74 | 66.5 | 70 | 90 | 85 | 104 | 981 |
| 1931 Av.... | 92.5 | $14 \cdot 6$ | $62 \cdot 9$ | 67-4 | $60 \cdot 8$ | 64 | 56 | 59.5 | $84 \cdot 5$ | 77 | 105 | 97 |
| 1932 Av.... | 118 | $17 \cdot 8$ | $61 \cdot 3$ | $66 \cdot 7$ | $58 \cdot 9$ | 61 | $55 \cdot 5$ | $57 \cdot 5$ | $82 \cdot 5$ | 74 | 105 | 951 |
| 1933 Av.... | $124 \cdot 9$ | $18 \cdot 1$ | $61 \cdot 4$ | $63 \cdot 1$ | $60 \cdot 7$ | 57 | 57 | 57 | $79 \cdot 5$ | $70 \cdot 5$ | 106 | 94 |
| 1934 Av.... | $137 \cdot 65$ | 21.2 | $63 \cdot 2$ 63.7 | $64 \cdot 8$ $66 \cdot 0$ | $62 \cdot 4$ $62 \cdot 7$ | $59 \cdot 5$ 59 | 58 61.5 | 59 61 | $80 \cdot 5$ 81.5 | 72 | 106 | 94 |
| 1935 Av.... | $142 \cdot 10$ $140 \cdot 29$ | $29 \cdot 0$ $20 \cdot 2$ | $63 \cdot 7$ $67 \cdot 6$ | 66.0 69.9 | $62 \cdot 7$ $66 \cdot 7$ | 69 | 65 | 64 | 84 | 76.5 | 108 | $97 \frac{1}{2}$ |
| 1937 Av. | 140.76 | $20 \cdot 1$ | $77 \cdot 9$ | 77.8 | $78 \cdot 0$ | 71.5 | 75 | 73.5 | 88.5 | 82 | 103 | 100 |
| 1938 Av.... | 142.5 | $19 \cdot 5$ | $72 \cdot 6$ | $74 \cdot 1$ | $72 \cdot 1$ | 65 | 66 | $65 \cdot 5$ | 89 | 82 | 109 | $104 \frac{1}{4}$ |
| 1939 Av. | 154 | 20.5 | $73 \cdot 6$ | $74 \cdot 1$ | 73.4 | 65 | 72 | 69 | 91 | $83 \cdot 5$ | 110 | $105 \frac{3}{}$ |
| 1940 Av.... | 168 | $22 \cdot 2$ | $97 \cdot 8$ | $101 \cdot 0$ | $96 \cdot 3$ | 86 | 96.5 | 93 | $100 \cdot 5$ | 97 | 111 | 117 |
| 1941 Av.... | 168 | $23 \cdot 4$ | $109 \cdot 3$ | 111.1 | 108.4 | 96.5 | 106 | $102 \cdot 5$ | 113.5 | 98.5 | 112 | 127 |
| 1942 Av.... | 168 | $23 \cdot 5$ | 114.2 | 119.8 | 111.4 | 108.5 | $109 \cdot 5$ | $109 \cdot 5$ | 114 | 95 | 112 | 1364 |
| 1943 Av.... | 168 | $23 \cdot 5$ | 116.6 | 121.6 | $114 \cdot 1$ | $106 \cdot 5$ | 113.5 | 111 | 113.5 | $97 \cdot 5$ | 112 | 144 |
| 1944 Av.... | 168 | $23 \cdot 5$ | 119.0 | $120 \cdot 1$ | 118.4 | $105 \cdot 5$ | 120 | 114 | 115 | 99 | 112 | $152 \frac{1}{2}$ |
| 1945 Av.... | $170 \cdot 5$ | $30 \cdot 1$ | 121.0 | $120 \cdot 2$ | 121.4 | 107 | 124 | 117 | 116 | $99 \cdot 5$ | 112.5 | $160 \frac{3}{4}$ |
| 1946 Av.... 1945 | 172.25 | $48 \cdot 8$ | 125.5 | $120 \cdot 3$ | 128.2 | 107.5 | 140.5 | 128 | 116 | 99 | 114 | 174 $\frac{1}{1}$ |
| JULY ...... | $172 \cdot 25$ | $25 \cdot 5$ | $122 \cdot 3$ | 122.5 | $122 \cdot 2$ | $108 \cdot 5$ | $125 \cdot 5$ | 119 | 117 | 101 | 113 | 162 |
| AUG. ....... | 172.25 | 25.5 | 122.1 | 122.2 | $122 \cdot 1$ | 106.5 | 124 | 117.5 | 116 | 99 | 113 | 163 亳 |
| SEPT....... | 172.25 | 25.5 | 121.5 | $120 \cdot 4$ | 122.0 | 106 | 124 | 117 | 116 | 99 | 113 | 163 \% |
| OCT. | 172.25 | 44 | 121.4 | $120 \cdot 3$ | 121.9 | 106 | 124 | 117 | 116 | 99 | 113 | $163 \pm$ |
| NOV. ...... | 172.25 | 44 | 121.4 | 120.5 | 121.7 | 106.5 | 123.5 | 117 | 116 | 99 | 113 | 163 |
| DEC. 1946 | 172.25 | 44 | 121.3 | 119.9 | 122.0 | 106.5 | 124 | 117.5 | 116 | 99 | 113 | $164 \frac{1}{3}$ |
| JAN. | 172.25 | 44 | 123.2 | 119.8 | 124.9 | 107 | 126.5 | 119 | 116 | 99 | 113 | 1683 |
| FEB. | 172.25 | 44 | 123.0 | 119.8 | $124 \cdot 7$ | 107.5 | 127 | 119.5 | 116 | 99 | 113 | 1704 |
| MAR. ...... | 172.25 | 44 | 123.2 | - 120.4 | $124 \cdot 7$ | 107.5 | 127.5 | 120 | 116 | 99 | 113 | 170 |
| APR. | 172.25 | 44 | 123.7 | $120 \cdot 6$ | $125 \cdot 2$ | 108 | $129 \cdot 5$ | 121 | 116.5 | 99 | 114 | $173 \frac{1}{4}$ |
| MAY | 172.25 | 44 | 124.0 | $120 \cdot 8$ | $125 \cdot 7$ | 107.5 | $130 \cdot 5$ | 122 | 116 | 99 | 114 | 175 |
| JUNE | 172.25 | 44 | 124-1 | $120 \cdot 6$ | $126 \cdot 1$ | $107 \cdot 5$ | 131 | 122 | 117 | $100 \cdot 5$ | 114 | 175 |
| JULY | 172.25 | 44 | 126.4 | $122 \cdot 4$ | $128 \cdot 6$ | 109 | $135 \cdot 5$ | $125 \cdot 5$ | 117 | $100 \cdot 5$ | 114 | 1761 |
| AUG. | 172.25 | $55 \cdot 5 *$ | 126.6 | $121 \cdot 1$ | $129 \cdot 6$ | 107 | 138 | $126 \cdot 5$ | 116 | 98.5 | 114 | 1761 |
| SEP. | 172.25 | 55.5 | 127.0 | $120 \cdot 4$ | $130 \cdot 7$ | $107 \cdot 5$ | 144 | 130 | 116 | 98.5 | 114 | 176 |
| OCT. ...... | 172.25 | 55.5 | $127 \cdot 2$ | 119.6 | 131.4 | 108 | 162.5 | 141 | 116 | $98 \cdot 5$ | 114 | $177 \frac{1}{4}$ |
| NOV. ...... | $172 \cdot 25$ | -55.5 | 128.2 | 119.2 | $133 \cdot 1$ | 107 | 165.5 | 142.5 | 116.5 | 98.5 | 114 | 1781 |
| DEC. $1947$ | 172.25 | 55.5 | 128.9 | 118.9 | 134.3 | 108 | 167.5 | 144 | 116.5 | 98.5 | 114 | $178 \frac{1}{4}$ |
| JAN. | 172.25 | $55 \cdot 5$ | $130 \cdot 1$ | $119 \cdot 2$ | $136 \cdot 2$ | 109 | 174 | 148.5 | 116 | 98.5 | 114 |  |
| FEB. ...... | 172.25 | 44** | 131.2 | $120 \cdot 3$ | $137 \cdot 2$ | 109 | $177 \cdot 5$ | 151 | 116.5 | 99 | 114 | $178 \frac{1}{4}$ |
| MAR. | $172 \cdot 25$ | 46 | 131.5 | $120 \cdot 5$ | 137.5 | 109 | 180.5 | 152.5 | 116 | 98.5 | 114 | 1781 |
| APR. | 172.25 | 46 | $134 \cdot 0$ | $124 \cdot 3$ | $139 \cdot 3$ | 110 | $184 \cdot 5$ | $155 \cdot 5$ | 116 | 95 | 118 | $178 \frac{1}{1}$ |
| MAY | 172.25 | $44 \cdot 25$ | 135.5 | $125 \cdot 3$ | 141.0 | $109 \cdot 5$ | $185 \cdot 5$ | 156 | 116 $116+$ | $94 \cdot 5$ $94 \cdot 5$ + | 119 $119+$ | 1788 1781 |
| JUNE | $172 \cdot 25$ | 43 | 136.0 | $126 \cdot 1$ | 141.4 | 114.5 | 184 | 157 | $116 \dagger$ | $94.5 \dagger$ | $119 \dagger$ | 1781 |
| JULY | 172.25 | 39.75 | 138.5 | $127 \cdot 8$ | $144 \cdot 3$ | 117.5 | 188.5 | 160.5 | 101 | 101 | 100 | 1794 |
| AUG. . | 172.25 | 39.75 | 138.9 | $127 \cdot 0$ | $145 \cdot 5$ | 119.5 | 190 | 162.5 | 100 | 99 | 100 | 179 |
| SEPT....... | 172.25 | 42.75 | $139 \cdot 8$ | $125 \cdot 2$ | $148 \cdot 1$ | $119 \cdot 5$ | 194 | $164 \cdot 5$ | 101 | 100 | 100 | 1817 |
| OCT. ${ }^{\text {NOV }}$. | 172.25 | $43 \cdot 25$ | 142.8 | 127.2 | $151 \cdot 6$ | 121 | 201 | 170 | 101 | 101 | 100 100 | $181 \pm$ |
| DEC. | $172 \cdot 25$ 172.25 | 5 45 | 145.2 | $129 \cdot 8$ $130 \cdot 6$ | $153 \cdot 9$ 154.2 | 123.5 | ${ }_{212}$ | $177 \cdot 5$ | 104 | 103 | 100 | 1861 |
| JAN. ..... | . $172 \cdot 25$ | 45 |  |  |  |  |  |  |  |  |  | 188 |
| $\ddagger$ Ifalics, old series approximated. <br> \|| Provisional to end of series. |  |  |  | * From Aug 6th.** Mid-month from Feb., 1947.June 17th. Subsequently new mid-month <br> interim index- $\%$ of June 17th, 1947. |  |  |  |  |  |  |  |  |

PRIGE OF GOLD-
BOARD OF TRADE INDEX-
STATIST (SAUERBECK)
COSt of LIVING INDEX-
RETAIL FOOD, RENT-
WAGE INDEX-

Annual averages of London daily rates. From Sept. 1939, Bank of England official rate.
Average (cash) price of bar silver; to Dec. 1944, Standard (. 925 fine); from Jan. 1945, . 999 fine.
Geometric Mean of Wholesale Prices (average for month) of 200 commodities as percentage of 1924 average; prior to 1930 only 150 commodities.-BOARD OF TRADE JOURNAL.

Wholesale prices of 19 foodstuffs and 26 raw materials on aast day of month.-STATIST. Ministry of Labour's index showing movement since 1924 in cost of maintaining unchanged the standard of living prevalent in working-class households before Aug., 1914. For 1st of month, but placed against provious month,-e.g., reading for March 1 st is shown against February. Series ended June, 1947. See note t above, As above, for food only and for rent and rates.
For description see Sp. Memo No, 28 and Bulletin for Jan., 1944, pp. 6-8.

$\ddagger$ Change in classification in 1919. Italics as in 1913. † Delivered weight after 1946 . About $4 \%$ less than gross weight previously given.

EXTERNAL TRADE.-Excluding Munitions from 1940-5. Accounts of Trade of U.K.-Board of Trade,
COAL. - Output of Saleable Coal, including opencast, Gt. Britain-Ministry of Fuel.
IRON AND STEEL.-Output of Pig Iron, Steel Ingots and Castings-Iron and Steel Control.
ELECTRICITY.- Units generated by Authorised Undertakers, Great Britain-Electricity Commission.
RAYON.
Units generated by Authorised Undertakers, Great Britain- Electricis. Subsequently delivered weight (i.e., ex waste)-Board of Trade.


RETAIL SALES.-Index of value of sales in Departmental Stores, Co-operatives, multiple and independent shops. Each Index is based on average daily sales during the whole of 1942 for the category to which it relates. Index numbers are derived from the percentage movements of the daily sales for any month as compared with the corresponding month of the previous year until 1945 when series relates to veekly sales. For discussion see Board of Trado Journal, April 1st, 1944, and April 19th, 1947.-BANK OF ENGLAND.
P08T OFFICE
RECEIPT8 -Daily averages, ex telegraph, telephone, savings bank and postal orders,-BOARD OF TRADE JOURNAL. UNEMPLOYMENT.-MINISTRY OF LABOUR GAZETTE.

## THE SECOND HALF OF 1947 IN THE U.S.A.

By A. G. Hart, Columbia University.

Despite earlier fears of a downturn, full employment continued in the United States through the second half of 1947. Inflation picked up speed again in the summer ; and there was lively concern about inflation control. Barring a complete legislative blocking of the European Recovery Programme, most observers seem to feel the inflationary drift will continue at least into the summer of 1948.

Production and Employment.-Unemployment, as measured by the Census labour force sample, was between 2.5 and 2.6 Mn . in June and July, or just under $2 \%$ of the non-agricultural labour force. During the autumn, though, it dropped off well below 2 Mn .-giving considerably less unemployment than the low figures of late 1946. Unemployment compensation data confirm the impression of full employment.

There were two interruptions of coal supply by labour disputes in 1947-in April (with a loss of about a week's output), and in the early summer (with a loss of about a fortnight's output). Stocks of coal being very low, these interruptions affected industrial output. The July drop of manufacturing output, to around $6 \%$ below capacity, as shown by production of nearby months, apparently springs from coal. But by and large the production figures tell the same full employment story as the employment figures.

TABLE 1.
COMPARISON OF FACTORY OUTPUT AND
EMPLOYMENT, THIRD QUARTERS, 1946 AND 1947.

| Industry | Percentage increase in : |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | Output | Em. ploy. ment | Fac. tory hours | Manhours | Output per manhour |
| All manufactures | $2 \cdot 9$ | $4 \cdot 5$ | $-0.4$ | $4 \cdot 1$ | $-1.4$ |
| All durables ... | $1 \cdot 9$ | $4 \cdot 3$ | $0 \cdot 4$ | $4 \cdot 7$ | $-2.7$ |
| All non-durables | $3 \cdot 8$ | $4 \cdot 8$ | $-1 \cdot 3$ | $3 \cdot 5$ | 0.3 |
| Iron and steel | $2 \cdot 7$ | $5 \cdot 6$ | 0.8 | $6 \cdot 6$ | $-3.6$ |
| Machinery ... . | $6 \cdot 7$ | $5 \cdot 8$ | $-0.2$ | $5 \cdot 6$ | $1 \cdot 0$ |
| Transportation equip. ment | $-8.7$ | $-3 \cdot 0$ | 0.4 | $-2.6$ | $-6 \cdot 3$ |
| Non-ferrous metals | $7 \cdot 0$ | $-3 \cdot 1$ | $-1 \cdot 6$ | $-4 \cdot 6$ | $12 \cdot 2$ |
| Lumber and products | $3 \cdot 3$ | $12 \cdot 8$ | $2 \cdot 5$ | $15 \cdot 6$ | $-10.7$ |
| Stone, clay, glass | $0 \cdot 7$ | $2 \cdot 3$ | $0 \cdot 3$ | $2 \cdot 6$ | $-1.9$ |
| Textiles and products | $-4 \cdot 2$ | 3.0 | $-2.9$ | $0 \cdot 1$ | $-4 \cdot 3$ |
| Leather and products | $-0.6$ | $0 \cdot 2$ | - 1.0 | $1 \cdot 2$ | $-1.8$ |
| Manufactured food | $7 \cdot 2$ | $12 \cdot 8$ | $-0.4$ | $12 \cdot 4$ | $-4.6$ |
| Tobacco ... | $5 \cdot 7$ | $-1.2$ | 0.6 | $-0.6$ | $6 \cdot 4$ |
| Paper and products ... | $5 \cdot 7$ | $2 \cdot 5$ | $-0.8$ | $1 \cdot 7$ | $4 \cdot 0$ |
| Printing, etc. ... | $8 \cdot 6$ | 6.7 | $-2.4$ | $4 \cdot 1$ | $8 \cdot 6$ |
| Chemicals | $5 \cdot 9$ | $5 \cdot 8$ | $0 \cdot 4$ | $6 \cdot 2$ | $-0.4$ |
| Petroleum and products | $10 \cdot 6$ | $4 \cdot 3$ | $1 \cdot 1$ | $5 \cdot 4$ | 4.8 |
| Rubber and products ... | $-5 \cdot 1$ | $-3.3$ | $-2 \cdot 3$ | $-5 \cdot 6$ | 0.4 |

As in the first half-year, the hoped-for gains of output relative to employment have failed to materialise. Official figures for the third calendar quarters of 1946 and of 1947 show percentage increases in various branches of manufacturing as in Table 1.

The average change shown is probably not large enough to be statistically significant. But if we were making up for arrears in productivity, the figures would wear a more cheerful look.

Gross product figures, despite the lack of adequate deflators to correct for price changes, also suggest that productivity is failing to gain. In seasonally adjusted quarterly totals at annual rates, at current prices, the main items run as follows :-

TABLE 2.
COMPONENTS OF GROSS NATIONAL PRODUCT OR EXPENDITURE ( $\$ 000 \mathrm{Mn}$.).


The gains in consumption and expenditure and in gross national product match almost exactly with the gains in the official cost-of-living index. This implies next to no gain in output despite the growth of the labour force and the margin of time in which to correct the 1946 production handicaps.

Wages and Prices.-After a breathing spell in the spring, most prices rose rapidly during the summer. Underlying factors were, however, quite different for different groups of prices.

To begin with wages, the effects of the
"second round " of wage increases appeared in a fairly sharp rise of hourly wage-rates in the spring, followed by a more gradual continuing rise. From March to October, 1947, average hourly rates in manufacturing rose about $6.6 \%$ half of this between April and June. The final phase of the "second round " laid the foundation for the "third round" in 1948. Coal-miners' wages, which had held between $\$ 1.45$ and $\$ 1.50$ per hour since June, 1946, rose from $\$ 1.47$ in May to $\$ 1.82$ in September-or by nearly $25 \%$ after a relatively brief strike in June and July. This brought miners' hourly rates aboye all of the nearly 50 occupations for which the Bureau of Labor Statistics quotes averages, with the sole exception of skilled construction workers (averaging $\$ 2.10$ per hour). Steel workers (with $\$ 1.40$ per hour) and auto workers (with $\$ 1.52$ per hour) were thus left out of line.

The coal-wage rise was the signal for an upward movement of many of the "rigid prices." "Mine run" coal rose from $\$ 6.37$ in June to $\$ 7.41$ in August. The " finished steel composite" price, which had been $\$ 0.0329$ per pound of finished steel from January through July, jumped to $\$ 0.0360$ in August. These price rises spread so fast that the general wholesale price index for metals and metal products rose from 142.6 in June to 148.9 in August. Manufactured products as a whole, after standing just below 142 through April, May and June, jumped to 151.6 in September.

On the side of food prices, both rising incomes and the crop situation have pointed upward. Feed grains suffered first from floods delaying planting, then during the late summer from drought, and the feed crop came out nearly $20 \%$ less than in 1946 . The European wheat crisis reinforced this domestic situation, the weighted average of maize prices rose from $\$ 1.68$ a bushel in May to $\$ 1.95$ in June, and $\$ 2.37$ in September. The winter wheat crop turned out unexpectedly well, so that the weighted average of wheat prices fell from $\$ 2.68$ in March to $\$ 2.40$ in July ; but it rose sharply in the late summer and early autumn, going well over $\$ 3$ in the autumn. Meat prices rose sharply in the summer, but failed to keep up with the rise of feed. The " hog-corn ratio," which gauges the profitability of feeding livestock, dropped from 14.4 bushels of corn per 100 lb . of hogs in May to 11.1 in August, and recovered only to 12.4 in October. The resulting liquidation of breeding stock lowered meat prices in the autumn, and brought livestock herds within the measure of the feed supply (incidentally creating safeguards against unexpected diversion of wheat into feed).

But it created the prospect of a pork shortage which will extend from the spring of 1948 to the spring of 1949, and is likely to create lively demands for wage increases in 1948.

Money and Finance - The growth of the non-bank public's stock of cash was resumed in the spring, and amounted to about $4 \%$ for the second half of 1947. This expansion rested chiefly on growth of bank loans; at weekly reporting banks alone (covering about $60 \%$ of bank loans), the growth of loans in the second half of 1947 was $\$ 3,500 \mathrm{Mn}$. $(17 \%)$.

While overall figures show the public's financial position as highly liquid, the price rise has caused evaporation of a good deal of the excess liquidity, and corporations have used up a large part of their government bond portfolios. The lively demand for loans and the active flotation of new securities despite relatively unfavourable prices, testify that much of current domestic investment is being financed on the market. This includes housing and consumer purchases of durables. Thus, we are getting into a zone where restrictive monetary policy can pretty clearly slow down or reverse the advance. There is evidence of some tightening of credit-not only a moderate raising of interest rates, but also a tightening of " credit rationing." Term loans are not being granted so readily, and "marginal borrowers" are being discouraged.

The bank reserve position is tightening. Excess reserves continue moderate and shortterm government securities are less nearly equivalent to cash reserves. The "unpegging" of Treasury Bills at mid-year was followed by a rise of open-market yields on bills from $\frac{3}{8} \%$ in the spring to around $\frac{7}{8} \%$ in the autumn. Besides, banks are less well stocked with shortterm securities. From $\$ 12,600 \mathrm{Mn}$. in the middle of 1946, bills and certificates at weeklyreporting member banks were down to $\$ 5,600 \mathrm{Mn}$. at the middle of 1947 , and $\$ 4,600 \mathrm{Mn}$. at year's end. The fall of prices of Treasury bonds in the autumn brought official support into play at prices just above a $2 \frac{1}{2} \%$ yield basis in the last weeks of the year. It remains to be seen whether support at or near this level can be managed without " open-ending " bank reserves ; but enough bond accounts show paper losses at prices in this range to discourage many holders from selling.

The most sensational banking development of the half-year was the proposal of Governor Eccles of the Federal Reserve for supplementary reserve requirements. This was a move to require commercial banks to hold a certain
U.S. STATISTICS


proportion of deposits in government securities, in addition to the proportion held in cash reserves, thus " freezing in the banks" a large part of their holdings and enabling the Federal Reserve to squeeze bank reserves by openmarket operations. This proposal was opposed not only by bankers but by Secretary of the Treasury Snyder, and is not being actively pressed. Even without it, banks can be kept under pressure to restrict credit in early 1948, as the Treasury will have a large excess of cash income over cash outgo in the first four months of the year. The power to restrict instalment credit will probably be revived, and credit agencies with power over real estate mortgages are likely to stiffen credit standards. Beyond that date, it may prove impossible to prevent a renewal of rapid credit expansion and simultaneously to support the bond market.
| Inflation and the Marshall Plan.-Inflation and the European Recovery Programme have been linked in the public mind by political pronouncements from both parties. This leads to an unpleasant possibility that the Marshall Plan and the Administration's inflation-control programme may kill each other off politically. Actually, the link between the two is not so close as it looks. If the Recovery Programme were whittled down to the barest relief programme, the food supply of the United States would stand almost unchanged. The feed shortage, the depleted livestock herd and the meat shortage would still be there. The fact is that scheduled exports exceed $1 \%$ or $2 \%$ of prospective supplies only for wheat, rice, dried fruits, citrus, lard, dried and evaporated milk-items normally exported, and for which scheduled exports do not go very far beyond the prospective " surplus." Barring heavy unemployment, the rise in food prices would be much the same; and so,
obviously, would be the prospective effects of letting rent control expire as scheduled on February 29th. These are the main factors underlying the inflationary 1948 wage prospects.

The bulk of the Marshall Plan exports are to be machinery and other metal products; petroleum and coal exports also have some leverage. The metal fabricators already have substantial backlogs of orders. The Marshall Plan will not affect their level of activity (which is already full). It may affect prices by making these fabricators more willing to mark up prices on their products, and to accept wage increases rather than interrupt production; but it is far from clear that business price and wage policy will be altered. Perhaps the most strategic inflation factor among the exports is coal; for stocks are so low that a long coal strike would be intolerable. But even here, dropping the Marshall Plan might not ease inflation much; for the United Mine Workers might well insist on cashing in on their unusual bargaining power while it lasted.

What the Marshall Plan really does to the inflation problem is to lengthen the horizon. It does not promise as large an export surplus as we had in 1947; and but for the meat situation, virtually all inflationary factors would be weaker in 1948 than in 1947. But with our foreign responsibilities stretching so far ahead, it no longer looks safe to rely on a spontaneous relaxation of inflation pressure to make antiinflation policy unnecessary. At the same time, the so-called anti-inflation bill enacted late in December is only a gesture (relying chiefly on voluntary private action) ; and the Administration's official programme (so far as it can be sized up from the moves of the last few months, and still in advance of release of the Budget Message) is little more. An election year is an unlikely time for an active anti-inflation policy.


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## LONDON \& CAMBRIDGE ECONOMIC SERVICE

## TABLE OF CONTENTS

United Kingdom : The Economic Position...PAGE39The Budget and the National Income ..... 40
Industrial Production, 1935-48 ..... 50
Finance ..... 55
Prices and Wages ..... 57
External Trade ..... 60
World Commodity Survey ... ..... 61
Output of Building and Civil Engineering Industries ..... 69
Statistical Tables71-75
Overseas : Canada ..... 76

## THE ECONOMIC POSITION.

April 30th, 1948.
During the first quarter of 1948 industrial production has been running at about $10 \%$ above the average for 1947. Coal production and employment in the coal mines are rising, though more slowly than had been hoped, the output of steel is again higher and production of textiles is improving gradually. The signs of abatement of inflationary pressure in some directions have been on the whole confirmed, and there is reason to hope that the check to inflation will be strengthened by the surplus of government revenue provided for in the 1948/9 budget, which is large even on the strictest definition of income. It seems likely that the prospective savings of public authorities, together with business and private savings, would be sufficient to provide for the amount of net investment planned for 1948 even without any adverse balance of payments.

While, however, the internal condition of the country continues to show signs of improvement, the balance of payments position remains acutely difficult. The excess of imports (f.o.b.) over exports and re-exports during the first quarter is estimated at about $£ 60 \mathrm{Mn}$. It is therefore extremely likely that the Economic Survey's estimate of $£ 87 \mathrm{Mn}$. for the import surplus for the whole of the first six months of 1948 will be substantially exceeded. The rise in exports, to $129 \%$ of the 1938 volume in March, has been on the whole fairly encouraging, and the total exports and re-exports for the quarter, at
$£ 369 \mathrm{Mn}$., amounted to over $52 \%$ of the Economic Survey estimates for the first half of the year. The unexpectedly large adverse balance for the quarter was due to the sharp rise in imports in March, which brought the (f.o.b.) total for the quarter to about $£^{4} 429 \mathrm{Mn}$., or over $54 \%$ of the estimate for the half year. Unless the second half of the year shows a very marked improvement, it seems likely that the adverse balance of payments of the United Kingdom for 1948 on income account alone will be barely covered by receipts under the old dollar credits and the European Recovery Programme, leaving any net exports of capital (including the net changes in sterling balances) to be met out of gold reserves.

To describe this country's position as a crisis is inaccurate, for in a crisis the difficulties, however acute, are temporary. We are still at an early stage of a prolonged and painful period of re-adjustment, the difficulties of which will tend to increase as the European Recovery Programme tapers off and ceases. It is for this reason that any resources released by an excess of saving should be employed firstly to expand exports, and secondly for expanding investment at home or abroad in ways which will increase our exports or reduce our dependence on imports in the fairly near future. Only if they cannot be used for either of these purposes should they be made available to increase the flow of goods and services for home consumption.

# THE BUDGET AND THE NATIONAL INCOME, 1948-49. 

By R. C. Tress.

This year's Budget, opened on April 6, was an historical occasion. The Chancellor of the Exchequer's speech was a " financial and economic statement," and the Debate itself, lasting five days, ranged over the whole field of the Government's national economic policy as represented in the Economic Survey for 1948 (Cmd. 7344). The Budget proposals were presented and discussed as a part of that policy or, as the Chancellor himself preferred, of the " National Economic Plan."


#### Abstract

Government expenditure and revenue ought not to be considered in isolation from their effects upon the general economic prospects of the country; nor can any survey of the economic situation of the country be complete without a knowledge of the Government's Budget proposals. The combination under a single Minister of the co-ordination of our external and internal economy with the control of Government expenditure and revenue was an important change in our planning machinery. The new task of the Chancellor of the Exchequer is not merely to balance the Budget ; it is a much wider one-to match our resources against our needs so that the main features of our economy may be worked out for the benefit of the community as a whole."*


The Chancellor accepted the changed role formally and in substance.

The Budget must, therefore, to fit in with the economic plan set out in the Survey, have two main objectives-first, to obtain, with an equitable distribution of the load of taxation, a real and substantial surplus, which more than provides for all Government expenditure, capital and current, and leaves over a balance, to be used to counter the inflationary pressure; and second, so to adjust taxation as to encourage production, by providing a better incentive to producers." $\dagger$
The purpose of this article is to enquire to what extent these objectives have been reached.

## The Budget Proposals.

Discussion of the second objective is fairly straightforward. The net effect of all the tax changes, compared with the yield of revenue if no changes had taken place, was a mere $£ 11 \mathrm{Mn}$. for the financial year, 1948/9, but this net change embraces a turnover, including the ups and downs of purchase tax, of over $£ 140 \mathrm{Mn} \ddagger$

Income tax accounted for the greater part of the reductions ( $£ 86 \mathrm{Mn}$.). The exemption limit

[^13]was raised to $£ 135$. The earned income relief was increased from one-sixth to one-fifth on earned incomes up to $£ 2,000$ (instead of $£ 1,500$ ). The band of income charged at the reduced rate of 6 s . in the $£$ was extended from $£ 75$ to $£ 200$. Lastly, a married woman in employment became eligible for reduced rate relief in respect of her earned income in addition to "wife's allowance" on the joint income of husband and wife. These changes represent an imaginative attempt at minimising the adverse effects on incentive to work of high marginal rates of direct taxation on both lower and middle ranges of income.

The other main changes, culminating in a loss of revenue, were in respect of purchase tax ( $£ 18 \mathrm{Mn}$. net). The Chancellor on the whole resisted the well-publicised campaign for widespread reduction in the tax, but the number of different levels of the tax was reduced from five to three and, in consequence, whilst the purchase tax on some goods was raised, the level of $125 \%$, which had led to widespread evasion, was abandoned, and tax on a number of household goods which had previously stood at $50 \%$ was reduced to $33 \frac{1}{3} \%$. The compensating increases in taxation are to come from two sources : drink, tobacco and betting ( $£ 69 \mathrm{Mn}$.) and a once-for-all " special contribution" demanded of persons with an investment income (last year) exceeding $£ 250$ a year and total income exceeding $£ 2,000$, and levied on the investment income at rates ranging from 2 s. on $£ 250$ to 10 s. on $£ 5,000$. As a once-for-all " capital levy," the total yield is estimated at $£ 105 \mathrm{Mn}$., of which $£ 50 \mathrm{Mn}$. is expected to be collected in the financial year, 1948/9. This last proposal is, of course, the most controversial. Its political significance, in a period of history when political gestures are thought necessary, is obvious. But as a measure of public finance, the principal ground on which it should be judged is the degree to which it contributes to the removal of inflationary pressure. Its significance is best related to the next section of this article.

The full range of tax changes proposed in the Budget is contained in Table 1 .

Sir Stafford Cripps's efforts to minimise the effects of taxation upon incentive are probably the best that can be done, given present levels of Government expenditure. His achievements in respect of his first objective present a more difficult problem of evaluation. We need to relate Government revenue and expenditure for 1948/9 to private demand and the national income for

TABLE 1.
CHANGES IN TAXATION, APRIL 1948.

| $\begin{array}{lc} \hline \text { DEOREASES. } & (£ 000 \text { 's) } \\ 1948 / 9 \end{array}$ |  | Full Year | Increabes. <br> Income tax : <br> More vigorous treatment of " expense allowances " and of the profits of small farmers | $\begin{aligned} & \left.00^{\prime} \mathrm{s}\right) \\ & 1948 / 9 \end{aligned}$ | Full Year |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Income tax: | 40,000 | 46,500 |  |  |  |
| Increased earned income relief, age relief and exemption limit |  |  |  |  |  |
| Widening of income range subject to reduced rate and application to |  |  |  | 150 | 2,750 |
| earnings of married women in | 46,000 | 54,500 | Drink | 41,050 | 45,000 |
| employment ... ... |  |  | Tobacco | 19,500 | 20,000 |
| Change in form of relief for life insurance premiums | - | 5,250 | Betting | 8,500 | 11,000 |
| Customs and excise:Purchase tax alterations (net) ... | 18,000 | 24,000 | " Special contribution" |  |  |
|  |  |  |  | 69,200 | 78,750 |
| Reduced duty on " living " entertainments | 3,750 | 4,500150 |  | 50,000 | $(55,000)$ |
| Unsweetened table waters ... ... | 100 |  |  |  |  |
| Repeals and reductions of duty consequent on Geneva Agreements ... | 50 | 100 |  |  |  |
|  | 107,900 | 135,000 | Excess of incre | $119,200$ | $(133,750)$ |

the same period. The Economic Survey for 1948 (paras.197-228) discussed the inflationary problem for the calendar year 1948 in terms of existing rates of taxation and forecasts of national income and expenditure made last February. But the budget estimates are drawn up on different definitions of revenue and expenditure from those used for the Government accounts in the national income tables. Other public authorities besides the central government have to be taken into account. The White Paper on National Income and Expenditure, published on April 5 (Cmd. 7371) shows substantial revision in the official estimates of national income for 1947, but fresh forecasts for 1948, or, better, the financial year 1948/9, have not, unfortunately, been provided.

The remainder of this article will be an attempt to fill these gaps. This can be done only roughly, because some important data are not published and others can be ascertained only by detailed research and enquiry which time does not allow. One can only make the attempt and hope that, in future years and with the transformation of the Budget complete, the Chancellor will give to the public, as part of the Budget speech, the official version of the calculations which presumably went into the making of his decisions. As far as the estimates below are concerned, it should be observed that repetition of the same figures through a number of tables in no way improves their original accuracy.

## Size of the Budget Surplus.

The first stage of the statistical reconstruction is to transpose the Budget estimates into a proper "Central government account," replacing the traditional separation of items above and below "the line" by a division into current and capital transactions on economic definitions of those
terms. It is around these figures that controversy regarding the significant size of the Budget surplus revolves, and the Chancellor has taken up the issue both by giving encouragement to discussion in his Budget speech and by including, in this year's Financial Statement, side by side with the traditional lay-out, a rearrangement of the figures designed to present a more realistic picture of governmental activity.*

It is a useful, but not a satisfactory table. The figures relate only to the past financial year and, whilst the Chancellor's Budget speech added many of the corresponding figures for 1948/9, only some of those omitted are readily available elsewhere. Much more unfortunate, however, is the fact that whilst the arrangement of figures is revised, the cash basis of "receipts and payments," which is the characteristic of all Government accountancy, is maintained. There are a number of items, therefore, both in the revenue and in the capital accounts of the revised table, which are not and should not be included in a proper income and expenditure system. Thus, the revenue table (given below with the known figures for 1948/9 added) not only excludes Excess Profits Tax refunds and payments of War Damage claims from the outgoing side of the account-this is debatable groundbut it includes on the incoming side a number of items which properly belong to other accounts. The "Housing Receipts from Votes," for example, is really a part of capital depreciation, $\dagger$ and the " gifts from Australia and New Zealand" are best regarded as belonging to the capital account, as also to the balance of payments capital account. $\ddagger$ A large number of capital

[^14]TABLE 2.
THE " ALTERNATIVE CLASSIFICATION." £Mn.

| Receipts. | 1947/8 | 1948/9 |
| :---: | :---: | :---: |
| Tax Revenue | 3,269 | 3,512 |
| Broadcast Licences | 11 | 1 |
| Crown Lands ... ... | 11 | 1 |
| Sundry loans (interest)... | 11 | $\cdots$ |
| Miscellaneous ... .... | $\begin{array}{r}98 \\ \hline\end{array}$ | 15 |
| Interest outside the Budget ... Housing receipts from Votes ... | 9 12 | 18 |
| Housing receipts from Votes Gifts from Australia and N. Zealand | 30 |  |
| Total Revenue receipts | 3,401 | ... |

items have been excluded from the total of Government "Miscellaneous Receipts," but the figure remaining is still higher than can be easily reconciled with figures for 1947 in the National Income White Paper. $\dagger$

If direct attack thus proves unsuccessful, a more profitable line may be to start at the opposite end: to begin with the central government accounts as given in the National Income White Paper, and, tracing through the appended notes, set figures (where necessary, reasonable guesses) against the various items which must be added to "Ordinary Revenue" and "Ordinary Expenditure," in order to transpose them into a true revenue and expenditure account. The purpose of such " corrections" is either to add to revenue or expenditure income accruing or expenditure undertaken which does not appear in the Exchequer accounts, or else to remove those receipts and payments which are of the nature of capital or loan transactions. The addi-
$\dagger$ See Note 2 to Tables, and also Finance Accounts of the U.K., 1946-47, pp. 25-28.

| Interest on Debt | $\ldots$ |
| :--- | ---: |
| Other Expenditure | $\ldots$ |
| Interest outside Budget |  |
| Post-war credits | $\ldots$ |
| Total Revenue payments |  |
| Surplus | $\ldots$ |$\ldots$


| $1947 / 8$ | $1948 / 9$ |
| ---: | ---: |
| 503 | 500 |
| 2,495 | $\ldots$ |
| 9 | 15 |
| 56 | 20 |
| 3,063 | $\ldots$ |
| 338 | 609 |
| 3,401 | $\ldots$ |

tional practices of the White Paper of reckoning National Debt interest as negative income from property, and of showing only net transfers to the National Insurance Fund and local authorities, can be ignored at this stage, since they involve equal subtraction from both sides of the account and do not, therefore, affect the size of the deficit which it is our main interest to establish at this point.

The corrections to the current account appear to be as shown in Table 3.

This calculation yields, it will be noticed, a central government deficit on current account in $1947 / 8$ of $£ 85 \mathrm{Mn}$. and a surplus in 1948/9 of $£ 395 \mathrm{Mn}$., against the Chancellor's estimates of surpluses in both years of $£ 338 \mathrm{Mn}$. and $£ 598 \mathrm{Mn}$. respectively. As already noted, however, the Chancellor excluded E.P.T. refunds and payments on War Damage claims from his revenue payments. If these are excluded from current expenditure (see Table 4 below), the resulting estimates of the Budget surpluses come much nearer the Chancellor's figures.

TABLE 3.
CURRENT REVENUE AND EXPENDITURE: STATISTICAL DERIVATION. £Mn.


See page 50 for footnotes to tables.

If these items are excluded from the current account, however, it is pertinent to enquire the basis for so doing and whether there may not be other items, possibly on the expenditure side, possibly on the side of revenue, which ought to be subject to the same treatment. The reason for their exclusion, surely, is not for any peculiar role they play in the Government's own accounts, but because of the way in which they are treated by their recipients. The private sector of the economy treats them as capital items -as receipts into its capital account. But if this is to be the criterion, we ought to exclude from current expenditure in 1948/9 compensation to doctors for losing their right to sell practices ( $f_{5} 5 \mathrm{Mn}$.) and, more important for the magnitudes involved, we ought also to exclude from the Government's current revenue all those receipts which the private sector of the economy regards as payments out of its capital account. It is now fairly well established that estate duties fall into this category. So, too, do stamps paid on the transfer of property; they are an indirect tax on capital transactions. And for 1948/9 we must exclude from Government current revenue the greater part of the yield of the "Special Contribution" by recipients of investment income, which the Chancellor has himself declared to be a tax which at least the larger contributors will normally pay out of capital. If these "transfers from private capital account" are excluded along with the "transfers to private capital account," the Budget in 1947/8 just about balanced, but a surplus of $£ 315 \mathrm{Mn}$. remains for 1948/9.

TABLE 4.
ALTERNATIVE DEFINITIONS OF THE BUDGET SURPLUS. £Mn.
$\left.\begin{array}{ll|l|l|r}\hline\end{array} \begin{array}{ll}\text { Excess of "Ordinary revenue " }\end{array}\right)$

Of the last three, which is the right definition of " Budget surplus" to adopt? This must be governed by our interest. Our main concern at
present is with the amount of current income which is withdrawn by the Government from the private sector of the economy and so made available for investment, and for this purpose transfers between the private and Government sectors of the economy which the private sector treats as being on capital account must be excluded. These may affect the volume of private saving ; this possibility will be referred to later. But, directly, they do not affect the size of disposable current income in private hands ; and the last definition of Budget surplus, i.e., excluding payments both into and out of private capital account, must therefore be regarded as the most appropriate.

## The Public Authority Accounts.

Table 5 shows the accounts of the central government drawn up on the basis described above, i.e., on the same basis as in the National Income White Paper (Appendix II), except that transfers into and out of private capital account (cf. Table 11) appear in the Government capital account also, and not the current account. Differences between the results shown and the figures in the Exchequer accounts are fairly easily traceable so far as the large elements are concerned. The present method gives a deficit for the calendar year 1947 of $£ 432 \mathrm{Mn}$. turning into a surplus of $£ 7 \mathrm{Mn}$. for the financial year 1947/8. This is in close accord with the Chancellor's statement that increases in income and reductions in expenditure made between the first quarter of 1947 and the first quarter of 1948 accounted for "over $£ 500 \mathrm{Mn}$. in round figures." $\star$ The fact that the present method is up to $£ 100 \mathrm{Mn}$. short of that figure can be explained for the most part by $£ 85 \mathrm{Mn}$. under the Argentine Agreement having been shifted from the 1947/8 account to the 1948/9 account. Moreover, between 1947/8 and 1948/9 this change makes a difference of $£ 170 \mathrm{Mn}$. It also provides, therefore, the major part of the explanation of why "ordinary expenditure" in the Exchequer accounts shows a fall of $£ 211 \mathrm{Mn}$. between 1947/8 and 1948/9, whereas current expenditure in Table 5 falls by only $£ 56 \mathrm{Mn}$.

The remarkable change between the first quarter of 1947 and the first quarter of 1948 is reflected in the capital as well as the current account. Nevertheless, despite sales of $£ 197 \mathrm{Mn}$. of surplus stores, Government expenditure on capital account in 1947/8 still exceeded receipts, and a net $£ 17 \mathrm{Mn}$. had to be borrowed to cover outgoings. In 1948/9, however, the central

[^15]TABLE 5.
central government.

government should have very substantial sumsnot far short of $£ 450 \mathrm{Mn}$.-in hand. These may be used in various ways, for financing borrowing by public corporations, which are here included in the private sector, or by local authorities, or for the repayment of debt. But in all cases the effect will be to make funds available for financing capital formation by others than the central government. $\dagger$ Besides the surplus of $£ 315 \mathrm{Mn}$. on current account, receipts from capital levies-death duties and the " special contribution "-come into the accounts at this point, and these transfers out of private capital account are estimated to exceed by $£ 85 \mathrm{Mn}$. the transfers into private account involved in E.P.T. refunds and further payment of war damage claims. At the same time, Government expenditure on roads as well as on prefabricated houses has been reduced, so that, with sales of surplus stores still large, Government net capital formation will continue negative.

For the most part the accounts of the whole public authority sector, including national insurance funds and the local authorities, follow the pattern of those of the central government, which
introduction of the new National Insurance Scheme in July will transfer to contributors part of the increased cost of old age pensions raised in advance last year and temporarily borne by the central government. On the other hand, the introduction of the National Health Service will shift expenditure from the local to the central authorities. The effect on the economy as a whole of those changes is better seen from the combined accounts of all public authorities than from the accounts of the central government alone.

The making up of the accounts of the other authorities is not easy. Forecasts of the finances of the National Insurance Fund were provided by the Government Actuary as an addendum to the Bill proposing the setting up of the service.* These have to be modified in that employment prospects are better than assumed by the Actuary, so that payments of unemployment benefit will be smaller and receipts from contributors larger. The contribution to the Health Service (given as $£ 36 \mathrm{Mn}$. in a full year) has to be included in the tax receipts but deducted from the transfers from the central government to which it is handed

NATIONAI TABLE 6.
NATIONAL INSURANCE FUNDS.

is, of course, by far the largest partner. It is, however, useful to include these if possible partly to complete the picture, partly to escape, certain arbitrary features which mar the central government accounts, looked at alone. The

[^16]over. Even allowing for this, the figures of central government expenditure given in the Supply Estimates appear high. The new service, of course, will only be in operation for threequarters of the financial year.

The local authority accounts also present difficulties. The cost of a number of services, in particular education, will rise and the Supply Estimates provide for an increase of $£ 35 \mathrm{Mn}$. in central government grants. The changes in respect of health and social security, however, relieve local authorities of an annual expenditure

* Cmd. 6729.
of some $£ 60 \mathrm{Mn}$. from July onwards and on this reckoning, whilst a fall in current expenditure is unlikely, it is difficult to foresee an increase at a greater rate than in previous years. If, therefore, as seems to be the expert view, aggregate rate revenue is reduced very little, a surplus on current account slightly larger than in recent years is to be expected. The capital account is straightforward except for the loss of electricity
undertakings, of an estimated value of $£ 200 \mathrm{Mn}$. These assets are covered by loans to the local authorities and when they are transferred the local authorities will, in effect, become lenders to the electricity authority of past borrowed funds. Since the transfer will take place only gradually, however, it is best ignored for the present, and the reduction in net borrowing which the process allows taken account of when it, in fact, happens.

TABLE 7
LOCAL AUTHORITIES

| REVENUE. £ Mn. |  |  |  | EXPENDITURE. $£ \mathrm{Mn}$. |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 1947 | 1947/8 | 1948/9 |  | 1947 | 1947/8 | 1948/9 |
| Indirect Taxes Income from Property | 280 10 | 295 10 | 290 10 | Current Expenditure on Goods and Services <br> Housing Subsidies | 540 24 | 555 25 | $\begin{array}{r} 590 \\ 26 \end{array}$ |
| Grants from Central Governm | 30 | 505 |  | Transfers to Private Current Account. <br> Outdoor Relief ... | 13 | 15 | 4 |
|  |  |  |  | Saving. <br> Surplus on Current Account ... | 13 | 15 | 20 |
| Revenue on Current Account | 590 | 610 | 640 | Expenditure on Current Account | 590 | 610 | 640 |
| Surplus on Current Account | 13 | 15 | 20 | Gross Capital Formation ... | 345 | 350 | 360 |
| Depreciation Allowances | 113 219 | 115 220 | 110 230 |  |  |  |  |
| Revenue on Capital Account | 345 | 350 | 360 | Expenditure on Capital Account | 345 | 350 | 360 |

TABLE 8.
PUBLIC AUTHORITIES.

| REVENUE. £ Mn. |  |  |  |  | EXPENDITURE. $£ \mathrm{Mn}$. |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 1938 | 1947 | 1947/8 | 1948/9 |  | 1938 | 1947 | 1947/8 | 1948/9 |
| Taxes. <br> Direct Taxes paid out of Private Current <br> Account | 438 | 1,622 | 1,695 | 1,841 | Current Expenditure on Goods and Services <br> Subsidies | $\begin{array}{r} 789 \\ 36 \end{array}$ | $\begin{array}{r} 2,168 \\ 442 \end{array}$ | $\begin{array}{r} 1,950 \\ 445 \end{array}$ | $\begin{array}{r} 1,960 \\ 451 \end{array}$ |
| Indirect Taxes paid out of Private Current Account ... |  | 1,793 | 1,897 | 2,033 | Transfers to Private Current |  |  |  |  |
| Total Tax Revenue ... | 1,079 | 3,415 | 3,592 | 3,874 | Account. <br> Social Security Payments ... <br> Miscellaneous Transfers | $\begin{array}{r} 229 \\ 41 \end{array}$ | $\begin{aligned} & 430 \\ & 254 \end{aligned}$ | $\begin{aligned} & 474 \\ & 187 \end{aligned}$ | $\begin{aligned} & 519 \\ & 130 \end{aligned}$ |
| Income from Property. <br> Trading Profits, Interest and Rent ... <br> Deduct : National Debt Interest | 57-223 | $\begin{array}{r} 87 \\ -544 \end{array}$ | $\begin{array}{r} 107 \\ -539 \end{array}$ | $\begin{array}{r} 141 \\ -530 \end{array}$ | Total Expenditure on Current <br> Account | 1,095 | 3,294 | 3,056 | 3,060 |
|  |  |  |  |  | Saving. Surplus on Current Account | $-182$ | $-336$ | 104 | 425 |
| Public Revenue on Current Account | 913 | 2,958 | 3,160 | 3,485 | Public Expenditure on Current Account | 913 | 2,958 | 3,160 | 3,485 |
| Surplus on Current Account ... Maintenance Provision | 182110 | $\begin{array}{r} -336 \\ 137 \end{array}$ | $\begin{aligned} & 104 \\ & 144 \end{aligned}$ | $\begin{aligned} & 425 \\ & 145 \end{aligned}$ | Capital Formation. <br> Gross Fixed Capital Formation Change in Value of Inventories Deduct: Sales of Surplus Stores | 240 | 481 | 47533 | 445 |
|  |  |  |  |  |  | 240 | 42 |  |  |
| Direct Taxes paid out of Private Capital Account | 78 | 163 | 172 | 200 |  | - | $-200$ | $-197$ | -100 |
| Indirect Taxes paid out of Private Capital Account | 15 | 163 38 | 172 44 | 200 45 | Total Capital Formation ... | 240 | 323 | - 311 | 345 |
| Net Borrowing from Private Sector | 219 | 627 | 155 | $-305$ | E.P.T. Post-war Refunds Payments on War Damage Claims <br> Compensation to Doctors | - | 40 | 28 | 20 |
|  |  |  |  |  |  | - | 266 | 280 | 140 |
|  | 240 | 629 | 619 | 510 |  |  |  |  |  |
| Public Revenue on Capital Account |  |  |  |  | Public Expenditure on Capital Account | 240 | 629 | 619 | 510 |

From Tables 5, 6 (National Insurance Funds) and 7 (Local Authorities) are derived combined current and capital accounts for all public authorities. These are shown in Table 8. The combined current account bears most of the characteristics of the central government current account, except that the trend in social security payments is clearer and the surpluses on current account are for all years some $£ 100 \mathrm{Mn}$. larger. Similarly, with the capital account, because Local Authority borrowing is greater than the accumulations of the National Insurance Funds, the combined volume of net borrowing regularly exceeds the net borrowing of the central government by some $£ 130-£ 140 \mathrm{Mn}$. In $1948 / 9$ the reduction of debt (" net lending ") of public authorities as a whole is $£ 140 \mathrm{Mn}$. less than the debt reduction of the central government alone.

In 1947/8 the collective surplus of public authorities, with other capital receipts, was insufficient to meet capital payments and finance public authority investment. In 1948/9 the surplus with these other funds will be more than adequate. The effect of the Budget surplus, together with higher National Insurance contributions and maintained local rates, will be that, in 1948/9, the public authorities will have $£_{305 \mathrm{Mn} \text {. in hand, whereas in 1947/8 they had }}$ to borrow $£ 155 \mathrm{Mn}$. Is this sufficient ?

Investment, Savings and the National Income.
The inflationary problem can be looked at in a number of ways. The most revealing in the present context is to enquire, first, as to the volume of private savings required having regard to the size of the investment programme and the contributions of the public sector towards its financing and, secondly, whether, in view of the size of the prospective national income, that volume of private savings is likely voluntarily to be provided otherwise than through an enlargement of money incomes and prices.

The Economic Survey for 1948 (Cmd. 7344) gave a figure of $£ 1,800 \mathrm{Mn}$. for gross capital formation at home in the calendar year 1948, and
the Chancellor of the Exchequer reaffirmed the figure in his Budget speeches. All in all, it is probably best to adhere to it for the financial year 1948/9 also. The cutting down of investment programmes, recently begun, will have had greater effect in the later period, and the investment involved in " filling the export pipeline" will decline as the rate of expansion of exports eases off. But the cuts in fixed capital investment involving, for example, a reduction in the building labour force to $1,200,000$ by the end of this year, were somewhat optimistic in their assumptions as to the effectiveness of Government controls, so that it is prudent to retain the figure of $£ 1,800 \mathrm{Mn}$. for the financial year. In our calculations so far, $£ 345 \mathrm{Mn}$. of this $£ 1,800 \mathrm{Mn}$. has already been provided for in the capital accounts of public authorities, including $£ 145 \mathrm{Mn}$. of depreciation on Government-owned capital. If total allowances for capital depreciation are put at $£ 850 \mathrm{Mn}$. in 1948/9 (the new National Income White Paper marks up previous estimates appreciably), $£ 705 \mathrm{Mn}$. of private gross investment will be covered from this source, leaving $£ 750 \mathrm{Mn}$. of net private investment to be financed out of current income. In addition, $£ 245 \mathrm{Mn}$. of savings will be required to finance taxes paid out of capital. The imposition of a levy on capital has the effect of transferring assets from private to Government ownership, but, in the absence of inflation, does not transfer command over current resources unless there is an equivalent amount of current private saving which will release those resources. On the other hand, transfers to private capital account (which have used up part of the Government's current surplus) are available as a source of investment finance, as is, of course, Government " lending," i.e., the net reduction in public authority indebtedness. These two forms of capital transfer to private account have been estimated to amount, in $1948 / 9$, to $£ 165 \mathrm{Mn}$. and $£ 305 \mathrm{Mn}$. respectively.

Thus, $£ 525 \mathrm{Mn}$. falls to be provided either by private saving out of current income or by

TABLE 9.
COMBINED CAPITAL ACCOUNT.

| SAVINGS. £ Mn. |  |  |  | INVESTMENT, £ Mn. |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| , | 1938 | 1947 | 1948/9 |  |  | 1938 | 1947 | 1948/9 |
| Private Savings out of Current Income ... | 432 | 906 | 525 |  |  |  |  |  |
| Public Authority Surplus on Current Account | 432 -182 | 106 -336 | 425 | Home- <br> (a) By Public Authoritios |  | 240 | 323 | 345 |
|  | -182 340 | -336 638 | 705 | (b) By Private Business |  | 530 | 1,697 | 1,455 |
| Public Authority Maintenance Provision | 110 | $137$ | $145$ | Capital Investment Abrond |  | $-70$ | -675 | - |
| Total Sums set aside ... ... | 700 | 1,345 | 1,800 | Total Additions to Assets |  | 700 | 1,345 | 1,800 |

overseas borrowing, and the amount of saving needed in 1948/9, the home investment programme being unchanged, will depend upon how much we borrow from abroad in that period.

It is quite obvious that throughout the financial year we shall be running an adverse balance of payments on current account, and Marshall Aid at least for some time is now assured. But it is more useful to begin examination of the savings problem by asking whether, with the present Budget, control over the inflationary pressure has been sufficiently firmly established that we are not any longer, from this point of view, dependent upon unrequited supplies from abroad for the maintenance of stability. That is the question we shall be asking next year when we are taking the measure of Budget requirements for 1949/50; and we ought to ask it every year that we continue to draw from abroad.

Assuming that the demand to undertake capital investment at home is reasonably under control-and without very high interest rates, control at this point will continue to be necessary-the inflationary problem resolves itself into a matter of the supply of personal savings. Businesses are under pressure not to distribute profits, though the fact that a large part of company taxation at the present time is paid out of tax reserves complicates the forecasting of net business saving. It would seem, however, that if private savings of $£ 525 \mathrm{Mn}$. are needed, the requirement for savings out of personal incomes is likely to be less than $£ 300 \mathrm{Mn}$. This compares with $£ 696 \mathrm{Mn}$. in 1947 on the same definitions, ${ }^{\star}$

[^17]and looks a reasonable enough prospect. But in order to be clearer on this point it would be useful to calculate, if only roughly, the probable size of spendable incomes on the one hand and of the supply of consumers' goods and services at uninflated prices on the other.

The Economic Survey forecast for the calendar year 1948 a net national income at factor cost of $£ 9,000 \mathrm{Mn}$. But this was against an estimate for 1947 of $£ 8,600 \mathrm{Mn}$., and since then the National Income White Paper has provided revised figures of national income for 1947 which are substantially higher. Moreover, the depreciation allowances on the national capital have been radically raised. The Economic Survey, in other words, working on a gross national product (at factor cost) of $£ 9,250 \mathrm{Mn}$. for 1947, estimated a gross national product $5 \%$ higher in 1948; and if we apply the same ratio to the new figures for 1947, we get for 1948 a revised gross national product of $£ 10,000 \mathrm{Mn}$., or, assuming $£ 850 \mathrm{Mn}$. of depreciation allowances, a net national income estimate of $£ 9,150 \mathrm{Mn}$. The Economic Survey, however, was notably pessimistic regarding improvements through the year 1948. This is admittedly a difficult field for prophecy, but this country did suffer from a coal crisis in 1947, and, given that raw material imports do not fail (as is now assured), some progress is surely inevitable. Professor Meade and Mr. Paish, $\dagger$ writing before the Economic Survey was published, assumed an increase in average productivity per man of 5\% by the end of 1948, and recent trends in production indices would seem to justify their more optimistic view. On the revised figures, their estimate of the rate at which the national income should be running at the end of 1948 would be $£ 9,650 \mathrm{Mn}$. and a figure of $£ 9,500 \mathrm{Mn}$. for the $\dagger$ London and Cambridge Economic Service, Vol. 26 , Bulletin 1, February, 1948.

TABLE 10.
NET NATIONAL PRODUCT.

financial year 1948/9 does not seem unreasonable.
With a national income of this size, public authority demand for goods and services at $£ 1,960 \mathrm{Mn}$. and gross capital formation at home at $£ 1,800 \mathrm{Mn}$. (giving $£ 950 \mathrm{Mn}$. net of depreciation), personal consumption would become practicable at well over $£ 8,100 \mathrm{Mn}$., as Table 10 shows, even if our current overseas transactions were in balance. If the forecasts of money national income include allowance for an average price rise up to $5 \%$, this still permits of a $5 \%$
increase in the average level of personal consumption: not so large as that talked of by Professor Meade and Mr. Paish, who were assuming lower demands on resources from Government and capital investment as well as a higher national income, but nevertheless a recognisable improvement. Moreover, it would give a personal expenditure-savings ratio of $27: 1$ compared with a pre-war ratio-on the same definitions-of $17: 1$ and a ratio in 1947 of only $10 \frac{1}{2}: 1$, (see Table 11). It is difficult to

TABLE 11
PRIVATE RECEIPTS AND OUTLAY

believe that Sir Stafford Cripps's "special contribution" will much deter spending out of capital amongst owners of investments : indeed, it may have the reverse effect. As the Chancellor himself said, it is a matter of psychological judgment not of economics. $\dagger$ But evidence suggests that spending at large has become more conservative in the past six or nine months, and such a low rate of positive saving as $3 \frac{1}{2} \%$ of disposable incomes (compared with $5 \frac{1}{2} \%$ in 1938 on the same definitions) ought to be obtainable without inflationary methods or effects.

Sir Stafford Cripps's Budget appears, therefore, within the limits of what can be done by general measures and subject to the continuation of investment control, to have established a stable
economic position. In future Budgets, we may look forward to reductions in taxation, dependent upon the rate at which the national income expands.

The significance of our conclusions, however, does not lie only in the future. We have so far assumed that our current overseas payments are in balance, whereas we shall in fact continue to borrow from abroad throughout 1948/9. The Economic Survey forecast an adverse balance of payments on current account for 1948 of $£ 250 \mathrm{Mn}$., on which basis, the adverse balance for the financial year, 1948/9, ought not to exceed $£ 200 \mathrm{Mn}$. But insufficient steel and in some cases " saturation" of markets have brought
$\dagger$ H.C. Deb., Vol. 449, No. 98, April 13, 1948, cols. 917-8.
about a reduction of the export " target " for the end of 1948 from $160 \%$ to $150 \%$ of the 1938 volume, while bilateral negotiations over longterm contracts seem to have left imports still running high. On these grounds alone a more likely figure of net borrowing from abroad in 1948/9 would be $£ 300 \mathrm{Mn}$., even if promised Marshall Aid were not of that order. If the calculations in this article are reasonably correct, however, we can afford a combined volume of net investment at home and disinvestment abroad-what the National Income White Paper calls " additions to assets "-of $£ 950 \mathrm{Mn}$. If we could afford $£ 950 \mathrm{Mn}$. of net home investment with no adverse foreign balance, with an adverse balance of $£ 300 \mathrm{Mn}$., we could afford $£ 1,250 \mathrm{Mn}$.
investment at home.
Borrowing from abroad is most respectable when it really represents an import of capital. The purpose of Marshall Aid is to enable us to make our economy self-supporting within a fixed period of time. Sir Stafford Cripps's Budget has stabilised consumption demand and there is a good case now for using our adverse foreign balance at least mainly to benefit our at present narrowly limited programme of internal capital development in directions which would quickly increase exports or reduce imports. It is arguable, of course, that without greater consumption supplies we shall not get larger output. But it is also arguable that if we do not begin to stand on our own feet, we shall never learn how.

[^18]and repeated. Taxes paid by foreigners are included not as revenue taxes but as income from property in the same amount.
$\left.{ }^{14}\right)$ By difference.
${ }^{(15)}$ Approximate figure. See Civil Estimates.
${ }^{16}$ ) Civil Estimates, Class V, 7.
(17) Civil Estimates, Class V, 6.
(18) 1947 figure repeated.
${ }^{(19)}$ Service Votes.
${ }^{20}$ ) Civil Estimates.
${ }^{(21)}$ The Supply Votes for Local Services, following a different definition, amount to $£ 407 \mathrm{Mn}$. for $1948 / 9$, but the increase over $1947 / 8$ is only $£ 32 \mathrm{Mn}$. The same figure appears in the Local Authority current account and cancels out in the combined account of all Public Authorities (Table 8).
${ }^{22}$ ) Civil Estimates, Class V, Vote 6. For 1948/9 the transfer from the National Insurance Fund to the Central Government for medical benefit ( $£ 36 \mathrm{Mn}$. in a full year) is deducted.
${ }^{(23)}$ Health Department's annuity payments for temporary houses increase by $£ 7 \mathrm{Mn}$. : Civil Estimates, Class V, 1 and 13.
${ }^{\left({ }^{24}\right)}$ Civil Estimates, Class V, 2 and 14.
${ }^{(25)}$ Excluding stamp duties on the transfer of property.
${ }^{(26)}$ Cmd. 7344, Table VIII.

# INDUSTRIAL PRODUCTION-1935-48 COMPARISON 

By W. B. Reddaway

A first attempt has now been made to include figures for a pre-war year in the table for the new index of production which was published in the preceding Bulletin. The figures are provisional, for reasons explained in the second half of this article, which indicates briefly the methods used and their limitations. Revised figures will be included in a later Bulletin and a full account of the methods used will be given in the monograph to be published later in the year, which will describe the construction of the index in detail.

The only pre-war year for which sufficient information is available for a proper comparison is 1935, wben the last census of production was taken. Even for that year the figures for some of the groups are distinctly hazardous, and have been put in brackets in the table for that reason;
the remaining figures can probably be relied upon to give the order of magnitude of the movement fairly accurately, but there are wellknown difficulties in measuring the volume of industrial production even for census years.

It so happens that the total index for 1935, as compared with 1946, comes to almost exactly 100 -fractionally more for the A series, fractionally less for B-so that comparisons with that year can be read straight from the table. It is unsatisfactory, however, to have only a single pre-war year as a basis of comparison, and the following table therefore includes estimates for total production in 1935-8, the movement between 1935 and the other pre-war years being estimated from the Board of Trade index of production. The information available in those years was so
restricted that the estimate of this movement is subject to considerable error, and in particular it is hard to say how much of the recorded rise was due to increased production of munitions.* Nevertheless the figure for 1935-8 average is probably a better basis to take as representing "pre-war" than 1935 alone.


* That index purported to cover total production, but in fact had no series directly representing the output of munitions; the series for employment in general engineering would however reflect the growth of ordnance production, etc.

It will be seen that in 1947 the index was about $9 \%$ above 1935, and about equal to the 1935-8 average. The figure for the last quarter of 1947, however, was well above the 1935-8 average and rather higher than for any of the pre-war years, and the same is true of the provisional figure for the first quarter of 1948.

It is not possible to make similar comparisons with other pre-war years than 1935 for all the groups used in the new index, but rough comparisons can be made for a number of broad groups with the aid of the pre-war index and a few supplementary calculations. The most significant information is probably the percentage increase or decrease of 1947 over the average of 1935-8, which is given in the table below ; the

## INDEX OF INDUSTRIAL PRODUCTION (Excluding Finished Munitions) 1946 average $=100$

| Period |  | Total Index |  |  |  |  | Shipbuilding and Repairing $\dagger$ |  |  |  |  |  |  | Building, Building Materials \& Furniture |  | $\begin{aligned} & \text { B } \\ & \text { 日 } \\ & \text { बo } \\ & \text { go } \end{aligned}$ |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | A | B |  |  |  | A | B |  |  |  |  |  | A | B |  |  |  |
| Weight... |  | 1000 | 1011 | 76 | 51 | 61 | 23 | 23 | 30 | 123 | 116 | 119 | 66 | 104 | 115 | 143 | 50 | 38 |
| Av. 1935* |  | 100 | 100 | 142 | (123) | 76 | 51 | 51 | 108 | (76) | (85) | 94 | 81 | (152) | (138) | 88 | (128) | 100 |
| Av. 1946 |  | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 |
| Av. 1946 | $\ldots$ | 109 | 108 | 106 | 108 | 101 | 98 | 96 | 119 | 126 | 108 | 100 | 98 | 121 | 111 | 103 | 105 | $117$ |
| 1946 |  |  |  |  |  |  |  |  |  |  |  | 100 | 96 | 73 | 76 | 101 | 91 | 83 |
| JAN. FEB |  | 90 94 | 90 96 | 92 | 89 96 | 92 98 | 81 134 | 85 127 | 62 79 | 87 90 | 87 92 | 100 99 | 99 | 75 | 90 | 103 | 94 | 88 |
| MAR. |  | 95 | 97 | 101 | 95 | 103 | 93 | 107 | 79 | 87 | 93 | 98 | 100 | 81 | 90 | 106 | 95 | 101 89 |
| APR. |  | 94 | 95 | 95 | 94 | 101 | 80 | 98 | 88 | 96 | 92 | 100 | 99 104 | 84 92 | 96 | $\begin{array}{r}94 \\ 103 \\ \hline\end{array}$ | 101 | 100 |
| MAY |  | 101 | 101 | 104 | 105 | 106 | 109 | 100 | 93 | 101 100 | 99 98 | 103 97 | 104 97 | 92 93 | 91 | -94 | 93 | 105 |
| JUNE |  | 97 | 97 | 96 | 97 | 97 | 103 | 101 | 112 | 100 | 98 | 97 | 97 | 93 | 91 | 94 | 93 | 105 |
| JULY |  | 97 | 97 | 96 | 99 | 95 | 72 | 78 | 85 | 93 | 100 | 98 | 103 | 108 | 106 | 90 84 | 101 91 | 95 89 |
| AUG. |  | 92 | 92 | 95 | 97 | 90 | 97 | 85 | 99 | 89 | 95 108 | 93 | $\begin{array}{r}92 \\ 104 \\ \hline\end{array}$ | 103 | 115 | 89 99 | 101 | 117 |
| SEPT. |  | 106 | 106 | 105 | 108 | 102 | 130 | 123 | 119 | 102 | 108 113 | 99 106 | 105 | 130 | 120 | 105 | 115 | 110 |
| OCT. |  | 112 | 111 | 109 | 113 | 108 | 123 73 | 106 | 125 | 1120 | 116 | 107 | 106 | 128 | 117 | 109 | 119 | 116 |
| NOV. ... | $\ldots$ | 113 | 113 106 | 111 97 | 112 95 | 109 99 | 73 111 | 95 102 | 128 | 120 | 107 | 97 | 97 | 118 | 107 | 108 | 108 | 111 |
| $\begin{aligned} & \text { DEC. } \\ & 1947 \end{aligned}$ | $\ldots$ | 107 | 106 | 97 | 95 | 99 | 111 | 102 | 138 | 120 | 110 | 98 | 95 | 111 | 102 | 110 | 108 | 110 |
| JAN. |  | 107 | 106 | 103 | 116 | 104 | 102 83 | 104 | 117 60 | 112 96 | 110 | 81 | 74 | 78 | 71 | 109 | 90 | 85 |
| FEB. | ... | 85 | 84 | 72 100 | 77 | 83 | 83 89 | 66 95 | 60 100 | $\begin{array}{r}96 \\ 128 \\ \hline\end{array}$ | 107 | 97 | 91 | 96 | 89 | 109 | 100 | 106 |
| MAR. | $\ldots$ | 104 | 103 | 100 | 95 103 | 93 102 | 89 80 | 95 97 | 100 | 128 | 104 | 98 | 94 | 113 | 107 | 100 | 105 | 120 |
| APR. |  | 104 | 104 | 102 | 103 | 102 103 | 80 77 | 97 83 | 142 | 111 | 109 | 103 | 99 | 122 | 113 | 99 | 113 | 115 |
| MAY | $\ldots$ | 108 | 107 | 109 | 120 | 109 | 135 | 123 | 127 | 145 | 114 | 104 | 102 | 129 | 121 | 98 | 117 | 124 |
|  |  |  |  |  |  |  |  |  |  |  |  | 102 | 101 | 126 | 116 | 89 | 97 | 120 |
| JULY |  | 106 | 105 | 104 | 112 | 94 | 91 | 89 88 | 127 | 119 | 104 98 | 98 | 90 | 122 | 114 | 88 | 104 | 105 |
| AUG. |  | 102 | 101 | 104 | 103 | 95 108 | $\begin{array}{r}93 \\ 102 \\ \hline\end{array}$ | 88 101 | 108 | 134 | 117 | 104 | 103 | 132 | 121 | 100 | 109 | 124 |
| SEPT. ... | $\ldots$ | 115 | 114 | 113 | 117 | 108 | 102 109 | 101 | 138 | 145 | 121 | 108 | 110 | 139 | 125 | 108 | 109 | 135 |
| OCT. ${ }^{\text {NOV. }}$. ${ }^{\text {a }}$ |  | 121 | 120 | 121 | 123 116 | 111 | 109 85 | 109 85 | 129 | 153 | 126 | 107 | 112 | 142 | 126 | 115 | 108 | 134 |
| NOV. ${ }^{\text {DEC. }}$ |  | 123 116 | 122 | 123 114 | 101 | 103 | 125 | 107 | 118 | 150 | 112 | 95 | 107 | 136 | 119 | 111 | 99 | 122 |
| 1948 |  |  |  |  |  |  |  | 69 | 136 | 144 | 123 | 96 | 114 | 130 | 115 | 117 | $108$ | $129$ |
| JAN. ... |  | 119 123 | 118 121 | 125 131 | 113 116 | 113 | 59 117 | 69 91 | 128 | 152 | 124 | 96 | 115 | 141 | 123 | 117 | 107 | (136) |
| MAR. . |  | (119) | (117) | ... | ... | 115 | 116 | 110 | 130 | ... | ... | 93 | ... | $\cdots$ | ... | 109 | ... | * |

[^19]corresponding comparison with 1935 is also included, because it is considerably more accurate.

| PERCENTAGE CHANGE I | PRODUCTION |  |
| :---: | :---: | :---: |
|  | 1947 | 1947 |
| Industrial Group | of. 1935 | cf. 1935-8 |
| Textiles ... ... .. | -25 | -27 |
| Clothing and Leather | -12 | NA |
| Metal Production | +33 | +19 |
| Metal using Trades | +40 | $+20$ |
| Food, Drink, Tobacco | + 6 | -1 |
| Chemicals, etc. ... | +18 | $+12$ |
| Building and Building Materials | $-20$ | -22 |
| Fuel and Power | $+17$ | $+10$ |
| Paper and Printing | -18 | NA |
| Total (incl. other trades) | $+9$ | 0 |

This table brings out the well-known contrast between the increased output of metals, metal goods and chemicals on the one hand, and the decreased output of textiles, paper goods and building on the other. The rise of $10 \%$ in the fuel and power group masks a $14 \%$ fall in coal, which was offset by a rise of over one-third in gas and a doubling of the output of electricity. It is not an exaggeration to say that the make-up of our industrial production has been revolutionised ; by contrast, the fact that the total for 1947 was unchanged from the 1935-8 average is relatively insignificant.

Changes in Productivity.-It would be most desirable to compare the movement in output since pre-war years with the corresponding movement in the numbers at work. This is, however, a difficult and most hazardous computation, and as yet nothing more ambitious has been attempted than a rough global comparison between 1935 and 1947. It appears that the average number employed in the field covered by the index of production rose by about $15 \%$ between 1935 and 1947, against a rise in output of about $9 \%$. There are a great many reservations to be made on the comparison, in addition to those which are inherent in the comparison of total output over so long a period, but the best estimate seems to be that output per worker fell by something of the order of 5\% between 1935 and 1947. In view of the great uncertainty about the movements of output and employment in 1935-38 when munitions are excluded, it is even more hazardous to attempt a comparison with any other pre-war year.

## Developments in 1948

The table includes provisional figures for the first three months of 1948, although for some groups insufficient information is available to compute one for March. The general impression given is that the higher level of output attained in the last quarter of 1947 has been broadly maintained, despite the increase in sickness and other factors, which normally have a depressing effect in January and February.

Comparison with the first quarter of 1947 naturally shows a big increase-over $20 \%$ because of last year's fuel crisis. Although we should not rejoice unduly over this increase or expect comparable ones in later quarters, the fact remains that 1948 starts with a long lead over 1947, even though Easter fell in March this year. The lowering of production in the first quarter by an early Easter, unlike that caused by a fuel crisis, will be compensated later, and it seems clear that we must expect the year as a whole to show a rise over 1947 of more than $10 \%$. This seems to be at variance with the Economic Survey's forecast of a real national income in 1948 about equal to that in 1947, even allowing for the decline in the "output" represented by the activity of the Armed Forces.

## Comparison with Official Index

Since the last issue of the Bulletin, an official index of production has begun to be published in the Monthly Digest of Statistics. The calculations of two indexes, which inevitably use a great deal of common material, might seem an unnecessary piece of duplication, but it has been decided to continue with the London and Cambridge Index, at least for the time being. Quite apart from the value of an independent assessment of the movements, the indices do not, in point of fact, attempt to measure quite the same thing, notably insofar as the official one includes munitions ; there is an obvious use for indices measuring the volume of output both including and excluding munitions, and as yet the second need has not been officially met. Furthermore, the composition of the sub-groups is largely different.

It had been hoped to include in this article a proper comparison of the two indexes and of the movements which they show. The information so far published about the official index is so scanty, however, that this task is impossible. It is earnestly to be hoped that the public will not have to wait so long for a proper account of the interim index of production as it did for the interim index of retail prices.

## Notes on Calculation of 1935 Figures

In principle the calculation of figures for 1935 might be done similarly to those for (say) 1947. The movement between the base year, 1946, and 1935 for each industry has to be measured in quantitative terms by one or more indicators, and the results might be combined by weights related to the net output in 1946 in the way described in the last Bulletin.

Two main considerations affect the problem, however, one practical and the other theoretical. The practical one is that a great many of the indicators used to measure the movement in the post-war period are not available in comparable form for 1935, or require very hazardous corrections for price changes where deflated value figures are used; the theoretical one is that alternative calculations ought really to be made with pre-war weights, in view of the very great change in our industrial set-up.

A third consideration is also of considerable importance. Indicators which may be satisfactory enough for measuring changes in the volume of an industry's output over a short period may be unreliable when used over an interval of 11 years, especially when a war has intervened. There are two main reasons for this: first, the average quality of the articles covered by a statistical heading may have changed -e.g., our output of cotton cloth may now contain a larger proportion of high-grade fabrics for the home market and less cheap cloth for India; and secondly, the industry may in 1935 have been devoting a greater (or smaller) proportion of its activity to producing goods other than those which have been chosen as "typical"-e.g., the radio industry is now producing more navigational aids (for which no statistics are published) in proportion to radio sets. The second of these dangers is particularly difficult to detect without a comprehensive census of production at both ends of the period to be covered.

The upshot of these considerations is that the problem of comparing 1935 with the post-war years really needs to be considered as something different from the continuation of the ordinary index backwards. For each industry one needs to consider what are the best available indicators for this particular comparison. Sometimes the comparison can be made more reliably than the month-to-month one, because additional data are available for this purpose, which could not be used for the monthly index-e.g., the 1946 censuses for the hat and cap trade and the publishing, printing, etc., trade, which have now been published. Furthermore, the comparison can reasonably be made on a more elaborate basis in some cases for this single calculation than would be justifiable on man-power grounds for the monthly index-e.g., the 1935-46 comparison for the boot and shoe trade gave separate weights to seven different categories, which the monthly index groups into two, so that due allowance was made for any shift between the categories within these two groups. On the
whole, however, the comparisons are bound to be less reliable because of the scanty and dubious nature of the data over parts of the field. For a calculation which only has to be done once, it is possible to assess the evidence that is available and arrive at a broad judgment, in a way that would be clearly impossible to repeat month after month, but ingenuity and intuition are not really substitutes for good information.

This process of reconsideration is a more difficult one than the original selection, and really calls for consultation with experts on various trades where problems of adjustments for noncomparability arise. A fairly substantial part of the field could, however, be covered without great difficulty, and in order to get some preliminary figures completed a first calculation was made for the whole field without much attempt to seek for expert guidance from outside the Department of Applied Economics, Cambridge. The temporary use of somewhat crude methods to fill in some of the gaps may be justified by the fact that information from the 1946 census should be available in the relatively near future, notably for engineering and some other metal trades for which comparisons are otherwise very difficult. Apart from this we can only rely on the fact that the motley collection of expedients used for various components are unlikely to have any systematic bias in their results, so that their errors should largely cancel out.

Types of Indicator Used.-So far as it is possible to classify the methods used for the 1935/46 comparison, they are as follows :-

| Type of Indicator Used |  |  |  |  | \% of 1946 |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Weight |  |  |  |  |  |

It is not correct to regard these categories as necessarily implying any particular order of reliability. Thus, the series of "comparable" physical outputs may hide a significant change in average quality-we have never attempted to allow for quality changes within a single heading -or the items chosen to represent an industry may not have proved typical, or the figures may not in fact be as reliable and comparable as their appearance in the Statistical Abstract might suggest. At the other extreme " miscellaneous" is normally a euphemism for " no information," which implies that the output of the trade has
been assumed to move with that of some other(s); in some cases, however, this should give a reasonably accurate result-e.g., the weight of textile finishing was spread over various textile series in the light of the work recorded at the 1935 census.

An input series has only been classed as "reliable" if the figures for 1935 and 1946 were both comparable and closely related to consumption by the industry in question.

Employment is, of course, a very dubious indicator for any single trade, even though the statistics themselves should be accurate. Its influence may not, however, be too bad in the aggregate, as it has been used for a varied collection of trades, and over the field as a whole changes in productivity seem to be fairly small. For three large trades it should be possible to replace it by an output series when the census results are published for electrical machinery, hand tools, and hardware, etc. The largest trade of all for which employment has been used is printing and publishing, where there are serious logical difficulties over the meaning of "the volume of production" ; other indicators were considered, notably newspaper circulations, paper consumption and the census results for the general section of the trade (i.e., other than newspapers), and it was considered that the most plausible use of these data would give a result broadly similar to that derived from employment.

The deflated value series usually suffer from defects both in the comparability of the values and in the adjustment for price changes. The latter points to one of the greatest gaps in British
statistics-the absence of any real data on price changes for manufactured goods.

Effect of 1935 and 1946 Weights.-Two calculations were made, using 1935 and 1946 weights for each series, and the geometric mean was taken for all index numbers. The results were significantly different both for the index as a whole and for several of the groups; for the total index the computed figures were :-

|  | On 1935 | On 1946 | Geo |
| :---: | :---: | :---: | :---: |
|  | Weights | Weights | Mean |
| 1935 Index : A Series | 98.0 | $102 \cdot 8$ | $100+$ |
| B Series | $97 \cdot 0$ | $102 \cdot 1$ | 100 |

The fact that the two calculations give somewhat different results does not imply that either is " wrong." We can only measure total output by valuing the things produced at some set of prices and neither year's prices have any special virtue for this purpose. The implication of the divergence is that, on the average, things for which output increased between 1935 and 1946 showed a smaller rise in price than those for which output fell.

The group which was most affected is fuel and power, for which the 1935 indices were computed as 80.3 and 95.6. Here the explanation is obvious : the " net output" contained in each unit of electricity was valued at less money in 1946 than in 1935, whereas for coal the "net output " per ton rose by about $150 \%$. The use of 1935 weights instead of 1946 weights, therefore, attaches much more importance to the fact that the 1935 output of electricity was so much lower than in 1946, and much more importance to coal output having been higher.

## BUILDING AND CIVIL ENGINEERING (continued from page 70)

industry. There were, indeed, noticeable rises in the stocks of bricks, roofing felt, clay roofing tiles and certain other building materials, between October, 1947, and January, 1948, and unemployment rose from 23,000 insured workers to 38,000 over the same period (Monthly Digest of Statistics, Tables 86, 87 and 85).

But none of the rises in the stocks of building materials is yet large enough to indicate with complete certainty a more than seasonal falling off in demand. Unemployment in February and March was slightly below the level of January. It may be some months before the effect of the cuts is felt upon building activity and employment. According to the analysis of bank advances from the Bankers' Clearing House (Monthly Digest of Statistics, Table 136), " builders and contractors" accounted for advances of $£ 60.7$ Mn . in February, 1948, as against $£ 58 \cdot 3 \mathrm{Mn}$. in
the previous quarter, and $£ 52 \cdot 1 \mathrm{Mn}$. a year previously. The reason for the continued high activity of the building industry is no doubt the large amount of unfinished work on hand at the time that the policy of cuts was introduced. At the end of February, 1948, there were still 240,000 permanent houses " under construction." Despite the increased rate of completion of work that is likely to develop in 1948 the large arrears of uncompleted housing and other work are sufficient to occupy the building industry at its present high level of employment perhaps until September or October of this year. The cutting down of licensing may cause some unemployment to appear earlier than this among certain crafts, such as painters and decorators, and the materials industries (such as bricks) which supply contracts in their earlier stages are likely to be the first to experience a falling off in demand.

# FINANCE 

By F. W. Paish

Government Finance.-During the last quarter of the 1947/8 financial year Ordinary Revenue totalled $£ 1,436 \mathrm{Mn}$. as compared with $£ 1,262 \mathrm{Mn}$. in the last quarter of 1946/7. Ordinary expenditure showed a much smaller seasonal expansion than last year, and at $£ 1,023$ Mn . for the quarter was $£ 206 \mathrm{Mn}$. lower than a year ago. There was thus a surplus of $£ 413 \mathrm{Mn}$. for the quarter on Ordinary Account. Of the revenue, only $£ 135 \mathrm{Mn}$. was contributed by the three abnormal items-sales of Surplus War Stores, Surplus Receipts from Trading and Miscellaneous Receipts-while the expenditure included $£ 100 \mathrm{Mn}$. for advance payments for Argentine food, of which only a small part was shipped before the end of the financial year. Thus the surplus for the quarter was not only large but mainly genuine.

TABLE 1.
ORDINARY REVENUE AND EXPENDITURE.

| Weekly Average £Mn. | Ordinary Revenue Total | Expenditure |  | Surplus $(+)$ or Deficit ( - ) |
| :---: | :---: | :---: | :---: | :---: |
|  |  | Supply Services | Total |  |
| 1938/9* | $17 \cdot 8$ | $15 \cdot 8$ | $20 \cdot 2$ | $-2.4$ |
| 1945/6 | $62 \cdot 9$ | $95 \cdot 7$ | 104.9 | $-42.0$ |
| 1946/7 | $64 \cdot 0$ | $63 \cdot 9$ | $74 \cdot 9$ | $-10.9$ |
| 1947/8 | $73 \cdot 5$ | $50 \cdot 7$ | $59 \cdot 9$ | $+12 \cdot 6$ |
| 1938/9* Apr.-June | $10 \cdot 1$ | 12.0 | 18.0 | $-7.9$ |
| July-Sept. | $13 \cdot 3$ | $15 \cdot 3$ | $18 \cdot 1$ | -4.8 |
| Oct.-Dec. | 14.0 | $15 \cdot 7$ | $21 \cdot 6$ | -7.6 |
| Jan.-Mar. | $34 \cdot 0$ | $20 \cdot 2$ | $23 \cdot 2$ | $+10.8$ |
| 1946/7 Apr.-June | 48.4 | $61 \cdot 3$ | $69 \cdot 4$ | $-21.0$ |
| July-Sept. | $54 \cdot 2$ | $54 \cdot 2$ 58.1 | $69 \cdot 9$ $65 \cdot 5$ | $-15 \cdot 7$ $-9 \cdot 3$ |
| Oot.-Dec. | $56 \cdot 2$ $98 \cdot 1$ | $58 \cdot 1$ 83.3 | $65 \cdot 5$ $95 \cdot 6$ | -9.3 +2.5 |
| 1947/8 April-June | 64-6 | $38 \cdot 6$ | 47-7 | $+16.9$ |
| July-Sept. | $61 \cdot 4$ 57.9 | $50 \cdot 0$ $47 \cdot 3$ | $61 \cdot 5$ 56.0 | -0.1 +1.9 |
| Jan.-Mar. | $110 \cdot 4$ | $67 \cdot 1$ | $78 \cdot 7$ | $+31.7$ |
| 1948 Jan. 1-31 | 131.0 | $48 \cdot 9$ | $54 \cdot 3$ | +76.7 |
| Feb. 1-28 | 121.7 | $54 \cdot 4$ | $72 \cdot 9$ | $+48.8$ |
| Feb. 29-Mar. 31 | $80 \cdot 7$ | $94 \cdot 8$ | $107 \cdot 3$ | $-26.6$ |
| Apl. 1-May 1 | $69^{\circ} 3$ | $40 \cdot 4$ | $54 \cdot 6$ | +14.7 |

* Including expenditure under the Defence Loans Acts, 1937 and 1939.

Extra-budgetary payments, at $£ 175 \mathrm{Mn}$., were lower than during the preceding quarter, mainly as a result of smaller War Damage payments and refunds of Post-war Credits.

The quarter's surplus on Ordinary Account was sufficient, after covering extra-budgetary payments and sinking funds, to provide for a reduction of $£ 230 \mathrm{Mn}$. in the National Debt.

TABLE 2.
EXTRA-BUDGETARY PAYMENTS, £Mn.

| 1948 J | January (31 days) | February (28 days) | $\begin{aligned} & \text { March } \\ & \text { (32 days) } \end{aligned}$ | Total (91 days) |
| :---: | :---: | :---: | :---: | :---: |
| Net E.P.T. Refunds ... | 1.7 | $2 \cdot 6$ | $2 \cdot 2$ | $6 \cdot 5$ |
| Post-war Credits .. | $3 \cdot 7$ | $2 \cdot 3$ | $2 \cdot 1$ | $8 \cdot 1$ |
| Net War Damage Payts. |  |  |  |  |
| W.D.C. ... ... | $24 \cdot 0$ | $12 \cdot 0$ | 22.5 | $58 \cdot 5$ |
| Board of Trade |  | $7 \cdot 5$ | 0.5 | 8.0 |
| Housing $\quad .$. | 22.8 | $32 \cdot 8$ | $25 \cdot 2$ | $80 \cdot 8$ |
| Coal Nationalisation... | 13.0 | - | - | 13.0 |
| Civil Contingencies Fund | d $15 \cdot 0$ | $120 \cdot 0$ | $-145.5$ | $-10.5$ |
| Cotton Buying ... | 8.0 | $3 \cdot 0$ | $-5 \cdot 2$ | 5.8 |
| Overseas Development Food | - $-\frac{}{0.3}$ | $\overline{0.5}$ | $\begin{array}{r}8.0 \\ -4.2 \\ \hline\end{array}$ | $\begin{array}{r}8.0 \\ -3.4 \\ \hline\end{array}$ |
| Other (Net) ... ... | 0.3 | 0.5 | $-4.2$ | $-3 \cdot 4$ |
| - | 88.5 | $180 \cdot 7$ | $-94 \cdot 4$ | 174.8 |

TABLE 3.
GOVERNMENT BORROWING. £Mn.

|  | January <br> (31 days) | February (28 days) | $\begin{aligned} & \text { March } \\ & \text { (32 days) } \end{aligned}$ | Total (91 days) |
| :---: | :---: | :---: | :---: | :---: |
| Nat. Savings Certs. . | 14.8 | $9 \cdot 3$ | $5 \cdot 2$ | $29 \cdot 3$ |
| $2 \frac{1}{2} \%$ Defence Bonds ... | $4 \cdot 5$ | 2.7 | $3 \cdot 3$ | 10.5 |
| Other Debt-Internal |  | $-0.7$ | 14.0 | $9 \cdot 4$ |
| External | 28.5 | 106.9 | $17 \cdot 5$ | $152 \cdot 0$ |
| Repayments : $3 \%$ Conv. Loan Other | $-15 \cdot 1$ | $-\overline{16.0}$ | $\begin{array}{r} -300.5 \\ -16.9 \end{array}$ | $\begin{array}{r} -300.5 \\ -48.0 \end{array}$ |
| Long and Medium . term Borrowing | 28.8 | 102.2 | $-277 \cdot 4$ | $-146 \cdot 4$ |
| Tax Reserve Certs. . | $-19.6$ | $-63.2$ | $-33.9$ | $-116.7$ |
| Treas. Dep. Rects. ... | -73.0 -60.0 | -128.5 | $90 \cdot 0$ | $\begin{array}{r} 111.5 \\ -10.0 \end{array}$ |
| Treas, Bills: Tender., Tap | $\begin{array}{r} -60 \cdot 0 \\ -193 \cdot 4 \end{array}$ | -30.0 -14.9 | $4 \overline{07.8}$ | $\begin{array}{r} -90 \cdot 0 \\ 199.5 \end{array}$ |
| W. \& M. Advances : Govt. Depts. Bank of England | $65 \cdot 7$ | 121.4 2.5 | $\begin{array}{r} -157.9 \\ 3.5 \end{array}$ | $\begin{array}{r} 29.2 \\ 6.0 \end{array}$ |
| Short-term Borrowing | $-280 \cdot 3$ | $-112.7$ | 309.5 | $-83.5$ |
| Total Borrowing | -251.5 | $-10.5$ | $32 \cdot 1$ | $-229 \cdot 9$ |

External debt increased by $£ 153 \mathrm{Mn}$., including the $£ 80 \mathrm{Mn}$. gold loan from South Africa, while a further $£ 15 \mathrm{Mn}$. was borrowed from the International Monetary Fund (appearing in the Exchequer Return under the heading of ' Other Debt-Internal'), and $£ 40 \mathrm{Mn}$. net was raised from sales of National Savings Certificates and Defence Bonds. Thus $£ 438 \mathrm{Mn}$. was available for reducing other forms of internal debt. Of this, $£ 300 \mathrm{Mn}$. was devoted to paying off the maturing 3\% Conversion Loan and $£ 55 \mathrm{Mn}$. to the repayment of other forms of long and medium-term debt, leaving $£ 83 \mathrm{Mn}$. for the reduction of short-term debt.

The changes during the quarter in the individual items of the short-term debt were affected by a number of special influences. Only half the South African gold loan was used
during the quarter to meet the adverse balance of payments, and the other $£ 40 \mathrm{Mn}$. were added to the gold reserves of the Exchange Equalisation Account. By itself, this would have tended to reduce issues of "tap" Treasury Bills correspondingly; but its effect was far outweighed by that of the redemption of the 3\% Conversion Loan, of which the bulk had been acquired by the Departments, and on balance the issue of " tap" Bills rose by nearly $£ 200 \mathrm{Mn}$. As Ways and Means Advances also rose by $£ 35 \mathrm{Mn}$., there were $£ 318 \mathrm{Mn}$. available for the reduction of other forms of short-term debt. $£ 117 \mathrm{Mn}$. were needed for the redemption of Tax Reserve Certificates, but even so over $£ 200 \mathrm{Mn}$. were available for the redemption of Treasury Deposit Receipts and "tender" Treasury Bills.

The effect of these repayments on the banks' holdings of floating debt was however partly offset by the transfer during February of the $£ 150 \mathrm{Mn}$. paid by the Argentine Government to the London accounts of the Argentine railways. This large transfer, of which $£ 100 \mathrm{Mn}$. seem to have come from the advance payment by the British Government for Argentine food and $£ 50$ Mn . from the Argentine Government's sterling balances, was apparently effected mainly by the transfer of "tap" Treasury Bills directly to the banks holding the Argentine railways' accounts, giving rise to corresponding expansions in the deposits of the banks concerned.

Other Finance.-As explained above, the decline in clearing bank deposits which the fall in Treasury Deposit Receipts and Treasury Bills issued by tender should have induced was largely masked by the effect of the transfer towards the end of February of $£ 150 \mathrm{Mn}$. to the London accounts of the Argentine railways. As the distribution of these funds will not begin until debenture holders are repaid in May, these payments remain for the present concentrated in the banks which happen to hold the railways' accounts, the most remarkable effects being shown in the statement of Glyn Mills, whose deposits more than doubled between February and March.

As a result of this exceptional transaction the net deposits of nine clearing banks fell only from $£ 5,395 \mathrm{Mn}$. in December to $£ 5,338 \mathrm{Mn}$. in March, and the Lloyds Bank seasonally adjusted index of (gross) deposits of eleven clearing banks rose from 252 in December to 259 in March. As the expansion in deposits due to the Argentine transfer will have no economic effect at least until the distribution of the funds begins in May, it would be logical to exclude it from the March totals. With this

TABLE 4
NINE CLEARING BANKS

|  | Gross Deposits £Mn. | Balances with other Banks \& Items in transit £Mn. | Net Deposits £Mn. | Increase in Net Deposit/ in <br> Preceding <br> 12 monthe |
| :---: | :---: | :---: | :---: | :---: |
| 1945 March | 4,241 | 137 | 4,104 | 447 |
| June | 4,517 | 174 | 4,343 | 622 |
| September | 4,654 | 135 | 4,519 | 599 |
| December | 4,609 | 195 | 4,414 | 283 |
| 1946 March | 4,513 | 158 | 4,355 | 251 |
| June | 4,797 | 187 | 4,610 | 267 |
| September | 5,040 | 155 | 4,885 | 366 |
| December | 5,407 | 251 | 5,156 | 742 |
| 1947 March | 5,285 | 168 | 5,117 | 762 |
| June | 5,382 | 215 | 5,167 | 557 |
| September | 5,344 | 159 | 5,185 | 300 |
| December | 5,651 | 256 | 5,395 | 239 |
| 1948 January... | 5,498 | 196 | 5,302 | 145 |
| February | 5,374 | 182 | 5,192 | 114 |
| March . | 5,524 | 186 | 5,338 | 221 |
| April ... | 5,588 | 188 | 5,400 | 262 |

omitted, the fall in deposits between December and March would be fully equal to the normal seasonal movement, and the total for March would be only slightly higher than a year ago.

The rapid fall in the Bank of England's note circulation continued until the end of February, permitting two further reductions of $£ 50 \mathrm{Mn}$. each in the fiduciary issue, which now stands at $£ 1,300 \mathrm{Mn}$., as compared with $£ 1,450 \mathrm{Mn}$. at the beginning of the year. Since the beginning of March the decline has ceased, though the seasonal rise has been small.

Prices of fixed interest securities continued to decline slowly throughout the quarter, and fell more sharply in April on the budget proposal for a special levy on capital. The life of the 3\% Electricity Stock, issued on April 1st, had to be considerably shorter than for the Transport Stock, issued three months earlier-redeemable 1968-73, as compared with 1978-88. Even this shorter life was regarded as too long by investors, and the new stock opened at a discount of $1 \frac{1}{2} \%$, which still persisted at the end of April, when Transport Stock stood at a discount of $3 \frac{1}{2} \%$. With the new budget providing for a cash surplus of central government receipts over all outgoings, and no further major issues of nationalisation stocks in the near future, it is possible that the present yield of about $3 \frac{1}{4} \%$ on irredeemable government securities may prove more maintainable than lower levels in the recent past. Prices of industrial securities, after showing considerable weakness during February, have since recovered most of their loss. They will probably be helped more than gilt-edged securities by the reinvestment of
the Argentine railways' funds, when distributed; but in view of "voluntary" limitations of dividends it would seem that the margin between
the yields of gilt-edged securities and those of many of the better industrials is by no means excessive.

## PRICES AND WAGES

By A. L. Bowley

Retail Prices.-A full account of the collection of data for, and the method of compiling, the new index of retail prices, is published as Industrial Relations Handbook, 1944, Supplement No. 2, January, 1948 (6d.). The weights assigned to the different items of food, clothing, etc., are given in Appendix C. There is as yet no publication of the ratios, or price changes, for separate items such as bread, flour, etc., but only of main categories as in the following table.


Increases since December are shown in each of the eight groups except rent. The principal recent rises have been in the prices of bacon and eggs.

The Annual White Paper on National Income and Expenditure (Cmd. 7371) gives statistics of Personal Expenditure for the years 1938, 1944, 1945, 1946, 1947 at current prices (Table 20) and revalued at 1938 prices (Table 21). From these the figures in the Table below have been computed. It is emphasised in the White Paper that exact revaluation is not possible, since in many cases the qualities of similarly named materials have changed. The expenditure includes indirect taxes and allows for subsidies. It is to be remembered that the estimated population of the United Kingdom (including forces abroad and seamen at sea) increased about $4 \%$ between June, 1939 and June, 1947.

The figures for total expenditure are :-


By a similar process Columns 3 to 6 have been computed for 14 categories in the Table below, but the figures in Columns 3, 4, 5 are expressed as percentages of the 1938 entries, not as percentage increases. Columns 1 and 2 are inserted to show the relative importance of each category (measured by expenditure at current prices) to total expenditure.

The greatest increases in price between 1938 and 1946 are for tobacco, drink, durable household goods and clothing; between 1946 and 1947 prices of tobacco and travel (rail and road) increased considerably.


Note on computation. For example, expenditure on food was $£ 1,287 \mathrm{Mn}$. in 1938, $£ 1,995 \mathrm{Mn}$. in 1947, respectively $30 \%$ and $27 \%$ of the totals stated above. In 1947 expenditure at current prices was $£ 1,307 \mathrm{Mn}$., an increase of $2 \%$ in quantity over 1938 (column 3). Total expenditure had increased $55 \%$ : hence increase of price was about $53 \%$ (column 5). The price change 1938 to 1946 was calculated in a similar way, giving $42 \%$ (column 4) and from columns 4 and 5 the change in price from 1946 to 1947 is known (column 6).

WAGES and Earnings.-After a nearly stationary period for about eight months to August, 1947, wage-rates in 13 out of the 20 occupations included in our index-number have risen, viz.: agriculture (September), bricklayers, labourers, and miners (November) compositors and cotton (January and February), women boot-makers, and tobacco manufacturers (January), lorry drivers and railwaymen (February) tram drivers and conductors, and women
shirt-makers and tailors (March, April). The system of payment on railways was reorganised in March with changes retrospective to February 1 st. The increases since January are mainly the result of negotiations commenced in the autumn.


The new Ministry of Labour index-number of wage-rates, described below, shows a rise of 5\% from June, 1947, to March, 1948, while our index shows $7 \%$. There is some doubt about the exact amount of the increase for cotton operatives that is included, but the main cause of the difference is probably due to the accident that the industries named above as contributing to the increase in this period have a greater weight in our index than in that of the Ministry, while some industries in which there happens to have been no change in this period are included only in the Ministry's index. Such slight discrepancies are certain to occur from time to time. When there is a difference the new index is to be preferred.

The most recent Report on Average Earnings and Working Hours in the Principal Industries (Ministry of Labour Gazette, October, 1947), refers to October, 1947. Some of the results are shown in the following table :-

PRINCIPAL INDUSTRIES. UNITED KINGDOM.

|  | Percentage of October, 1938. WageAverage Earnings. rates. Women Youths. Girls. Juveniles All. |  |  |  |  |  | Av'ge. hours worked All. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1938 Oct. | 100 | 100 | 100 | 100 | 100 | 100 | $46 \cdot 5$ |
| 1942 July | 161 | 167 | 177 | 164 | 160 | 124 |  |
| 1943 | 176 | 191 | 181 | 183 | 176 | 130 | $50 \cdot 0$ |
| 1944 | 180 | 195 | 181 | 189 | 182 | $135 \frac{1}{2}$ | $48 \cdot 6$ |
| 19450 Oct. | 176 175 | 194 | 174 | 190 | 180 | 143 | 47.4 |
| 1947 Apr. | 179 | 207 | 178 181 | 209 | 190 | $157 \frac{1}{2}$ | $46 \cdot 2$ |
| 1947 Oco. | 186 | 214 | 199 | 217 236 | 194 203 | 1601 1 六 | $45 \cdot 0$ $45 \cdot 2$ |

The wage-rates index is calculated by the Ministry of Labour on the basis of unchanged numbers, by sex and age, in each industry included. It excludes changes due to the numbers of hours worked in the normal week and to overtime, transfers from time to piecework, etc. That is, it is on the same principle as the usual wage-rate index numbers, as applied to the industries dealt with in the report.

Average earnings gained on wage-rates rapidly till July, 1943. For the next $3 \frac{1}{4}$ years to October, 1946 , rates increased $20 \%$, earnings only $8 \%$. Earnings, however, had recovered the slight setback after the armistice, while wage-rates had increased by the incorporation of temporary war-time increments into standard rates and a general upward movement to make good the reduction of facilities for overtime, etc. In spite of the reduction of bours, earnings increased in the same proportion as rates from October, 1946, to April, 1947. Between April and October, 1947, there was little change in wage-rates, but average earnings increased nearly $5 \%$, some increment occurring in nearly every industry. Partial explanations of the change are an increase of the relative number on piece-work $(23 \%$ of the men in April, 24\% in October), a slight increase in the average number of hours worked, and a greater proportion of adults to juveniles. For men only, average earnings per hour increased $3 \%$.

The increase in average earnings over the nine years has been influenced by the changed proportion of men, women and juveniles employed.

## PERCENTAGE NUMBERS EMPLOYED.

| 1938 | Men. | Women | Adul | Youths | s. Girls. | Juve | es. All. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Oct. | $61 \frac{1}{2}$ | 1912 | 81 | 12 | 7 | 19 | 100 |
| 1947 |  |  |  |  |  |  |  |
| Apr. | 69 | 20 | 89 | 7 | 4 | 11 | 100 |
| Oct. | $69 \frac{1}{2}$ | $20 \frac{1}{2}$ | 90 | $6 \frac{1}{2}$ | $3 \frac{1}{2}$ | 10 | 100 |
| 1938 Average Earnings. |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
| 1947 Oct. | $69 \cdot 0 \mathrm{~s}$. | $32 \cdot 5 \mathrm{~s}$. | 60 s . | $26 \cdot 1 \mathrm{~s}$. | $18 \cdot 5 \mathrm{~s}$. | $23 \cdot 3 s$. | $53 \cdot 2$ |
| Apr. | $123 \cdot 4 \mathrm{~s}$ | $67 \cdot 3 \mathrm{~s} .$ | $111 \mathrm{~s} .$ | $47 \cdot 3 \mathrm{~s}$. | $40 \cdot 2 \mathrm{~s}$. | $44 \cdot 7 \mathrm{~s}$. | 103.53. |
| Oct. | 128.1 s . | $69 \cdot 6 \mathrm{~s}$ | $115 \mathrm{~s} .$ | 51.8 s . | $43 \cdot 7 \mathrm{~s}$. | $49 \cdot 0 \mathrm{~s}$. | 108.2s. |

Thus there has been a considerable reduction in the employment in industry of youths under 21 years and girls under 18 years, made good by the relative increase in the number of men at higher wages. If there had been no change in the proportions of the four groups, average earnings would have risen only $93 \%$ instead of $103 \%$ between October, 1938, and October, 1947.

Both the Bulletin and the Statistical Digest index-numbers of wage-rates include coal-mining and agriculture, where wages have risen much
more rapidly than in industry, and also railways. The movements shown by the two series are similar over the period 1939-47.

GENERAL INDEX-NUMBERS OF WAGE-RATES.
End of Month. Statistical Digest. Economic Service

(a) Including, (b) excluding the effect of the increased earnings per shift in coal mines between 1944 (last quarter) and November, 1947. See Bulletin, November, 1947, p. 112

* Excluding the increase in railway wages which was announced in March as retrospective to February. An estimate is included in the Table at the head of this article, but the change is not allowed for in the Ministry of Labour's index.

New Index of Wage-Rates.-The Ministry of Labour has initiated a new Index-number of Rates of Wages, based on agreed rates and estimated numbers employed in June, 1947. This Index covers important manufacturing industries, and agriculture, mining, Public Utility Services, together with retail distribution, catering, and entertainments. Its scope and method appear to be very nearly the same as those of the former index which was based on September, 1939. The essential difference is in the weighting : the new weights, applied to percentage changes of rates, are proportional to the wagebills in each industry in 1947, whereas the old weights referred to 1939 .

The relation between the new and the former index-numbers is similar to that between the new index of retail prices and the former Cost of Living Index. In both cases it is important to ascertain whether the new index-numbers can be linked on to the old, so as to make continuous series. In the Bulletin for August, 1947, pp. 75-76, Professor Allen discussed this problem in relation to retail prices, and found that whereas the former Cost of Living Index showed an increase of only about $30 \%$ from 1938 to mid1947, the figure should be raised to the range of 60 to $65 \%$ for the habits of working-class consumption in 1937. This higher number may be reasonably used to link the new index with 1938. $\dagger$

[^20]There is not the same difficulty in linking the new wage-index with the old.
(a) I have now made a new computation to test the effect of changes in the relative numbers (all persons) employed in the various industries. The numbers empleyed in each of 80 industries were computed for 1938 and 1947 from the Table in Ministry of Labour Gazette, March, 1948, pp. 92-3. Average earnings in April, 1947, and October, 1938, were, taken from the Tables in the Ministry of Labour Gazette, October, 1947, pp. 326-327. For industries covered by the Average Earnings Report, the increase from mid-1939 to mid-1947 was $91 \%$ when the changes were weighted by the numbers employed in 1938, and $89 \%$ when the weights were those employed in 1947, a difference within the margin of uncertainty in the data. (Neither of these weightings give necessarily the increase in actual average earnings, $\ddagger$ which was $94 \%$.)

If now railways, coal-mining and agriculture are included (having been omitted in the Ministry of Labour's account) the increases are raised to $97 \%$ on the earlier, $94 \%$ on the later, weighting ( $97 \%$ income in the actual averages). This increment is due to the great increase in mining and in agricultural earnings, and the lower increase on the 1947 weighting is due to the special growth of numbers in agriculture where the earnings are lower than in industry
(b) The wage-rate index computed for our Bulletin has been tested in a similar way. In the limited number of industries included, the increase from mid-1939 to December, 1947, is $80 \frac{1}{2} \%$ on 1939 weighting and $78 \frac{1}{2} \%$ on the 1947 weighting. The relation between these numbers is the same as in earnings above ; they are both lower in this case as our index relates to adults only.

We may conclude that the new index may be safely linked on to the old to compare future changes approximately with the 1938 and even earlier standards. Till the Ministry shows changes for industries separately it is probably worth continuing our index on an unchanged basis. The new index is specially useful in that it shows men, women and juveniles separately.

[^21]
# EXTERNAL TRADE AND PAYMENTS <br> By T. Barna 

The White Paper (Cmd. 7324) on the Balance of Payments showed, for 1947, the enormous deficit of $£ 675 \mathrm{Mn}$. on current account. Table 1 summarises the essential figures for 1938, 1946 and 1947, and also brings in the planned or estimated figures for the first half of 1948, as set out in the "Economic Survey." There is reason to suppose that the official treatment of the Balance of Payments is unsatisfactory in some respects, and we hope to discuss this matter in a future issue of the Bulletin.

TABLE I
BALANCE OF PAYMENTS. CURRENT ACCOUNT (£Mn.)

|  | 1938 | 1946 | 1947 | $\begin{gathered} \text { Plan for } \\ 1948 \\ \text { 1st half } \end{gathered}$ |
| :---: | :---: | :---: | :---: | :---: |
| Payments : |  |  |  |  |
| Imports f.o.b. | 835 | 1,092 | 1,574 | 792 |
| Net Government expenditure | 16 | 290 | 211 | 70 |
| Shipping ... ... | 80 | 140 | 163 | 79 |
| Interest, profits and dividends | 30 | 77 | 94 | 45 |
| Films (net) ... | 7 | 17 | 13 | 4 |
| Tourists | 40 | 26 | 50 | 12 |
| Total Payments | 1,008 | 1,642 | 2,105 | 1,002 |
| Receipts : ${ }^{\text {a }}$ |  |  |  |  |
| Exports and re. exports, f.o.b. | 533 | 888 | 1,125 | 705 |
| Shipping ... | 100 | 149 | 180 | 99 |
| Interest, profits and dividends | 205 | 152 | 145 | 73 |
| Other (net) - | 100 | 73 | -20 | -11 |
| Total Receipts | 938 | 1,262 | 1,430 | 866 |
| Balance | 70 | $-380$ | -675 | - 136 |
| With Western Hemi- |  |  |  | 183 |
| With Sterling Area ... | +120 | -30 | +80 | 183 +70 |
| With Rest of World... | -80 | +10 | $-75$ | $-23$ |

Source: United Kingdom Balance of Payments, 1946 and 1947 (Cmd. 7324) and Economic Survey for 1948 (Cmd. 7344) In 1946 and first half of 1947, Egypt and the Sudan are included in the sterling area. The 1938 estimates are for the present storling area

Table 1 also shows the balance of payments on current account with the Western Hemisphere, the sterling area, and the rest of the world. It seems, in comparison with 1938 (and allowing for the fact that prices have more than doubled) that we failed to keep up our customary surplus with the sterling area, while substantially increasing our deficit with the Western Hemisphere. The programme for 1948 is chiefly a reduction in the deficit with the Western Hemisphere.

The drain on our reserves, as shown in Table 2, continues at a high but somewhat diminished rate. At the end of March, after receiving the South African gold loan of $£ 80 \mathrm{Mn}$., we were
left with gold and dollars of $£ 552 \mathrm{Mn}$. We have exhausted the U.S. loan but still have $£ 58 \mathrm{Mn}$. left of the Canadian credit.

TABLE 2.
DRAIN ON U.K. RESERVES
(£Mn.)

|  |  |  <br> dollars | U.S. <br> credit | Canadian <br> credit | I.M. <br> Fund | Total |
| :--- | :--- | :---: | :---: | :---: | :---: | :---: |
| 1947 | 1st half | 69 | 360 | 38 | - | 467 |
| 3rd Qr. | 8 | 322 | 37 | 15 | 382 |  |
| 4th Qr. | 74 | 25 | 30 | 45 | 174 |  |
| 1948 | 1st Qr. | $40(1)^{*}$ | 74 | 11 | $15(2) \dagger$ | 140 |

(1)* Ignoring the receipt of the gold loan ( $£ 80 \mathrm{Mn}$.) from South Africa.
(2) $\dagger$ In addition to $£ 7 \mathrm{Mn}$. drawn by India.

In the first quarter of 1948 imports (c.i.f.) exceeded exports (f.o.b.) by $£ 119 \mathrm{Mn}$., compared with $£ 120 \mathrm{Mn}$. in the last quarter of 1947 . If we assume a deduction of $12 \%$ for insurance and freight, the excess on the f.o.b. basis, used in the Balance of Payments for imports as well as

TABLE 3
PROGRESS OF THE EXPORT DRIVE

| Group |  | Volume Index Number |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\begin{gathered} \text { Value } \\ 1948 \\ \text { Ist Qr. } \end{gathered}$ | $\begin{aligned} & 1946 \\ & \text { Year } \end{aligned}$ | $\begin{aligned} & 1947 \\ & \text { Year } \end{aligned}$ | $\begin{gathered} 1947 \\ \text { 4th Qr. } \end{gathered}$ | $\begin{aligned} & 1948 \\ & \text { 1st Qr. } \end{aligned}$ | Target End 1948 |
|  | £Mn. | $\%$ of 1938 |  |  |  |  |
| Food, drink. tobacco | $22 \cdot 86$ | 88 | 81 | 101 | 104 | 125 |
| Raw Materials: |  |  |  |  |  |  |
| Other... | 7.85 | 55 | 63 | 47 | 67 | 44 |
|  |  |  |  |  |  |  |
| Cokeand manufactured fuel | 0.08 | 22 | 23 | 1 | 3 | 24 |
| Pottery, glass. etc. | 10.72 | 149 | 154 | 169 | 195 | 223 |
| Iron and Steel, etc. | $23 \cdot 65$ | 115 | 107 | 110 | 109 | 111 |
| Non-ferrous ... | $14 \cdot 33$ | 192 | 173 | 181 | 241 | 207 |
| Cutlery, etc.... Electrical Goods | 10.01 | 163 | 183 | 191 | 200 | 189 |
|  | 15.93 | 166 | 164 | 179 | 198 | 235 |
| Machinery | 56.49 | 112 | 158 | 169 | 176 | 206 |
| Wood and Timber | 0.41 | 47 | 43 | 38 | 41 | 48 |
| Cotton $\quad$... | $25 \cdot 69$ | 42 | 43 | 46 | 52 | 79 |
| Wool ... . | 20.99 | 79 | 88 | 102 | 116 | 202 |
| Silk and Rayon | $8 \cdot 68$ | 150 | 148 | 164 | 171 | 245 |
| Other Textile | $6 \cdot 60$ | 76 | 78 | 74 | 70 | 106 |
| Apparel | 6.83 | 147 | 137 | 125 | 110 | 201 |
| Footwear ... | $2 \cdot 19$ | 122 | 141 | 140 | 158 | 295 |
| Chemicals, etc. | $19 \cdot 11$ | 162 | 140 | 139 | 149 | 184 |
| Oils, etc. ... | 1.71 | 66 | 71 | 71 | 48 | 116 |
| Leather | $2 \cdot 10$ | 69 | 60 | 62 | 71 | 136 |
| Paper, Card ... | $5 \cdot 17$ | 98 | 112 | 113 | 121 | 154 |
| Vehicles ... | 55.58 | 140 | 185 | 228 | 245 | 260 |
| Rubber | $1 \cdot 56$ | 154 | 174 | 174 | 171 | 330 |
| Miscellaneous | 19.91 | 103 | 111 | 116 | 119 | 151 |
| Total Manu. factures | $307 \cdot 72$ | 111 | 123 | 133 | 143 | 175 |
| Total. | $353 \cdot 43$ | 99 | 109 | 118 | 126 | 154 |

exports, was $£ 60 \mathrm{Mn}$. against $£ 66 \mathrm{Mn}$. The volume of exports rose to $126 \%$ of 1938 , compared with $118 \%$ in the previous quarter, while retained imports rose from $77 \%$ to $80 \%$. But the terms of trade continued to worsen. Average export values rose from $231 \%$ of 1938 to $239 \%$, and import values from $264 \%$ to $274 \%$, which corresponds to a movement of the terms of trade from $88 \%$ to $87 \%$. The export and import price indices rose to $246 \%$ and $274 \%$ respectively, so that these indicators record a change in terms of trade from $93 \%$ to $90 \%$. (For an an explanation of the difference, see Bulletin, February 1948, p. 21.). Some relief was found by switching away from the expensive dollar sources; on the other hand, delayed effects of the world rise in prices are beginning to be felt in recorded import prices.

The progress of the export drive for manufactures towards the newly revised targets for the end of 1948 is shown in Table 3. Coal exports have also started up and 1 Mn . tons were exported in the first quarter. The over-all export target for the end of 1948 is $150 \%$ of 1938 .

Equally important is the direction of our trade. Table 4 shows a slightly higher proportion of exports going to the Western Hemisphere and a lower proportion of imports coming from there. The Economic Survey for 1948 confirms that $9 \%$ less in volume was exported in 1947 to the Western Hemisphere than in 1938. It is proposed to send $15.3 \%$ of our exports to the Western Hemisphere in the first half of 1948 , and $15.8 \%$ in the second half, a very moderate target. The great change is
expected to come from reducing imports from the Western Hemisphere to $34 \%$ of total imports in the first half of the year, and correspondingly increasing sterling area imports. No change seems to be contemplated in the share of imports coming from Europe and the rest of the world, which is difficult to reconcile with recent trade agreements and policy.

|  | $1938$ | $\begin{gathered} 1947 \\ \text { 3rd Qr. } \end{gathered}$ | $\begin{gathered} 1947 \\ 4 \mathrm{th} \mathrm{Qr} . \end{gathered}$ | $1948$ <br> Jan. <br> Fols. |
| :---: | :---: | :---: | :---: | :---: |
| UMPORTS (c.i.f.) | 12.8 | $15 \cdot 0$ | 14.8 | 12.1 |
| Canada and Nowfoundland | 8.8 | $13 \cdot 3$ | $13 \cdot 0$ | 11.8 |
| Argentina ${ }^{\text {a }}$ W | $4 \cdot 2$ | $7 \cdot 9$ | $7 \cdot 2$ | $7 \cdot 9$ |
| Rest of W. Hemisphere | 6.8 | 9.7 | $8 \cdot 4$ | 6.0 |
|  | $32 \cdot 6$ | $45 \cdot 9$ | $43 \cdot 4$ | 37.8 |
| South Africa | $1 \cdot 6$ | 1.4 | 1.7 | 1.5 |
| Other Sterling Areas ... | $29 \cdot 6$ | $28 \cdot 7$ | 31.0 | $33 \cdot 1$ |
| Europe and Dependencies | $31 \cdot 9$ | 20.8 . | $20 \cdot 3$ | 21.8 |
| Rest of World ... | $4 \cdot 2$ | 3-2 | $3 \cdot 6$ | $5 \cdot 8$ |
| Total | 100 | 100 | 100 | 100 |
| EXPORTS (f.o.b.) inclu | ding re-exports. |  |  |  |
| Canada and Nowfound. | 5.4 |  | $4 \cdot 5$ | $4 \cdot 9$ |
| land ... ... ... | $4 \cdot 6$ | $3 \cdot 8$ | $4 \cdot 2$ | $4 \cdot 2$ |
| Argentina | $3 \cdot 7$ | $3 \cdot 3$ | 2.8 | $2 \cdot 6$ |
| Rest* of W. Hemisphere | $3 \cdot 9$ | $4 \cdot 5$ | $4 \cdot 5$ | $5 \cdot 1$ |
|  | $17 \cdot 6$ | 15.7 | 16.0 | 16.8 |
| South Africa | $7 \cdot 5$ | $7 \cdot 3$ | $7 \cdot 4$ | 7.8 |
| Other Sterling Areas. | $34 \cdot 1$ | 41-2 | 41.4 | $42 \cdot 3$ |
| Europe and Dependencies | $36 \cdot 2$ | $28 \cdot 6$ | $29 \cdot 0$ | 26.9 |
| Rest of World ... | $4 \cdot 6$ | $7 \cdot 2$ | $6 \cdot 2$ | 6.1 |
| Total ... | 100 | 100 | 100 | 100 |

* Ex sterling area cōuntries, but including Japan and Philippines


# WORLD COMMODITY SURVEY 

By C. F. Carter

Timber.
Before the war about $53 \%$ of the annual consumption of forest products was for fuel, $36 \%$ for housing, furniture and sundry industrial uses, $2 \%$ each for railway sleepers and for pitprops, $7 \%$ for paper and less than $\frac{1}{2} \%$ for rayon. But these figures summarize an immense diversity of end-uses. For some, substitute materials are available; coal or hydro-electric power instead of wood for fuel, steel for furniture, concrete for railway sleepers, and so on. In other cases technical factors may limit the possibility of quick adjustment to demand ; witness the present tight situation in the rayon pulp market. Not only have the various uses of
timber to be considered, but the many varieties of wood, each with their particular uses, and the great number of possible sources of supply. For this reason it is impossible to give here an appraisal of the world situation for hardwoods, which are grown in numerous varieties almost everywhere ; and no attempt has been made to summarize the facts on timber in the main table which accompanies this article.

The softwood situation is a little simpler, but it must be remembered that a good deal of substitution of different types of wood, and of hard for soft, is, or could become, technically possible. This is of importance, for enormous reserves of hardwoods exist in tropical areas,
while the largest reserve of coniferous trees is in the U.S.S.R. and its availability to the rest of the world is doubtful. More than a third of the world's softwood is produced and consumed in the U.S.A., now a net importer. All the other large consumers are in Europe, and in Europe the shortage of softwoods is at present felt acutely. It is on the causes of this shortage, and on its true nature, that we shall concentrate. It should be noted that in 1946 the U.S.A. alone consumed $65 \%$ more than the whole of Europe outside the U.S.S.R. The marginal fluctuations of the United States timber economy may therefore be a decisive influence upon prices and upon the possibility of meeting the needs of the other consumers.

There is no shortage of timber stocks in the world, taking all types together. Despite the immense scale of man's wanton destructiveness, the virgin forests of the world are twice as large as those already exploited. These virgin forests are not an idle reservoir, like a petroleum reserve, whose contents can be drawn off once and once only. They are themselves the scene of vast natural wastage by decay, amounting to virtually the entire annual growth, and careful exploitation can divert to human use most of this wood, now wasted, while keeping the stock at a high level. But as most of the untouched forests are in the Southern Hemisphere, and as it takes many years to develop new projects, the immediate situation is dominated by the supply from forests already being worked.

From this point of view the world softwood situation is unpromising. The emergence of the United States as an importer (to an amount, in 1946, of a quarter of the Canadian exports) is significant enough. It becomes more so in the light of the fact that the U.S.A. is consuming twice its own annual saw-log growth and ought therefore to conserve its resources by importing far more. Exploitation of the more distant timber resources of Canada will doubtless be pressed forward to meet United States needs ; but it is quite possible that North America will cease to have any surplus of softwood for the rest of the world.

That surplus was in any case only three-fifths of the pre-war amount in 1946, a rise in Canadian production being more than offset by the new U.S. requirements. The exports of Norway, Sweden and Finland were only $40 \%$ of pre-war. In Sweden a small fall in output has coincided with an increase of consumption; and resources have been diverted to the production of fuel wood (owing to the shortage of coal-also a major factor in Austria) and to wood pulp (which
is a good dollar earner). The Finnish timber industry has not yet recovered from the war, and here, as in other Eastern European countries, production is held back by shortages, not only of lumbering and transport equipment, but of food and clothing for the workers. In many countries (including minor producers like Great Britain) timber was over-cut during the war, and the quantity ought to be allowed to decrease. In some places (e.g., Finland and Czechoslovakia) manpower is a limiting factor. The only bright feature of the situation is that Western Germany, previously a major importer of timber, has emerged as an exporter. This situation is achieved by holding back German consumption and by vigorous exploitation of the German forests, which seem to have been little damaged by the war.

In 1946 the output of softwood in Europe, outside the U.S.S.R., was about $85 \%$ of 1937 ; but as the exporting countries meet their own needs before they export, the amounts available for consumption in that year were very diverse. Britain, the hardest hit, was getting less than $40 \%$ of her pre-war supplies ; Western and Southern Europe had about $70 \%$; while the Scandinavian countries were able to consume sawn softwood at nearly $120 \%$ of the pre-war rate.

If we leave on one side the question of effective demand (to which we shall return later), it may be assumed that the "needs" of the European countries-insofar as that concept has any precise meaning-were well above the pre-war level. An increased population, with higher accepted standards of housing, faces an immense task of making good war damage and of overtaking the arrears accumulated during the war. The existence in many countries of stringent restrictions on the use of timber shows how acutely the need is felt. A quick increase in European output could only be obtained by cutting more wood from forests already being worked, and by wasting less. In many cases increased felling would mean exceeding natural growth, and it is difficult to expect countries to draw on a capital asset for the good of others. But the shortages of equipment and consumer goods, and the competitive demand of other timber uses, are more serious obstacles. Timber is a slow-moving industry. If equipment arrives, will skilled men be available to use it ? If men come forward, can they be clothed and fed ? The long-run trend of European output is downwards; to reverse it is a task even more intractable than getting more coal from British mines, and rendered more difficult by the international co-operation which it requires. To
produce enough to meet the extra consumption in exporting countries, and thus leave over the pre-war surplus for Britain and the other importers, seems to be beyond immediate possibility. Even on optimistic assumptions about the availability of coal (to stop wasteful cutting of fuel wood) and of equipment, there seems to be no prospect of any major increase in the next five years in European output outside the U.S.S.R. ; it is doubtful if it will get back to the 1937 level. For any increased supplies Europe, and especially Britain, must look either to the dwindling resources of North America or else to Russia.

The pressure of this situation has pushed prices up to some $350 \%$ of the pre-war level. Certain exporters have been disposed to require payment in hard currencies, thus still further exaggerating the maldistribution of the limited supply available. Importing countries, notably Britain, have found that supplies can be maintained only by purchasing an increased proportion with dollars in North American countries. It is easy to say that all these difficulties would disappear if Russia would develop her immense resources for the good of Europe. There is no prospect that she will do so to a significant extent ; and, indeed, her own tasks of reconstruction, and the needs of her growing population, may take all the skilled manpower and equipment that she has available. The timber shortage of Western Europe looks like being a long-term affair.

Both the European Timber Conference in the spring of 1947, and the Committee of European Economic Co-operation, attempted estimates of this shortage. Allowing for Eastern Europe, it appears to be some $1 \frac{1}{2}-2 \mathrm{Mn}$. standards out of total 1948 needs (in the importing countries) of 5 Mn . standards; enough to prevent the building of half a million or more traditional houses. But when we turn to consider effective demand, the shortage vanishes. In the early months of this year importing countries have (as far as can be judged) scarcely been ready to buy the softwood available to them in Europe. It is possible that "offshore" purchases under the Marshall Plan will cause a new rise in the demand; but it does not seem likely that effective demand, backed by appropriate foreign currencies, will attain the 1947 estimates of " need." Britain, for instance, has cut her housing programme to a level which will require even less timber than in 1947.

Another facet of the timber problem is the shortage of pit-wood-wood being as essential to full coal production as coal is to wood. The
competition of fuel wood and pulpwood is here especially important. The immediate situation is not too bad-a small deficit is expected in 1948, which can be met from stocks. But in the next four years European coal production may rise by $20 \%$. To obtain a comparable increase in the pitwood supply will be extremely difficult.

To sum up : the softwood situation is characterized by an inelastic, and probably declining, European supply, and by a drying up of the North American surplus. In the short run, currency trouble-that is to say, national poverty-is dominant, to such an extent that timber has almost been in danger of lying unscld. When this difficulty is overcome, the physical shortage will be acute, and likely to remain so until new sources of supply, whether of softwood or of competitive substances, are found.

## Wheat.

Final crop figures for 1947 are not yet available, but the estimates given in the table appear to be approximately correct ; the 1947 out-turn was 5 to $6 \%$ lower than in 1946. 1948 figures are still very tentative. The Southern Hemisphere crops, just harvested, are of the order of 465 Mn . bushels, against 420 last year, a $15 \%$ fall in the Argentine crop being more than offset by a $55 \%$ rise in Australia. The Northern Hemisphere prospects are moderate to good, but there is still time for unfavourable weather to do extensive damage. The harm caused by last year's drought in Europe was even greater than had been feared. The crop (outside the U.S.S.R.) was only $60 \%$ of the pre-war average, and $77 \%$ of the preceding year. This perhaps overestimates the shortfall of bread grains, to which rye contributes a substantial amount in Eastern Europe. The 1947 rye crop, about 380 Mn . bushels (against a European wheat crop, excluding the U.S.S.R., of 930 Mn .) was only $54 \%$ of pre-war, but it was $93 \%$ of the preceding year, so that the 1947 deficit (wheat and rye together) compared with 1946 was 310 Mn . bushels, or about $19 \%$. The British crop was still just above pre-war level, though from an increased acreage.

Against this, North American wheat crops showed a rise of 175 Mn . busbels, due entirely to a record crop in the U.S.A. amounting to twice the 1934-8 average. Canadian production was down by 75 Mn . bushels. But after meeting home needs-especially those caused by the short maize crop-the U.S.A. expects to export about 30 Mn . bushels less in the current crop year (beginning July 1947) than in its predecessor. Canadian exports will also be down. From the
point of view of Western Europe, however, the importance of the fall in Western Hemisphere wheat supplies has been obscured by other difficulties. The acute dollar shortage has led to hand-to-mouth purchasing, and until the full Marshall Plan was passed by Congress it was doubtful whether the North American surplus would be absorbed. Some slight relief has, in the meantime, come from other quarters. The Australian surplus relieves Britain, in particular, from the necessity of paying for so much wheat in hard currencies. The U.S.S.R. is believed to be exporting up to 75 Mn . busbels in this crop-year-mainly to Eastern Europe. The slow recovery of rice production in Asia may release some grain for other countries. Rice production in the current season is estimated at $7,100 \mathrm{Mn}$. bushels, against the pre-war $7,440 \mathrm{Mn}$. bushels, but only $6,420 \mathrm{Mn}$. bushels in 1945-6.

At the turn of the year American prices were well above $\$ 3$ per bushel ; by mid-February they were down to $\$ 2.40$. In the first half of April Chicago May futures ran around $\$ 2.46$, but with a rising trend, while December futures averaged $\$ 2.32$, also rising. Given a free supply of dollars, \$3 might have been held; the lower prices reflect an uncertainty about foreign demand even given the stimulus of the Marshall Plan, together with optimistic crop estimates.

The long-term prospects remain discouraging. The wheat-using world has a population more than $6 \%$ above pre-war, but it has less wheat than in the 1930's. The succession of enormous harvests in North America cannot go on for ever ; indeed their continuance is by some believed already to menace the productivity of United States land. We are not yet in sight of an increase in output, in Europe and elsewhere, which will catch up with the increase of population while at the same time diminishing reliance on dollar sources of supply. Years of scarcity may still be ahead.

The nations, however, must plan also for abundance. An International Wheat Agreement was provisionally made in Washington in March, but is subject to the ratification of the countries involved. It guarantees that in the five seasons beginning in 1948 the U.S., Canada and Australia will stand ready to sell to 33 importing countries 500 Mn . bushels a year at $\$ 2$ (Canadian) per bushel for No. 1 Manitoba Northern in store at Fort William or Port Arthur ; so that when the price of wheat reaches the $\$ 2$ level, the importers are assured of some limitation of their commitments. The Argentine and Russia are not covered by the agreement, and the requirements of the importers in the current
season have exceeded 500 Mn . bushels, so that the limitation is not absolute. But Britain is already committed to pay $\$ 2$ for Canadian wheat in the coming season, and has paid $\$ 2.70$ for Australian wheat ; on current prices, Britain stands to gain, while other purchasers (lacking the advantage of long-term contracts at favourable prices) will gain more.

The other half of the Agreement is intended to limit the downward fluctuations of wheat prices. The 33 importers stand ready to buy 500 Mn . bushels of wheat at a price which starts at $\$ 1.50$ and falls by 10 cents each year to $\$ 1.10$. In the first year, this should ensure most producers a profit, while in all the years it is a valuable guarantee against catastrophic loss. The whole world gains from a high and steady level of prosperity in the primary producing countries, and the limitation of wheat price fluctuations to a range not exceeding 90 cents may be a valuable stabilising influence. On the other hand there are some who think that Britain, the largest importer, ought not to run the danger of having to subsidise foreign agriculture as well as her own. Obviously one's judgement must be based on some assumption of the course which wheat prices would take in a free market. A high price is, in our view, necessary for some time to come, to call forth the extra production which the world needs and to avoid the feeding of wheat to livestock. The Agreement-if, indeed, it is ratified-may be that still too rare phenomenon, an international commodity agreement from which the consumer stands to gain.
Sugar.
Since our last review (Bulletin, November 1947, p. 119) the main part of another sugar season has passed, and it is becoming possible to estimate the $1947 / 8$ crop in the various producing areas. The facts and figures quoted in this note are derived from Messrs. C. Czarnikow's "Review," and their production estimates may be summarized as follows :

| Mn. Tons, Raw Value. | 1937/8 | 19467 | 1947/8 |
| :---: | :---: | :---: | :---: |
| European beet (exc, Russia) | 7.2 | 5.2 | 4.6 |
| U.S.S.R. ... ... ... | 2.5 | 1.5 | 2.7 |
| U.S.A. (beet) | 1.2 | 1.4 | 1.7 |
| Total Beet | 11.1 | 8.2 | 9.2 |
| Cuba, San Domingo, Haiti, Mexico ... | 3.8 | 6.9 | 6.8 |
| U.S.A. (cane), Hawaii, Puerto Rico. Philippines | 3.1 | 2.2 | 2.5 |
| British Empire (cane) | 2.4 | 2.1 | 2.3 |
| Brazil, Argentina, Peru | 1.7 | 2.4 | 2.3 |
| India, Pakistan* | 3.2 | 3.2 | 3.1 |
| Jeva, Formosa | 2.5 | 0.1 | 0.4 |
| Total Cane (including other producers) | 18.1 | 17.8 | 18.5 |
| World Total | 29.1 | 26.1 | 27.7 |

It can be seen that the present season is reproducing the fundamental features of its predecessor. European beet sugar production was seriously down because of the unfavourable weather; cane production is slightly above pre-war, entirely because of the rise in Cuban production, which more than offsets the fall in the Philippines, Java and Formosa. The world crop is $1 \frac{1}{2} \mathrm{Mn}$. tons below pre-war, but in addition the exporting and self-sufficient countries are consuming an extra $1 \frac{1}{4} \mathrm{Mn}$., and the expected U.S. absorption is up by $\frac{3}{4} \mathrm{Mn}$. ; so that the importing countries must meet the needs of their increased population with $3 \frac{1}{2} \mathrm{Mn}$. tons less than in 1937/8.

Nevertheless, the concentration of supplies in dollar areas was already leading last autumn to a weakness of effective demand for the Cuban surplus. At that time the world open market price for Cuban raw sugar was around $\$ 4.25$ per 100 lb . f.o.b. Heavy buying by the U.S. Army for Japan, Korea and Germany helped the situation for a while, but renewed fears of currency shortage brought the price down to $\$ 4.00$ in December, and to $\$ 3.75$ in January. In February, however, the U.S. Government contracted to buy 890,000 tons of the current Cuban crop at $\$ 4.00$; and a further 360,000 tons was taken off the market, to be placed in the bands of the Cuban Sugar Institute and released in lots of 100,000 tons in the event of a major rise in price. This release is optional when the price reaches $\$ 4.95$, and automatic when it attains $\$ 5.25$. The U.S. purchases are believed to be for Marshall Plan and Army relief needs, and are of course additional to the Cuban quota in the U.S. domestic market, which allows for maximum purchases in 1948 of 2,630,000 tons. Assuming open market sales of 1 Mn . tons, some 600,000 tons of the Cuban crop has still to be accounted for, in addition to the 360,000 tons segregated. After a firm period, with prices ranging up to $\$ 4.40$, the market weakened again during March, with sales around $\$ 4.10-\$ 4.25$. It remains to be seen to what extent the European Recovery Programme will cause purchases in addition to those already made. The market, however, has recently been firmer, with prices around $\$ 4.45-\$ 4.50$. In the meantime U.S. domestic demand has been weakening-a reaction from excessive consumer purchases last yearand the segregation of further parts of the Cuban crop has been under discussion.

## Cotton.

The general conclusions of the note in the February 1948 issue of the Bulletin remain valid.
U.S. domestic consumption remains at well over 9 Mn . bales per year but there has been some weakening of the demand for textiles, and the rate is therefore likely to drop. During the early months of the year exports of U.S. cotton were very low, doubtless because some nations were drawing on stocks while waiting for a decision on the European Recovery Programme. The uncertainties of the situation led to a price decline of over 3c. per lb . in February. But the Recovery Programme envisages U.S. exports of cotton to the participating nations which, though still below the 1935-9 average, are four times recent rates of export. The prospects for the next U.S. crop are not too encouraging ; and the carry-over from last season was very small. These considerations have contributed to a strengthening of the U.S. price, which at the time of writing (April 20th) is approaching 39 cents per lb . Demand for other growths of cotton has been strong, and world prices generally have been advancing. The advance has attracted exceptional attention in Britain, because it has coincided with the beginning of a new policy of relating the Cotton Commission's prices to world prices, which has meant a doubling of the price of Egyptian cotton to U.K. spinners.

## Wool.

The year opened with rising prices and increasing differentials between the types; and (as mentioned last quarter) a certain amount of demand was being shifted on to medium crossbreds from merinos and fine crossbreds, which were considered too dear. Late in February prices broke-as far as can be seen, for local and technical reasons rather than because of any underlying change in demand. Immediately the demand for coarser types as a second-best fell off and interest in the finer wools was renewed. Thus, while good merinos dropped $10 \%$ at the March London sales, medium and coarse crossbreds dropped 20 to $25 \%$. 60's and finer were still above their December 1947 price ; 46's were right back to the March 1947 price, and the price spread from 46's to 70's was no less than $320 \%-25 \frac{1}{2} \mathrm{~d}$. to 81 d .-compared with about $210 \%$ before the war. But in April prices began to firm up again, and the finer wools are nearing their February levels.

## Flax.

Flax is the fibre of the linum plant, which is grown in two varieties. One is a branching plant, whose fibre is of little value, but which yields linseed for oil and cake. The other, a non-branching type, has little seed yield, but

## WORLD COMMODITY SURVEY

| Commodity | Season | Unit | Pre-war base | WORLD PRODUCTION |  |  | WORLD | CONSUMPTION |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  | $\begin{gathered} \text { Last } \\ \text { season }(e) \end{gathered}$ | Last season (e) $\%$ of pre-war | Current season (e) \% of pre-war | Last season (e) | Last season (e) \% of pre-war | Current <br> season (e) \% of pre-war |
| Wheat... | All crops harvested in calendar year | Mn. bush. of 60 lb . | $\begin{gathered} \text { Average } \\ 1935-9 \end{gathered}$ | 3,940 (a) | 98 | 92 | n.a. | - | - |
| Fats and Oils | Calendar year | 000 tons | $\begin{gathered} \text { Average } \\ 1935-9 \end{gathered}$ | $\begin{gathered} 15,800 \\ \text { (oil equiv.) } \end{gathered}$ | 82 | 87 | n.a. | - | - |
| Sugar . | Begins Sept. | 000 tons | 1937-8 | $\begin{gathered} 26,055 \\ \text { (raw value) } \end{gathered}$ | 89 | 95 | $\begin{gathered} 24,556 \\ \text { (raw value) } \end{gathered}$ | 86 | 95 |
| Tea | Calendar year | Mn. lb. | $\begin{aligned} & \text { Average } \\ & \text { 1936-8 } \end{aligned}$ | $\begin{gathered} 662 \\ \text { (exports) } \end{gathered}$ | 75 | n.a. | n.a. | - | - |
| Cocoa . | Begins October | 000 tons | $\begin{array}{\|l} \text { Av. } 1935 / 6 \\ \text { to } 1938 / 9 \end{array}$ | 630 | 92 | 94 | (630) | (95) | (97) |
| Cotton... | Begins August | Mn. bales ( 480 lb . net) | $\begin{aligned} & \text { Av. } 1935 / 6 \\ & \text { to } 1939 / 40 \end{aligned}$ | $21 \cdot 5$ | 70 | 80 | $26 \cdot 3$ | (94) | (98) |
| Wool (apparel) | Begins July (d) | Mn. lb. | $\begin{aligned} & \text { Av. } 1935 / 6 \\ & \text { to } 1938 / 9 \end{aligned}$ | 2,900 greasy | 99 | 99 | 3,400 | 110 | 110 |
| Flax | Calendar year | 000 tons | $\begin{gathered} \text { Average } \\ 1934.8 \end{gathered}$ | 360 | 47 | 42 | n.a. | - | - |
| Jute | Begins July | 000 tons | $\begin{aligned} & \text { Av. } 1934 / 5 \\ & \text { to } 1938 / 9 \end{aligned}$ | 1,020 | 60 | 90 | п.я. | - | - |
| Sisal | Calendar year | 000 tons | $\begin{gathered} \text { Average } \\ 1934-8 \end{gathered}$ | 195 | 83 | 85 | n.9. | - | - |
| Rubber | Calendar year | 000 tons | $\begin{gathered} \text { Average } \\ 1936.9 \end{gathered}$ | 1,644 incl. 838 natural | 158 | 173 | $1,467, \text { incl. } 555$ natural | 132 | 154 |
| Copper | Calendar year | 000 tons | $\begin{aligned} & \text { Average } \\ & \text { l } 937.8 \end{aligned}$ | 1,850 (mine basis) | 87 | n.a. | 2,150(i) | 115 | n.e. |
| Lead ... | Calendar year | 000 tons | 1938 | 988 (mine basis) | 60 | 80 | 1,060 | 74 | n.a. |
| Tin | Calendar year | 000 tons | $\begin{gathered} \text { Average } \\ 1936-8 \end{gathered}$ | $88 \cdot 5$ | 50 | 65 | $110 \cdot 7$ | 65 | 78 |
| Zinc ... | Calendar year | 000 tons | 1938 | 1,310 (ore basis) | 91 | n.a. | 1,300 (virgin) | 100 | 108 |

It will be appreciated that many figures included above are rough estimates only. This applies especially to those in brackets. All tons are long tons of $2,240 \mathrm{lbs}$. n.a. $=$ not available. (a) excluding U.S.S.R. and China. (b) apparent supplies. (c) average 1936-9. (d) Some minor producers on other seasons.

## WORLD COMMODITY SURVEY

| WORLD STOCKS |  |  | U.K. CONSUMPTION |  | PRICES (1948) |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Date | Amount | \% of pre-war | Last season (e) | $\%$ of pre-war | Date | Representative price | $\begin{gathered} \% \text { of } \\ \text { pre-war (g) } \end{gathered}$ |
| - | n.a. | - | (220) (b) | (81) | April, 1948 | Chicago May futures $\$ 2.50$ per bush. | $\begin{gathered} 257 \\ 305(\mathrm{~g}) \end{gathered}$ |
| - | n.a. | - | $(1,070)$ | (75) | Jan., 1948 | U.S. Dept. of Labor index $(1926=100) \quad 236 \cdot 7$ | $\begin{aligned} & 400(\mathrm{c}) \\ & 478 \text { (g) } \end{aligned}$ |
| - | n.a. | - | $\begin{aligned} & 1,660 \text { refined } \\ & =1,820 \text { raw } \end{aligned}$ | 78 | April, 1948 | Raws, f.o.b. Cuba $\$ 4 \cdot 45 \text { per } 100 \mathrm{lb} \text {. }$ | $\begin{gathered} 310 \\ 375(\mathrm{~g}) \end{gathered}$ |
| - | n.a. | - | 380 absorption | 87 | Av. May to Mar., 1947/8 | Calcutta auction average, with export rights $2 / 4 \frac{1}{2} \mathrm{lb}$. | (246) |
| - | n.a. | - | 110 (1) | 104 | April, 1948 | Accra, c.i.f. New York 36 c. per lb. (nominal) | $\begin{gathered} (505) \\ (615)(\mathrm{g}) \end{gathered}$ |
| 31 July, 1947 | 18 | 103 | $1 \cdot 66$ | 60 | $\begin{aligned} & \text { April 20th } \\ & 1948 \end{aligned}$ | New York spot, middling $15 / 16^{\prime \prime} \quad 38.8 \mathrm{c}$. per lb. | $\begin{gathered} (362) \\ (430)(\mathrm{g}) \end{gathered}$ |
| $\begin{aligned} & 30 \text { June, } \\ & 1947 \end{aligned}$ | 4,415 | n.a. | 660 actual weight, all uses | 99 (f) | April, 1948 | Dominions wool, average clean delivered cost out of London Sales $64 ' \mathrm{~s},=87 \mathrm{~d} . \mathrm{lb}$. $48^{\mathrm{s}} \mathrm{s}=30 \frac{1}{2} \mathrm{~d} . \mathrm{lb}$. | $\begin{aligned} & 326 \\ & 229 \\ & 229 \\ & (k) \end{aligned}$ |
| - | n.a. | - | $37 \cdot 5$ | 58 | April, 1948 | Medium Courtrai, water retted <br> 4,500 fr. per bale | $\begin{aligned} & 360 \text { (h) } \\ & 267 \text { (g) } \end{aligned}$ |
| $\begin{gathered} 1 \text { July, } \\ 1947 \end{gathered}$ | $\stackrel{200}{(\text { in India) }}$ | 20 | 94 | 54 | April, 1948 | First Marks, c.i.f. London £93 per ton | 510 |
| - | n.a. |  | n.a. | - | April, 1948 | No. 1 (free) $£ 100$ per ton | . 597 (h) |
| $31 \text { Jan., }$ | 912 incl. 840 natural | 160 | 127 incl. 97 nat. | 114 | April, 1948 | London R.S.S. spot $12 \frac{1}{2} \mathrm{~d}$. per lb, | 151 |
| 31 Dec., 1947 | 196 refined | (57) (j) | 325 (virgin, home use) | 116 | April, 1948 | U.S. electro., Connecticut Valley $21 \cdot 5 \mathrm{c}$. per lb. | $\begin{gathered} 182 \\ 225(\mathrm{~g}) \end{gathered}$ |
| - | n.a. | - | 218 (refined, home use) | 50 to 60 | April, 1948 | New York $\quad 17.5 \mathrm{c}$. per lb . | $\begin{gathered} 367 \\ 445(\mathrm{~g}) \end{gathered}$ |
| 31 Dec., 1947 | $121 \cdot 6$ | n.a. | $25 \cdot 6$ (home use) | 116 | April, 1948 | Refined, New York, 94c. per lb, | $\begin{gathered} 193 \\ 235(\mathrm{~g}) \end{gathered}$ |
|  | n.a. | - | 216 (virgin, home use) | 116 | April, 1948 | U.S. Prime Western (East St. Louis) 12 c. per lb. | $\begin{gathered} 259 \\ 314(\mathrm{~g}) \end{gathered}$ |

[^22]provides a soft and fine fibre. Flax for fibre is not cut, but pulled out of the ground, a process which has only recently been mechanized, and which still in most producing areas makes heavy seasonal demands for labour. The fibre must then be extracted from the woody material, cleaned and straightened. This usually involves two processes, retting and scutching. Retting is the decomposition of the wood by water; the primitive method of carrying it out is by leaving the crop on the ground to suffer the action of the dew, but a better fibre is produced by steeping the crop in a dam or tank of stagnant water for 8 to 14 days, and then drying it. Water retting can be undertaken either on the farm or in a central rettery. The dried flax is taken to a scutch mill, where the woody material, loosened by retting, is beaten out. The fibre is then spun and woven in the usual way; but the whole process of preparation of flax is expensive and laborious.

Flax grows wild in the Middle East ; it has been used as a fibre for ropes since the Stone Age, and linen textiles were common in ancient Egypt. The plant is a traditional product of certain peasant economies, especially in Eastern Europe, where there is an abundance of labour for the arduous and unpleasant tasks of weeding, pulling and retting. It is essential for an understanding of the present position to realise that linen has been fighting a prolonged rearguard action against cotton and jute. It can hold its own only in a limited field, where its superiority in strength and texture outweighs its higher price. A large part of the world's flax consumption is traditional and local, and will not survive the breakdown of the isolation of peasant communities. Some is used for strong threads and cords ; most of the rest finds its way, as high-cost fine linen fabric, to the wealthy markets of the world, and especially the U.S.A.

The average world production of flax fibre in 1934-8 was 770,000 tons. Of this, no less than 548,000 tons were produced in the U.S.S.R. ( 10 per cent. of this being exported to Western Europe). The position may be summarized as follows :


During the war, a large part of the Eastern European producing area was overrun by the

Germans, causing a drop of up to $50 \%$ in output ; while in Western Europe (except Belgium), the British Empire and Egypt production was maintained or expanded, as a substitute for other fibres or to make up for lost sources of imports. The special inducements offered were reduced or terminated with the end of the war, while production in Eastern Europe has been recovering only slowly. In 1946 world production was less than half pre-war production, and in 1947 it may have been even lower. The Northern Ireland linen mills depend heavily on imports from Belgium, but these in turn depend on the amounts of Russian flax coming forward to Western Europe. Prices have hardened in recent months, and now average over three times pre-war prices.

## Jute.

Jute is a soft fibre obtained from the stalks of two varieties of an annual plant, Corchorus, which grows best in a deep, fine alluvial soil and a warm, wet climate. It grows to a height of five to fifteen feet, maturing in three to four months ; it is cut when the flowers appear, tied into bundles, and retted by immersion in water for from ten to twenty days. The fibre can then be stripped from the stalks, washed, dried and baled. Virtually the whole of the preparation is carried out by hand; and the coincidence of a suitable soil and climate with an abundance of cheap labour has caused a concentration of almost all the world production in the subcontinent of India, especially in Eastern Pakistan. There is no technical objection to mechanising the decortication of jute, but the primitive hand methods are maintained because of the cheapness of the labour which undertakes them.

Jute has been used for hand weaving since ancient times. The mill production of hessian, sacking, rope and twine from jute has two main centres-the Calcutta district of India, and Europe, especially the United Kingdom. Calcutta has also been a principal place of export for raw jute; but with the division of the country the Calcutta mills must draw their supplies from Pakistan, and it is understood that the Pakistan Government proposes to develop new mill capacity in its own territory, and to encourage exports through the port of Chittagong. Last November Pakistan, to maintain its revenues, imposed an export tax of $£ 66 \mathrm{~s}$. per ton on all jute leaving its territory. The Indian Government is therefore likely to try to expand production in its own territory; while both Governmencs have an interest in processing as much jute as they can before export, thus increasing their
foreign currency earnings. Raw jute exports are therefore regulated by quota-Pakistan's quotas being relatively generous at present, pending the establishment of her own mills.

Before the war, production averaged about 1.7 Mn. tons (1934-8). In 1941 Bengal production was limited (by regulation of acreage) to avoid a glut caused by the closing of the Continental Europe market. Later in the war it was limited in an effort to expand rice production; in $1946 / 7$ the output was down to 1 Mn . tons, but in $1947 / 8$ it was back to about 1.5 Mn . tons. But the pre-war Indian production of jute manufactures was about 1.2 Mn . tons, with a tendency to rise; whereas in 1946 it was 1.0 Mn . tons, and more in 1947. The non-Indian manufacturing countries have had to suffer a cut in their raw material supplies more severe
then the sbortfall in production would suggest.
Jute is closely threatened by substitutes, such as cotton and paper for bags; but it is perhaps reasonable to suppose that competition between India and Pakistan will help to maintain its relative cheapness. But this is in the future, and it is significant that ruling prices c.i.f. London are 5 times pre-war level, higher than most of the fibres. At the present time most of the jute arriving at Calcutta is being taken up by the local mills, while the Calcutta export quotas have been filled, and the diversion of export business to Chittagong is well under way.
(Acknowledgements are made for assistance from many quarters, including FAO publications, Messrs. C. Czarnikow's " Review," the International Wool Secretariat, the Commonwealth Economic Committee, and Messrs. Wigglesworth and Co.)

# OUTPUT OF THE BLILDING AND CIVIL ENGINEERING INDUSTRIES. 

By Ian Bowen.

In the Table on p. 70 estimates are given for the value of output of the building and civil engineering industries for each quarter of 1946 and 1947. The estimates have been made by applying factors of output per head to the official returns of labour employed on different classes of work. Allowance have been made for changes in wage-rates and in materials prices.

The figures, being derived from an employment series, represent " value of work done" in each quarter, inclusive of changes in the amount of work in progress, and not " value of completions." The distinction is of considerable importance in the case of the constructional industries.

Seasonal Adjustments.-Holidays with pay have been treated as periods of nil output which add to overhead costs. For this reason an adjustment has been introduced for the second and third quarters of the year, as well as the seasonal correction for weather in the first quarter of 1947. This new adjustment accounts for the revision of some of the figures compared with those shown previously (February 18th, 1948).

Working Principals.-Many firms in the building and civil engineering industries have "working principals," that is, employers who are themselves sometimes engaged on manual work. The output of such working principals is included in the total value of output of firms.

Many firms, however, return " nil" operatives, and for these cases, where the firm also has a working principal the value of output is not easy to estimate. On the assumption that, over the year, the working principals of " nil operative" firms did about half as much work as a fully employed operative, about $2 \%$ needs to be added to the previously estimated total output for 1946 and about $3 \%$ to the figure for 1947 .

This adjustment has been made in the Table, and the value of output distributed between the different classes of work.

Repairs and Maintenance for Houses.-The value figures under this heading have been increased, as a series of revised figures for labour on repair and maintenance for houses $\dagger$ is now published in the Monthly Digest of Statistics. There were correspondingly fewer men on Other Work, and the value figures for this category have been adjusted downwards.

Temporary Housing.-The Table includes, as previously, an allowance for site work for the temporary housing programme.

For non-aluminium temporary houses site work represented about $28 \%$ of the total cost of these houses (according to the revised estimates published in Table 2 of Cmd. 7304), and an even lower percentage for the aluminium houses. On a " value of completions" basis, inclusive of the

[^23]factory cost of temporary houses, and of their fittings, and also of transport distribution and storage, Ministry of Works' departmental expenses, and contingencies, the figures for both 1946 and 1947 would have to be considerably increased. 82,930 temporary houses were finished in 1946, and 46,092 in 1947. The total cost of non-aluminium types of temporary house, inclusive of all the above-mentioned items, and site-work, averaged $£ 1,168$ and of the aluminium temporary house $£ 1,610$ (see Cmd. 7304). On the basis of these figures some $£ 70 \mathrm{Mn}$. of additional output should be allowed for 1946 and about $£ 50 \mathrm{Mn}$. for 1947.

No figures have yet been published which would enable a corresponding estimate to be made of the factory cost of the non-traditional types of permanent houses.

Output in 1947.-According to the estimate shown, gross value of output in 1947 was some $£ 606 \mathrm{Mn}$. in comparison with a total of $£ 527 \mathrm{Mn}$. in 1946, a rise of $£ 79 \mathrm{Mn}$. in the annual rate. New housing rose by $£ 18 \mathrm{Mn}$., and repairs and maintenance of housing by about the same amount. On the other hand, there was a heavy fall in the value of work done on war damage repairs of houses. There was a very considerable increase in the value of work done for "industry and agriculture " and other work, items which are
inclusive of a large part of the Government building programme.

Quarterly fluctuations in the value of work done reflect the holidays with pay scheme (decline in the figures for the third quarter), and the high level of activity in the last quarter of 1947.

The Future of Building Output and Employ-ment.-Since the cuts in the capital programme were announced last autumn, drastic. measures to prune the rate of approval on the licensing of new projects have been taken. "New contracts" for housing averaged 15,100 per month in the first half of 1947, but only 7,100 per month in the last quarter, a decline of $53 \%$. (Monthly Digest of Statistics, March 1948, Table 78.) The total value of licences issued for other work by the Ministry of Works and by the local autborities averaged $£ 29 \mathrm{Mn}$. a month in the first half of 1947, and only $£ 23 \mathrm{Mn}$. a month in the last quarter, a decline of $21 \%$. Work directly authorised by Government Departments, and falling outside either the housing programme or the licensing system, was also heavily reduced.

It might therefore have been supposed that there would already have appeared indications of a reduced demand for materials, and of unemployment in the building and civil engineering

ESTIMATED GROSS OUTPUT OF THE BUILDING AND CIVIL ENGINEERING INDUSTRIES IN GREAT BRITAIN (£Mn.). Seasonally adjusted as above.

|  | HOUSING |  |  |  | WORK <br> OTHER THAN HOUSING |  |  | TOTAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | New houses | Conversions and adaptations | War damage repairs for houses | Repairs and mainten- ance for houses | Other war damage repair | $\begin{aligned} & \text { Industry } \\ & \text { and } \\ & \text { agri. } \\ & \text { culture } \end{aligned}$ | Other |  |
| $\begin{array}{cc} 1946 \text { Qr. } & \text { II } \\ \text { ", } & \text { III } \\ , " & \text { IV } \end{array}$ | $30 \cdot 3$ $42 \cdot 5$ $48 \cdot 6$ $62 \cdot 1$ | $\begin{aligned} & 5 \cdot 6 \\ & 5 \cdot 8 \\ & 5 \cdot 4 \\ & 6.1 \end{aligned}$ | $\begin{aligned} & 25 \cdot 8 \\ & 23 \cdot 6 \\ & 19 \cdot 6 \\ & 20 \cdot 1 \end{aligned}$ | $\begin{aligned} & 11.0 \\ & 13.0 \\ & 13.9 \\ & 16.2 \end{aligned}$ | $\begin{aligned} & 3 \cdot 6 \\ & 3 \cdot 9 \\ & 3 \cdot 5 \\ & 4 \cdot 1 \end{aligned}$ | $\begin{aligned} & 12 \cdot 3 \\ & 16 \cdot 8 \\ & 19 \cdot 9 \\ & 24 \cdot 3 \end{aligned}$ | $\begin{aligned} & 19 \cdot 0 \\ & 22 \cdot 5 \\ & 21 \cdot 6 \\ & 25 \cdot 6 \end{aligned}$ | $\begin{aligned} & 107.6 \\ & 128.1 \\ & 132.5 \\ & 158 \cdot 6 \end{aligned}$ |
| Total | 183.5 | $22 \cdot 9$ | 89-1 | $54 \cdot 1$ | $15 \cdot 1$ | $73 \cdot 3$ | 88.7 | 526.7 |
| $1947 \text { Qr. } \begin{array}{cc} \text { II } \\ \text { ", } & \text { III } \\ \text { II } & \text { IV } \end{array}$ | $42 \cdot 1$ $51 \cdot 1$ $49 \cdot 5$ $59 \cdot 1$ | $\begin{aligned} & 4 \cdot 8 \\ & 6.6 \\ & 5 \cdot 7 \\ & 6 \cdot 1 \end{aligned}$ | 13.6 17.4 14.6 $15 \cdot 3$ | $\begin{aligned} & 13 \cdot 4 \\ & 19 \cdot 3 \\ & 18 \cdot 1 \\ & 21 \cdot 3 \end{aligned}$ | $\begin{aligned} & 3 \cdot 1 \\ & 4 \cdot 3 \\ & 4 \cdot 1 \\ & 4 \cdot 3 \end{aligned}$ | $\begin{aligned} & 16.9 \\ & 26.4 \\ & 26.9 \\ & 30.7 \end{aligned}$ | $\begin{aligned} & 21 \cdot 4 \\ & 34 \cdot 7 \\ & 34 \cdot 2 \\ & 40 \cdot 0 \end{aligned}$ | $\begin{aligned} & 115 \cdot 3 \\ & 159 \cdot 8 \\ & 153.1 \\ & 177 \cdot 8 \end{aligned}$ |
| Total | 201.8 | 23.2 | 60.9 | 73.1 | 15.8 | 100.9 | $130 \cdot 3$ | 606.0 |

Continued on p. 54.


| Monthly <br> Averages or <br> Months． | STOCKS \＆SHARES II |  |  |  | MONEY＊ |  | $\begin{aligned} & \text { NEW } \\ & \text { CAPITAL } \\ & \text { ISSUES } \end{aligned}$ |  | OTHER BANKING． |  |  |  |  |  |  |  |  |  | $\begin{aligned} & \text { TREASURY } \\ & \text { BILLS. } \end{aligned}$ |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Industrials |  | Fixed Interest |  |  |  |  |  | Bank of England． |  |  | Nine Clearing Banks |  |  |  |  |  |  |  |  |  |
|  | $\begin{aligned} & \text { o } \\ & \text { H. } \\ & \text { 苟品 } \\ & \text { \% } \\ & \% \text { of } \\ & 1924 \end{aligned}$ |  |  | 4范苐 |  |  | $\begin{aligned} & \text { for } \\ & \text { U.K. } \\ & \text { \& } \mathrm{Mn} \text {. } \end{aligned}$ |  |  |  |  | $\dot{8}$ 0 0 0 0 0 £Mn. |  £Mn |  |  <br> £Mn． |  |  |  |  |  |  |
| 1913 Av． | $62 \cdot 5$ | 5 | 138 | $72 \cdot 5$ | － | 4•38 | $3 \cdot 7$ | $20 \cdot 2$ |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 1919 A | 106 | － | 91 | 110 | － | $3 \cdot 95$ | $15 \cdot 7$ | $19 \cdot 8$ |  |  | 411 |  |  |  |  |  |  |  |  |  | 949 |
| 1920 Av． | 106 | － | 79 | 127 | － | $6 \cdot 36$ | $27 \cdot 6$ | $32 \cdot 0$ |  |  | 449 |  |  |  |  |  |  |  |  |  | 1064 |
| 1921 Av． | 72 | － | 81 | 124 | $4 \cdot 3$ | $5 \cdot 20$ | $8 \cdot 3$ | 18.0 |  |  | 435 | 1768 | 361 |  | 815 | 309 |  |  |  |  | 1143 |
| 1922 Av． | 82 | － | 96 | 105 | $2 \cdot 0$ | 2.62 | $8 \cdot 4$ | $19 \cdot 6$ |  |  | 399 | 1727 | 335 |  | 732 | 372 |  |  | 581 | 234 | ＋15 |
| 1923 Av． | 101 | － | 102 | 98 | $2 \cdot 0$ | 2.78 | $5 \cdot 6$ | 17.0 11.2 |  |  | 385 390 | 1631 | 271 |  | 744 | 338 |  |  | 482 | 152 | 634 |
| 1924 Av． | 100 | － | 100 | 100 | $2 \cdot 4$ | $3 \cdot 45$ | 7.4 11. | 11.2 |  |  | 390 383 | 1632 | 242 |  | 791 | 324 | 11.7 | 48.5 | 442 | 159 | 601 |
| 1925 Av． | 109 | － | 98.3 | 101．8 | $3 \cdot 5$ | $4 \cdot 15$ | $11 \cdot 0$ | $7 \cdot 3$ | 72 | 55 | 383 | 1623 | 223 |  | 839 | 270 | 11.9 | $51 \cdot 7$ | 460 | 150 | 610 |
| 1926 Av． | 115 | － | $96 \cdot 4$ | 103．8 | $4 \cdot 0$ | $4 \cdot 48$ | $11 \cdot 7$ | $9 \cdot 4$ | 69 | 55 | 374 | 1626 | 214 |  | 876 | 249 | 11.8 | $53 \cdot 8$ | 490 | 130 | 620 |
| 1927 Av ． | 124 | － | 96.9 | 103－2 | $3 \cdot 7$ | $4 \cdot 24$ | 14.7 | $10 \cdot 7$ | 66 | 53 | 373 | 1675 | 216 |  | 888 | 238 | $11 \cdot 6$ | 54.5 | 506 | 114 | 620 |
| 1928 Av． | 142 | － | $99 \cdot 2$ | $100 \cdot 8$ | $3 \cdot 6$ | $4 \cdot 16$ | 18.3 | $18 \cdot 3$ | 65 | 52 | 372 | 1729 | 235 |  | 933 | 239 | $11 \cdot 1$ | $53 \cdot 9$ | 496 | 117 | 613 |
| 1929 Av． | 139 |  | 96.3 | $104 \cdot 0$ | $4 \cdot 6$ | $5 \cdot 3$ | $13 \cdot 3$ | 7.9 | 63 | 50 | 361 | 1762 | 226 |  | 974 | 242 | 10.7 | $55 \cdot 3$ | 521 | 239 | 760 |
| 1930 Av． | 112 | － | $99 \cdot 4$ | 100．7 | $2 \cdot 4$ | $2 \cdot 62$ | $10 \cdot 6$ | $9 \cdot 1$ | 66 | 50 | 358 | 1763 | 262 |  | 948 | 243 | 10.7 | 53.8 | 462 | 187 | 649 |
| 1931 Av． | 87 | － | 98.7 | 106.8 | $2 \cdot 9$ | 3.53 | 3.7 | $3 \cdot 8$ | 65 | 54 | 354 | 1723 | 254 |  | 904 | 285 | $10 \cdot 4$ | $52 \cdot 5$ | 487 | 142 | 629 |
| 1932 Av． | 84 | － | 112.4 | $90 \cdot 3$ | 1.7 | 1.94 | $7 \cdot 0$ | $2 \cdot 4$ | 81 | 51 | 360 | 1752 | 307 |  | 830 | 332 | 10.5 | $47 \cdot 6$ | 533 | 188 | 721 |
| 1933 Av． | 103 | － | $124 \cdot 4$ | $80 \cdot 7$ | ． 5 | ． 71 | $7 \cdot 9$ | $3 \cdot 3$ | $\overline{102}$ | $\overline{55}$ | 371 | 1914 | 352 |  | 746 | 519 | $10 \cdot 9$ | $39 \cdot 0$ | 582 | 327 | 909 |
| 1934 Av． | 125 |  | $132 \cdot 5$ | $75 \cdot 7$ | ． 5 | －81 | $8 \cdot 9$ | $3 \cdot 6$ | 102 | 54 | 378 | 1842 | 288 |  | 740 | 543 | 11.3 | $40 \cdot 2$ | 473 | 377 | 850 |
| 1935 Av． | 139 |  | $136 \cdot 2$ | $73 \cdot 6$ | － 6 | ． 57 | $13 \cdot 5$ | 1.7 | 98 | 51 | 394 | 1961 | 264 |  | 755 | 598 | $10 \cdot 8$ | 38.5 | 473 | 393 | 866 |
| 1936 Av． | 161 | － | $136 \cdot 9$ | $73 \cdot 2$ | ． 5 | ． 61 | 15.9 | $2 \cdot 2$ | 96 | 54 | 432 | 2104 | 312 |  | 825 | 598 | $10 \cdot 3$ | 39.2 | 576 | 225 | 801 |
| 1937 Av． | 150 | － | 127.7 | $78 \cdot 4$ | ． 5 | － 59 | 11.6 | $2 \cdot 7$ | 97 | 58 | 479 | 2172 | 276 |  | 910 | 607 | $10 \cdot 3$ | $41 \cdot 9$ | 560 | 229 | 789 |
| 1938 Av． | 123 | － | $126 \cdot 6$ | $79 \cdot 0$ | ． 5 | ． 61 | $7 \cdot 7$ | $2 \cdot 1$ | 104 | 56 | 485 | 2161 | 274 |  | 930 | 593 | $10 \cdot 6$ | $43 \cdot 0$ | 547 | 330 | 877 |
| 1939 Av ． | 114 | － | $116 \cdot 3$ | $80 \cdot 2$ | －8 | 1．20 | $3 \cdot 6$ | 1.9 | 103 | 58 | 507 | 2129 | 246 |  | 943 | 564 | 10.9 | $44 \cdot 3$ | 488 | 582 | 1070 |
| 1940 Av ． | 95 | － | 123.0 | $81 \cdot 6$ | 1.0 | $1 \cdot 04$ | $0 \cdot 3$ | 0.0 | 107 | 77 | 574 | 2377 | 357 |  | 906 | 621 | 10.7 | $38 \cdot 3$ | 793 | 915 | 1708 |
| 1941 Av． | 101 |  | 131.0 | $76 \cdot 6$ | 1.0 | 1.03 | $0 \cdot 2$ | $0 \cdot 0$ | 118 | 69 | 652 | 2818 | 220 | 474 | 815 | 837 | $10 \cdot 4$ | $29 \cdot 1$ | 923 | 1466 | 2389 |
| 1942 Av ． | 113 | － | $135 \cdot 3$ | $74 \cdot 2$ | 1.0 | 1.03 | $0 \cdot 3$ | $0 \cdot 0$ | 131 | 60 | 807 | 3104 | 223 | 614 | 758 | 1006 | $10 \cdot 5$ | 24.5 | 970 | 1700 | 2670 |
| 1943 Av． | 135 | － | $134 \cdot 1$ | $74 \cdot 9$ | 1.0 | $1 \cdot 03$ | $0 \cdot 6$ | $0 \cdot 1$ | 148 | 65 | 966 | 3484 | 173 | 961 | 711 | 1072 | 10.5 | 20.5 | 1107 | 1871 | 2978 |
| 1944 Av | 148 | － | 133.5 | $75 \cdot 1$ | 1.0 | 1.03 | 0.5 | $0 \cdot 1$ | 176 | 66 | 1135 | 3953 | 164 | 1338 | 715 | 1082 | 10.5 | 18.1 | 1337 | 2148 | 3485 |
| 1945 Av． | 156 | － | 135．1 | $74 \cdot 3$ | 0.9 | 0.93 | 1.4 | $0 \cdot 3$ | 207 | 68 | 1284 | 4461 | 181 | 1747 | 753 | 1072 | 10.5 | 16.4 | 1602 | 2288 | 3890 |
| 1946 Av． | 170 | － | $140 \cdot 1$ | $71 \cdot 7$ | $0 \cdot 5$ | 0.53 | $9 \cdot 3$ | $1 \cdot 6$ | 242 | 71 | 1358 | 4846 | 443 | 1436 | 847 | 1251 | $10 \cdot 3$ | 17.5 | 1902 | 2534 | 4436 |
| $\begin{aligned} & 1947 \mathrm{Av} \\ & 1946 \end{aligned}$ | 178 |  | $139 \cdot 2$ | $72 \cdot 1$ | 0.5 | 0.53 | $9 \cdot 8$ | $2 \cdot 8$ | 295 | 102 | 1385 | 5376 | 701 | 1257 | 1056 | 1373 | $8 \cdot 4$ | $19 \cdot 7$ | 2193 | 2549 | 4742 |
| JAN | 158 | $+3.0$ | $135 \cdot 8$ | $74 \cdot 0$ | 0.5 | 0.53 |  |  | 221 | 79 | 1345 | 4493 | 350 | 1439 | 790 | 1142 | 10.5 | $17 \cdot 6$ | 1790 | 2421 | 4211 |
| FEB． | $159 \cdot 5$ | －4．2 | 138.1 | $72 \cdot 8$ | 0.5 | 0.53 | 14．4 | $3 \cdot 2$ | 238 | 66 | 1329 | 4452 | 331 | 1414 | 800 | 1152 | $10 \cdot 3$ | 18.0 | 1720 | 2540 | 4260 |
| MAR． | 160 | $+1.7$ | 137.6 | $73 \cdot 0$ | 0.5 | 0.53 |  |  | 221 | 67 | 1326 | 4513 | 368 | 1389 | 814 | 1157 | $10 \cdot 6$ | 18.0 | 1740 | 2683 | 4423 |
| APR． | 165 | ＋1．3 | 139.0 | $72 \cdot 3$ | 0.5 | 0.53 |  |  | 212 | 69 | 1346 | 4625 | 422 | 1394 | 797 | 1192 | $10 \cdot 4$ | $17 \cdot 2$ | 1820 | 2702 | 4522 |
| MAY | 173 179 | +3.5 +2.8 | $141 \cdot 3$ | 71.1 71.7 | 0．5 | 0.53 | 25．5 | $3 \cdot 5$ | 219 | 66 | 1341 | 4653 | 457 | 1321 | 810 | 1232 | $10 \cdot 4$ | $17 \cdot 4$ | 1880 | 2559 | 4439 |
| JUNE | 179 | $-2.8$ | $140 \cdot 1$ | $71 \cdot 7$ | 0.5 | 0.53 |  |  | 248 | 65 | 1362 | 4797 | 510 | 1254 | 841 | 1286 | $10 \cdot 4$ | 17.5 | 1930 | 2560 | 4490 |
| JULY | 179 | ＋1．7 | $140 \cdot 0$ | 71.8 | 0.5 | 0.53 |  |  | 258 | 63 | 1371 | 4863 | 506 | 1331 | 838 | 1309 | $10 \cdot 4$ | $17 \cdot 2$ |  |  |  |
| AUG． | 176 | ＋1．7 | $140 \cdot 1$ | 71.8 | 0.5 | 0.53 | 44．6 | $9 \cdot 1$ | 243 | 86 | 1383 | 4940 | 450 | 1452 | 855 | 1295 | 10.7 | $17 \cdot 3$ | 1940 | 2489 | 4429 |
| SEPT | 171 | －0．6 | $140 \cdot 5$ | $71 \cdot 6$ | 0.5 | 0.53 |  |  | 247 | 76 | 1366 | 5040 | 392 | 1610 | 879 | 1296 | 10.5 | $17 \cdot 4$ | 1950 | 2508 | 4458 |
| OCT． NOV． | 164 176 | +3.0 +5.0 | $140 \cdot 7$ 144.6 | 71.4 69.4 | 0．5 | 0.53 |  |  | 260 | 74 | 1362 | 5132 | 457 | 1567 | 896 | 1308 | 10.3 | $17 \cdot 5$ | 1980 | 2535 | 4515 |
| DEC. | 176 | +5.0 +2.5 | 144.6 144.0 | $69 \cdot 4$ $69 \cdot 7$ | 0.5 0.5 | 0.53 0.53 | 27－2 | $3 \cdot 3$ | 271 | 70 | 1366 | 5234 | 481 | 1566 | 912 | 1315 | $10 \cdot 4$ | $17 \cdot 4$ | 2050 | 2464 | 4514 |
| $1947$ | 184 | ＋2．5 | 144.0 | $69 \cdot 7$ | $0 \cdot 5$ | 0.53 |  |  | 266 | 71 | 1398 | 5407 | 588 | 1499 | 934 | 1330 | 8.8 | $17 \cdot 3$ | 2100 | 2468 | 4568 |
| JAN． | 191 | $-0.5$ | $144 \cdot 3$ | $69 \cdot 5$ | 0.5 | 0.53 |  |  | 299 | 82 | 1386 | 5352 | 601 | 1503 | 947 | 1329 | $8 \cdot 4$ | 17．7 | 2150 | 2467 |  |
| FEB． | 179 | －1．0 | 143.7 | $69 \cdot 8$ | 0.5 | 0.53 | 36－2 | $8 \cdot 3$ | 274 | 84 | 1375 | 5250 | 640 | 1380 | 960 | 1339 | $8 \cdot 4$ | $18 \cdot 3$ | 2155 | 2441 | 4596 |
| MAR． | 181 | $-2.9$ | $141 \cdot 6$ | $70 \cdot 9$ | 0.5 | 0.53 | － | 8 | 289 | 104 | 1385 | 5285 | 727 | 1265 | 975 | 1355 | $8 \cdot 4$ | 18.4 | 2185 | 2628 | 4813 |
| APR． | 181 | $-3.8$ | $141 \cdot 7$ | $70 \cdot 9$ | 0.5 | 0.53 |  |  | 306 | 109 | 1397 | 5312 | 688 | 1294 | 1009 | 1360 | $8 \cdot 5$ | $19 \cdot 0$ | 2185 | 2709 | 4894 |
| MAY | 193 | +8.3 +4.9 | 142.4 | 70.5 | 0．5 | 0.53 | ＜ 26.8 | $6 \cdot 2$ | 291 | 105 | 1390 | 5300 | 638 | 1297 | 1043 | 1368 | 8.3 | $19 \cdot 7$ | 2190 | 2627 | 4817 |
| JUNE | 191 | ＋4．9 | 141.5 | 71.0 | 0.5 | 0.53 |  |  | 296 | 101 | 1395 | 5382 | 649 | 1278 | 1068 | 1378 | $8 \cdot 2$ | 19.8 | 2180 | 2592 | 4772 |
| JULY | 188 | $-1.4$ | $140 \cdot 0$ | 71.7 | $0 \cdot 5$ | 0.53 | $32 \cdot 9$ | $12 \cdot 8$ | 304 | 103 | 1406 | 5370 | 679 | 1233 |  |  |  |  |  |  |  |
| AUG． | 166 | $-11.9$ | 132.5 | $75 \cdot 6$ | 0.5 | 0.53 | $3 \cdot 1$ | 0．2 | 295 | 110 | 1412 | 5359 | 705 | 1199 | 1076 1093 | 1386 1390 | 8.4 8.5 | 20.0 20.4 | 2180 2180 | 2541 | 4721 4608 |
| SEPT． | 160 | -4.9 -0.9 | 133.0 | $75 \cdot 4$ $73 \cdot 9$ | 0.5 | 0.53 | 1.2 | 3.9 | 291 | 103 | 1383 | 5344 | 736 | 1138 | 1094 | 1391 | 8.3 | 20.5 | 2190 | 2500 | 4690 |
| NOV． | 159 168 | -0.9 +4.6 | $135 \cdot 7$ $137 \cdot 5$ | $73 \cdot 9$ 73.1 | 0．5 | 0．53 | 3.7 7.9 | 0．2 | 296 | 106 | 1369 | 5417 | 800 | 1105 | 1120 | 1397 | 8．2 2 | $20 \cdot 6$ | 2220 | 2562 | 4782 |
|  | 177 | +4.6 +5.0 | 137.5 136.9 | $73 \cdot 1$ $73 \cdot 3$ | 0.5 0.5 | 0.53 0.53 | 7.9 5.7 | 0．9 | 298 | 108 | 1360 | 5494 | 778 | 1151 | 1140 | 1397 | $8 \cdot 4$ | 20.7 | 2250 | 2527 | 4777 |
| $1948$ | 177 | ＋5．0 | 136.9 | $73 \cdot 3$ | 0.5 | 0.53 | $5 \cdot 7$ | 1.0 | 304 | 106 | 1363 | 5651 | 768 | 1241 | 1148 | 1381 | $8 \cdot 4$ | $20 \cdot 8$ | 2250 | 2569 | 4819 |
| TAN．．． | 180 | $+2 \cdot 9$ | $137 \cdot 9$ | 72.7 | 0.5 | 0.53 | 22.7 | $15 \cdot 8$ | 296 | 118 | 1285 | 5498 | 776 | 1172 |  |  |  |  |  |  |  |
| FEB． | 170 | $-6 \cdot 5$ | $137 \cdot 2$ | 73.0 | 0.5 | 0.53 | －3．3 | 1.1 | 286 | 110 | 1247 | 5374 | 694 | 1114 | 1165 | 1378 | 8.2 | 21.2 22.6 | 2210 | 2474 2307 | 4684 4467 |
| MAR．．．． | $165 \cdot 5$ | $-0.9$ | 136.8 | 73.2 | 0.5 | $0 \cdot 53$ | $9 \cdot 8$ | 1.4 | 305 | 105 | 1234 | 5524 | 786 | 1112 | 1238 | 1385 | $8 \cdot 1$ | $22 \cdot 4$ | 2160 | 2692 | 4852 |
| APR．．．． | 172 | $+3 \cdot 7$ | $133 \cdot 2$ | $75 \cdot 2$ | 0.5 | 0.53 | 1.9 | 0.7 | 302 | 109 | 1242 | 5588 | 757 | 1196 | 1266 | 1382 | 8.2 | $22 \cdot 3$ | 2160 | 2750 | 4910 |

STOCKS \＆SHARES
NEW CAPITAL ISSUES
BANK OF ENGLAND－
PRINCIPAL BANKS

TREASURY BILLS－

Index Nos，of Prices and Yield as percentage of 1924 level；on 15th of month
Sensitive Index．－Geometric Mean of monthly percentage changes．
Issues during month in Gt．Britain（a），for U．K．（b），for Abroad，excluding Government loans，etc．－As published
Doposit
Bank Notes and Currency Notes in circulation 11th－17th of month．Issues amalgamated，November 22 nd 1928 ， current Deposit and other accounts，＂etc．Before September，1939，averages for the month of 9 clearing banks ti．e．－exclud
From June，1940，to May，1946，end of month ：otherwise 11th－ 17 th of month
issued by tender．Total of Bills issued by tender during 13 weeks preceding date of Exchequer Return
Day－to－Day Rate Total of Treasury Bills in existence less those issued by tender


PRICE OF GOLD-
PRICE OF SILVER-
BOARD OF TRADE INDEX -
STATIST (SAUERBECK)
COST OF LIVING INDICES-

Annual averages of London dally rates. From Sept. 1939, Bank of England official rate,
Average (cash) price of bar sllver; to Dec, 1944, Standard ( 200 commodities as percentage of 1924 average: Geometric Mean of Wholesale Prices (average for month) of JOURNAL
Wholesale prices of 19 foodstuff and 26 raw materlals on asst day of month.-STATIST,
Wholesale prices of 19 foodstuffs and 26 raw materials on ast day of monting unchanged the standard of Ministry of Labour's index showing movement since 1924 in cost of maintaining uncianged against previous living prevalent in working-class households before Aug. . 1914 . For Series ended June, 1947. See note $t$ above. As above, for food only and for rent and rates. For description see Sp. Memo. No. 28 and Bulletin for Jan., 1944, Pp. 6-8.

| Monthly <br> Averages or <br> Months． | TOTAL IMPORTS． <br> （Declared Values） |  |  |  | $£ \mathrm{Mn} \text {. }$ | £ Mn． | EXPORTS OF U．K．GOODS． <br> （Declared Values） |  |  |  | OUTPUT． |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 啹 <br> 类 ค ． －ैं化宜 $£ \mathrm{Mn}$ ． | Materials． H $£ \mathrm{Mn} .$ |  $£ \mathrm{Mn} .$ |  |  |  | ＂ <br>  $£ \mathrm{Mn} .$ | Materials． ～ <br> £ Mn． |  | $£ \mathrm{Mn} .$ |  | $\qquad$ |  | Mn． Units |  |
| 1913 Av． | $24 \cdot 2$ | 23.5 | $16 \cdot 1$ | 64－1 | $9 \cdot 4$ | 54.7 | 2.7 | $5 \cdot 8$ | $34 \cdot 3$ | $43 \cdot 8$ | 5510 | 197 | 147 |  |  |
| 1919 Av． | $\left\{\begin{array}{l}58.9 \\ 59.9\end{array}\right.$ | 53.9 50.6 | $\left.\begin{array}{l}22 \cdot 2 \\ 24 \cdot 7\end{array}\right\}$ | $\ddagger 135 \cdot 6$ | 13.7 | 121.9 | $\left\{\begin{array}{l}2.8 \\ 2.8\end{array}\right.$ | $10 \cdot 1$ $9 \cdot 3$ | 52．7 53.5 | $\ddagger 66.6$ | 4401 | 142 | 151 |  |  |
| 1920 Av． | 63．8 | $59 \cdot 2$ | 37.8 | 161.2 | $19 \cdot 0$ | 142.2 | $4 \cdot 2$ | $12 \cdot 1$ | 93.4 | 111.2 | 4386 | 154 | 173 |  |  |
| 1921 Av． | $47 \cdot 3$ | $22 \cdot 6$ | $20 \cdot 4$ | 90.5 | $8 \cdot 9$ | $81 \cdot 6$ | $3 \cdot 1$ | $5 \cdot 3$ | $49 \cdot 1$ | $58 \cdot 6$ | 3127 | 50 | 71 |  |  |
| 1922 Av． | $39 \cdot 3$ | 24.9 | $19 \cdot 1$ | 83.6 | $8 \cdot 6$ | $75 \cdot 0$ | $3 \cdot 0$ | $8 \cdot 5$ | 47－4 | 60.0 | 4787 | 94 | 113 |  |  |
| 1923 Av． | $42 \cdot 4$ | $27 \cdot 1$ | 21.4 | 91.4 | $9 \cdot 9$ | 81.5 | $3 \cdot 7$ | $10 \cdot 9$ | $48 \cdot 3$ | $64 \cdot 0$ | 5293 | 143 | 163 |  |  |
| 1924 Av． | $47 \cdot 6$ | $33 \cdot 4$ | $24 \cdot 9$ | 106.4 | 11.7 | $94 \cdot 7$ | $4 \cdot 7$ | $8 \cdot 9$ | 51.7 | 66.8 | 5110 | 140 | 157 | 508 |  |
| 1925 Av． | $47 \cdot 5$ | 35.5 | $26 \cdot 6$ | $110 \cdot 1$ | 12.8 | $97 \cdot 3$ | $4 \cdot 5$ | $7 \cdot 0$ | 51.5 | 64.5 | 4660 | 120 | 142 | 555 |  |
| 1926 Av． | $44 \cdot 2$ | 32.8 | $26 \cdot 2$ | 103.4 | 10.5 | $92 \cdot 9$ | $4 \cdot 1$ | 3.9 | $45 \cdot 0$ | 54.4 | 2420 | 47 | 69 | 587 | $2 \cdot 2$ |
| 1927 Av ． | $44 \cdot 9$ | $29 \cdot 4$ | 26.8 | 101.5 | $10 \cdot 3$ | 91.2 | $4 \cdot 3$ | 6.4 | $47 \cdot 1$ | $59 \cdot 1$ | 4813 | 140 | 174 | 686 | $3 \cdot 3$ |
| 1928 Av． | $44 \cdot 25$ | 28.0 | 26.4 | 99.7 | 10.0 | $89 \cdot 7$ | $4 \cdot 4$ | $5 \cdot 85$ | $48 \cdot 3$ | $60 \cdot 3$ | 4540 | 126 | 163 | 756 | $4 \cdot 4$ |
| 1929 Av ． | $44 \cdot 6$ | 28.4 | 27.8 | 101.8 | $9 \cdot 1$ | $92 \cdot 7$ | $4 \cdot 6$ | 6.6 | 47.9 | $60 \cdot 8$ | 4944 | 145 | 185 | 858 | $4 \cdot 7$ |
| 1930 Av ． | $39 \cdot 6$ | $20 \cdot 9$ | $25 \cdot 6$ | 87.0 | $7 \cdot 2$ | $79 \cdot 8$ | $3 \cdot 9$ | $5 \cdot 3$ | 36.8 | $47 \cdot 6$ | 4677 | 119 | 141 | 909 | $4 \cdot 0$ |
| 1931 Av ． | 34.7 | $14 \cdot 5$ | 21.8 | 71.8 | $5 \cdot 3$ | 66.5 | $2 \cdot 9$ | $3 \cdot 9$ | $24 \cdot 4$ | $32 \cdot 6$ | 4207 | 72 | 100 | 951 | $4 \cdot 6$ |
| 1932 Av． | 31.1 | 13.8 | $13 \cdot 1$ | 58.5 | $4 \cdot 3$ | $54 \cdot 2$ | $2 \cdot 6$ | $3 \cdot 6$ | 23.0 | 30.4 | 3990 | 68 | 101 | 1020 | 6.0 |
| 1933 Av ． | 28.3 | $15 \cdot 1$ | 12.5 | $56 \cdot 3$ | $4 \cdot 1$ | $52 \cdot 2$ | $2 \cdot 3$ | $3 \cdot 8$ | 23.5 | 30.7 | 3970 | 79 | 135 | 1130 | $7 \cdot 1$ |
| 1934 Av ． | 28.9 | 17.5 | 14.2 | 61.0 | $4 \cdot 3$ | 56.7 | 2.5 | $4 \cdot 0$ | $25 \cdot 4$ | 33.0 | 4230 | 114 | 170 | 1289 | 7.7 |
| 1935 Av ． | $29 \cdot 6$ | 17.7 | $15 \cdot 4$ | 63.0 | $4 \cdot 6$ | 58.4 | $2 \cdot 6$ | $4 \cdot 4$ | $27 \cdot 4$ | 35.5 | 4262 | 123 | 189 | 1464. | $9 \cdot 9$ |
| 1936 Av ． | 31.8 | 20.7 | $17 \cdot 7$ | $70 \cdot 7$ | $5 \cdot 1$ | $65 \cdot 6$ | $3 \cdot 0$ | $4 \cdot 3$ | 28.4 | 36.7 | 4369 | 148 | 225 | 1685 | 11.6 |
| 1937 Av ． | 35．9 | 26.3 | $22 \cdot 9$ | 85.7 | 6．3 | 79.4 | $3 \cdot 2$ | $5 \cdot 4$ | $33 \cdot 7$ | $43 \cdot 5$ | 4610 | 163 | 249 | 1909 | $12 \cdot 4$ |
| 1938 Av ． | $35 \cdot 8$ | $20 \cdot 7$ | 19.5 | $76 \cdot 6$ | $5 \cdot 1$ | 71.5 | 3.0 | $4 \cdot 7$ | $30 \cdot 4$ | 39.2 | 4353 | 130 | 199 | 2031 | 11.2 |
| 1939 Av． | 33.2 | $20 \cdot 1$ | 19.9 | $73 \cdot 8$ | 3.8 | 70.0 | $3 \cdot 0$ | $4 \cdot 5$ | 28.2 | $36 \cdot 6$ | 4437 | 153 | 253 | 2201 | $14 \cdot 2$ |
| 1940 Av． | 35.0 | 28.2 | 26.5 | $90 \cdot 2$ | $2 \cdot 2$ | 88.0 | $2 \cdot 8$ | 2.0 | $26 \cdot 3$ | 32.7 | 4290 | 157 | 248 | 2398 | 14.1 |
| 1941 Av． | $35 \cdot 2$ | 18.9 | 27.4 | 82.2 | 0.7 | 81.5 | 2.6 | 1.3 | $22 \cdot 9$ | 27.0 | 3957 | 142 | 238 | 2697 | 11.4 |
| 1942 Av ． | 36．3 | 18.7 | $26 \cdot 0$ | 83.0 | 0.4 | 82.6 | 1.5 | 0.8 | $19 \cdot 7$ | 22.6 | 3930 | 146 | 244 | 2971 | $10 \cdot 1$ |
| 1943 Av ． | $42 \cdot 8$ $43 \cdot 3$ | 21.9 $23 \cdot 3$ | $36 \cdot 8$ 39.8 | 102.8 108.9 | 0．5 | 102．3 | 1.6 | $0 \cdot 8$ | $16 \cdot 7$ | 19.4 | 3815 | 138 | 251 | 3079 | $10 \cdot 2$ |
| 1944 Av ． 1945 Av ． | $43 \cdot 3$ 40.8 | $23 \cdot 3$ $24 \cdot 5$ | $39 \cdot 8$ $25 \cdot 1$ | 108.9 92.0 | $1 \cdot 3$ $4 \cdot 2$ | 107.6 87.8 | 1.9 | 0.7 | $19 \cdot 0$ | $22 \cdot 1$ | 3688 | －130 | 234 | 3196 | $10 \cdot 9$ |
| 1946 Av． | 53.1 | 32.5 | $20 \cdot 4$ | 92.0 108.4 | $4 \cdot 2$ $4 \cdot 2$ | 87.8 104.2 | $4 \cdot 6$ $5 \cdot 3$ | $1 \cdot 3$ | $25 \cdot 6$ | $33 \cdot 3$ | 3506 | 137 | 227 | 3107 | 11.5 |
| $\begin{gathered} 1947 \mathrm{Av} . \\ 1946 \end{gathered}$ | $67 \cdot 1$ | $46 \cdot 7$ | $33 \cdot 3$ | $149 \cdot 0$ | $4 \cdot 9$ | $146 \cdot 1$ | $5 \cdot 4$ | 2．9 | $65 \cdot 5$ 83.2 | $76 \cdot 2$ $94 \cdot 8$ | 3646 3782 | 149 147 | 244 240 | 3437 3548 | 14.9 16.9 |
| JAN． | 48.4 | $27 \cdot 5$ | $17 \cdot 1$ | 96.2 | $4 \cdot 2$ | $92 \cdot 0$ | $5 \cdot 4$ | $2 \cdot 4$ | 46－2 | $57 \cdot 2$ |  |  |  |  |  |
| FEB． | 37.5 | $24 \cdot 0$ | $15 \cdot 9$ | $79 \cdot 4$ | 3.7 | 75．7 | $4 \cdot 6$ | $2 \cdot 6$ | $46 \cdot 2$ $50 \cdot 2$ | $57 \cdot 2$ $60 \cdot 1$ | 3410 3607 | 144 | 229 247 | 4142 3462 | $14 \cdot 3$ $13 \cdot 4$ |
| MAR． | $54 \cdot 9$ | 28.0 | $18 \cdot 1$ | 103.8 | $4 \cdot 6$ | $99 \cdot 2$ | $5 \cdot 9$ | $3 \cdot 1$ | 56.3 | 67.8 | 3772 | 147 | 256 | 3820 | $14 \cdot 8$ |
| APRIL | $49 \cdot 9$ $57 \cdot 3$ | $28 \cdot 6$ 37.4 | 17.3 | 98.3 | 3.8 | 94．5 | $6 \cdot 0$ | $3 \cdot 2$ | 59.4 | $70 \cdot 9$ | 3440 | 149 | 252 | 3057 | 13.9 |
| MAY | $57 \cdot 3$ | $37 \cdot 4$ | $19 \cdot 2$ | 116.4 | $3 \cdot 6$ | 112.8 | $6 \cdot 9$ | $3 \cdot 0$ | $74 \cdot 3$ | $86 \cdot 1$ | 3920 | 151 | 262 | 3237 | 16.0 |
| JUNE | 53．3 | $27 \cdot 7$ | $19 \cdot 6$ | 102.9 | $3 \cdot 7$ | $99 \cdot 2$ | $4 \cdot 2$ | $2 \cdot 1$ | $57 \cdot 0$ | $65 \cdot 4$ | 3587 | 151 | 240 | 2762 | $12 \cdot 9$ |
| JULY | 46.6 | $31 \cdot 2$ | 21.6 | 101.4 | $4 \cdot 4$ | 97．0 | $7 \cdot 1$ | $2 \cdot 9$ |  |  |  |  |  |  |  |
| AUG． | 64.0 | $32 \cdot 8$ | 22.0 | $121 \cdot 1$ | $4 \cdot 9$ | 116．1 | $5 \cdot 0$ | $2 \cdot 9$ $2 \cdot 6$ | $78 \cdot 6$ 67.7 | $90 \cdot 8$ 77.4 | 3491 3065 | 147 | 226 226 | 2765 2847 | $15 \cdot 6$ 12.9 |
| SEPT． | 51.3 | $30 \cdot 3$ | $22 \cdot 2$ | 106．2 | 3.8 | $102 \cdot 4$ | 4.3 | 2.0 | $62 \cdot 8$ | $71 \cdot 3$ | 3759 | 147 | 239 | 3105 | 15.5 |
| NOV． | 62．4 | $38 \cdot 8$ | $24 \cdot 1$ | 127.5 | $4 \cdot 0$ | 123.5 | $5 \cdot 4$ | 3.1 | $80 \cdot 8$ | $91 \cdot 4$ | 3891 | 156 | 254 | 3733 | $17 \cdot 4$ |
|  | 57.3 57.0 | $40 \cdot 5$ $32 \cdot 5$ | $24 \cdot 3$ 25.4 | 124.4 117.0 | $4 \cdot 8$ | 119.6 | $4 \cdot 7$ | $3 \cdot 4$ | $80 \cdot 6$ | $91 \cdot 8$ | 3896 | 154 | 264 | 3938 | 16.5 |
| $1947$ | ธ7．0 | $32 \cdot 5$ | 25.4 | 117．0 | $5 \cdot 2$ | 111.8 | $3 \cdot 9$ | $2 \cdot 5$ | $74 \cdot 2$ | $83 \cdot 6$ | 3629 | 153 | 236 | 4372 | $15 \cdot 3$ |
| JAN．． | $61 \cdot 6$ | $35 \cdot 1$ | $22 \cdot 3$ | 121.5 | $5 \cdot 1$ | 116.4 | $4 \cdot 7$ | $3 \cdot 6$ | $80 \cdot 1$ | $91 \cdot 2$ | 3707 | 150 | 240 | 4671 | $17 \cdot 6$ |
| FEB．． | $59 \cdot 2$ | $29 \cdot 5$ | $22 \cdot 2$ | 112.8 | $6 \cdot 6$ | 106．2 | $3 \cdot 7$ | $3 \cdot 1$ | $66 \cdot 8$ | $76 \cdot 0$ | 3777 | 126 | 206 | 3681 | 12.8 |
| MAR． | $65 \cdot 1$ $71 \cdot 3$ | 38.0 | 25.0 | $129 \cdot 9$ | $6 \cdot 4$ | 123.5 | $4 \cdot 5$ | $3 \cdot 3$ | 71.5 | $82 \cdot 6$ | 3844 | 123 | 196 | 3984 | 15.9 |
| MPRY ． | $71 \cdot 3$ | $46 \cdot 7$ | $27 \cdot 7$ | $147 \cdot 1$ | $6 \cdot 7$ | $140 \cdot 4$ | $4 \cdot 5$ | $2 \cdot 9$ | $72 \cdot 1$ | $82 \cdot 7$ | 3672 | 139 | 236 | 3387 | $15 \cdot 2$ |
| JUNE ． | $70 \cdot 5$ $70 \cdot 3$ | $43 \cdot 9$ $46 \cdot 1$ | 32．4 | $153 \cdot 2$ | $7 \cdot 1$ | $146 \cdot 1$ | $4 \cdot 4$ | $3 \cdot 3$ | $79 \cdot 3$ | 89.7 | 3794 | 142 | 244 | 3092 | 16.6 |
| JUNE | $70 \cdot 3$ | $46 \cdot 1$ | $34 \cdot 8$ | 153.8 | $4 \cdot 1$ | $149 \cdot 7$ | $5 \cdot 9$ | $2 \cdot 9$ | 81.4 | 93－1 | 3851 | 144 | 254 | 2842 | 16.8 |
| JULY ．．． | $82 \cdot 0$ | $56 \cdot 4$ | $39 \cdot 2$ | $179 \cdot 2$ | $4 \cdot 3$ | 174．9 | $6 \cdot 2$ | $3 \cdot 0$ | 97－1 | $110 \cdot 3$ | 3332 | 143 | 212 | 2866 | 18.2 |
| AUG．．．． SEPT | $77 \cdot 0$ | $56 \cdot 6$ | $38 \cdot 3$ | 174.0 | $3 \cdot 6$ | $170 \cdot 4$ | $6 \cdot 1$ | $2 \cdot 9$ | $82 \cdot 1$ | 93.6 | 3344 | 147 | 234 | 2767 | 12.9 |
| $\begin{aligned} & \text { SEPT. ... } \\ & \text { OCT. } \end{aligned}$ | 71.5 68.5 | $48 \cdot 2$ | $39 \cdot 0$ | $160 \cdot 7$ | $3 \cdot 4$ | 157．3 | $5 \cdot 4$ | $2 \cdot 0$ | 89.0 | $99 \cdot 0$ | 3779 | 150 | 266 | 3150 | $18 \cdot 7$ |
| NOV．． | 68.5 51.7 | $48 \cdot 9$ $46 \cdot 2$ | 41．8 | 161.4 138.2 | $4 \cdot 0$ | $157 \cdot 4$ | $5 \cdot 9$ | $2 \cdot 2$ | 96.8 | 108．2 | 4021 | 161 | 275 | 3725 | $20 \cdot 1$ |
|  | $62 \cdot 3$ | 50.5 | 38.5 39.0 | $138 \cdot 2$ 153.4 | $4 \cdot 0$ | 134.2 | 6.6 | $2 \cdot 4$ | 89.8 | $102 \cdot 3$ | 4254 | 166 | 273 | 3983 | 18.3 |
| 1948 | 62 | 50.5 | $39^{\circ} 0$ | $153 \cdot 4$ | $4 \cdot 0$ | $149 \cdot 4$ | 6.8 | $2 \cdot 7$ | $94 \cdot 7$ | $110 \cdot 2$ | 3790 | 165 | 243 | 4432 | $19 \cdot 2$ |
| JAN．．．． | 68.7 57.8 | 51.7 51.8 | 39.2 | 161.8 | $5 \cdot 4$ | $156 \cdot 4$ | 8.2 | $3 \cdot 5$ | 104．2 | 119.5 | 4110 |  | 281 | 4541 | $19 \cdot 6$ |
| FEB． MAR. | 57.8 80.9 | 51.8 53.2 | 35.9 | 148.1 | $3 \cdot 9$ | $144 \cdot 2$ | $7 \cdot 1$ | 4－2 | 97．7 | 112.9 | 4101 | 176 | 289 | 4227 | 18.8 |
| APRIL ．． | $80 \cdot 8$ | $53 \cdot 2$ | $41 \cdot 9$ | $178 \cdot 2$ | $6 \cdot 1$ | $172 \cdot 1$ | $7 \cdot 6$ | $3 \cdot 9$ | 105.8 | 121.0 | $\begin{aligned} & 3908 \\ & 4246 \end{aligned}$ | $\begin{aligned} & 179 \\ & 181 \end{aligned}$ | $\begin{aligned} & 291 \\ & 294 \end{aligned}$ | 3959 | 19.7 |
| $\ddagger$ Change in classification in 1919．Italies as in 1913 ． |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |

[^24]
*Unemployment-averages for flrst month of each quarter for those years $\dagger$ Unemployment flgures relate to Feb. 22nd (peak) and March 5th.
§Estimated no, stood off but not registered. $\ddagger$ Including those stood off in February and March but not registered

RETAIL SALE8. Index of value of sales in Departmental Stores, Co-operatives, multiple and independent shops, Each index is based on average daily sales during the whole of 1942 for the category to which it relates, index numbers are month of the Journal, April 1st, 1944, and April 19th, 1947.-BANK OF ENGLAND.
PO8T OFFICE
,
UNEMPLOYMENT.-MINISTRY OF LABOUR GAZETTE.

# CANADA 

## Information communicated by Professor D. C. MacGregor of the University of Toronto

Toronto, April 22nd, 1948.

THE year 1947 witnessed an acceleration of the inflationary tendencies which have gradually become the dominant factor of this period. The acceleration was manifest in both wholesale prices and the cost of living ; in the return to full- or even hyper-employment of factors, especially in durable goods industries ; continued stimulation of exports through federal loans to overseas governments ; a consequent rise of money income and expenditure, now reflecting mainly increases of price rather than volume ; the associated and more than proportionate rise of imports from the United States and the consequent exhaustion of Canada's reserve of U.S. dollars; and finally a mounting budgetary surplus. These tendencies have been selfcorrecting to the extent that budgetary surplus and the exceptional government receipts from sale of U.S. dollars have been used to reduce the money supply through debt reduction, but the resulting contraction of bank credit has been offset by greater banking investments in other securities and by an unprecedented rise in commercial loans.

The original design of the Government's economic policy for the post-war period was based on the pessimistic assumption (often expressed as a forecast) that not long after the end of the war there would develop a good deal of unemployment in connection with demobilisation of the armed forces, and that this, along with an enormously increased output of peacetime goods which was confidently anticipated, might precipitate a collapse of prices.

To avert this gloomy prospect various steps were taken in 1944 and 1945 to provide credit for agriculture, industry and buyers overseas, guarantees to exporters, a universal scheme of famiy allowances, and various grants to war veterans. The central bank reduced the discount rate, and with the aid of the chartered banks drove bond prices to the point where long-term yields had fallen to $2.55 \%$ Income taxes on both corporations and persons were reduced so as to leave more funds in private hands for the expansion of expenditure by firms and households. At the same time a host of wartime restrictions were being removed, the process of decontrol necessarily extending over several years and not yet being complete. In all these
arrangements the aim was to restore the operation of the price system, whose advantages under peace-time conditions began to be appreciated more fully than hitherto, especially in 1946 when the limitations of price control became conspicuous to everyone.

As things have turned out, the forecasts of depression made in Ottawa and elsewhere, with large staffs of the newest economists and the newest theories and a great deal of computation, proved quite wrong. An upturn following the period of demobilisation and industrial reconversion began late in the summer of 1946 (coinciding with removal of price controls in the United States and with the seasonal maximum in employment), and since that time we have been witnessing a hemispheric industrial boom superimposed on a delayed and still partly suppressed wartime inflation, the normal overseas flow of export trade being supported and augmented by capital exports of a non-commercial type. As a result of this boom many aspects of government policy which were laboriously prepared to combat deflation and unemployment have had to be discarded in favour of new and less familiar policies, not well prepared, which work in the opposite direction. The reversal in policy has been somewhat tardy and clumsy. It has had the good fortune to be supplemented, however, by the virtually automatic increase of federal receipts from taxation and from the sale of dollar reserves in the United States as the inflation swelled imports from that country.

As to the increase of civilian output, however, the forecasts have erred on the side of optimism rather than pessimism. At first the swift reappearance of civilian goods in place of war goods naturally tended to check the upward pressure on prices, encouraging the government to abandon rationing and price controls. Thereafter the rise of production at large has been slower ; enough to bring about a general advance of prices of the sort which ordinarily accompanies a boom, but not enough to offset the enlarged and more and more actively employed money supply. In particular, the large proportion of current output which is not directly vendible, as it is in the form of capital goods, intensifies for the time being the excess of the flow of spendable income over the flow of consumers' goods, in much the same manner as during the war.

In the last six months the federal authorities have taken three main steps to bring the situation under control: measures for correcting the unbalance of foreign trade, introduced in November ; direct measures for checking the growth of money supply by debt reduction; and raising the long-term rate of interest by the central bank's withdrawal of support from the bond market (i.e., lowering its bids) in January and again at the end of February.

The long-delayed restrictions on imports, occasioned by the virtual exhaustion of Canada's reserves of U.S. dollars, cannot be described in detail here, and it is too soon to appraise their effectiveness. ${ }^{\star}$ There are four main types of restrictions : prohibition, quotas, taxation, and special restrictions on certain capital goods. (1) Prohibited imports include many foodstuffs, paper goods, paints, office and household machinery, non-professional cameras, radios, and a wide variety of other fully manufactured durable goods. (2) Imports subject to quota are divided into two groups: quotas on goods from the " scheduled " or U.S. dollar countries, calling for marked reductions in imports, and quotas from other or " non-scheduled" countries, which are usually large enough to permit a great increase over the existing trade. (3) Taxation is employed in the form of a special excise of $25 \%$ on both domestic and imported consumers' durable goods. The rate on automobiles is progressive (by bracket), which is unusual in commodity taxation. (4) Capital goods not elsewhere provided for are restricted at ministerial discretion, the application of general rules being considered impracticable; introduction of this procedure was delayed for several months. Imports of motor cars were likewise temporarily prohibited, but a quota system commenced on March 1st.

The restrictions were announced at the same time as the Geneva Agreements, and, in keeping with the spirit of multilateralism, they contain very little discrimination as between countries, the prohibitions and excises applying without exceptions. This is a serious weakness from the short-term standpoint, especially in the case of the excises, which do nothing to encourage substitution of domestic for imported manufactures, or of sterling area for dollar area manufactures, and have been severely criticised. The prohibitions have been removed already in certain cases, particularly on the importation of fresh

[^25]cabbages and carrots during the winter months, while many goods have been transferred from the prohibited list to a quota. In the case just mentioned the carryover of cabbages and carrots had fallen so low by midwinter that prices rose to three or four times those of the usual seasonal imports from Texas. This is an extreme example of how protecting the external value of the currency may diminish its internal value.

Another aspect of curtailment is the rationing of travel expenditures for pleasure to $\$ 150$ per annum in the dollar area, leading to diversion of winter tourists to Bermuda and the British West Indies.

On the side of exports, there has been a good deal of talk about the desirability of expanding sales of Canadian manufactures (other than paper) to the United States, particularly specialities from U.S. branch plants to their parent firms in that country. During the war, sales of manufactures to the U.S.A. reached large sums after the Hyde Park Agreement, but were confined to small ships, munitions and other war goods.

As to stimulating gold production for export, several efforts have been made to work out an economical plan for bonusing additional production only, which would be mutually acceptable to Canadian gold producers and to the American and international monetary authorities. On April 7 the House of Commons sent to the Senate a bill for bonusing additional production of high cost mines and new mines. The Act will not be effective until proclaimed.

A loan of $\$ 300 \mathrm{Mn}$. was secured from the United States Export-Import Bank in the autumn, of which $\$ 80 \mathrm{Mn}$. has been withdrawn. Previously the Dominion is said to have inquired about a loan on Wall Street, but the negotiations fell through, apparently owing to failure to agree on a rate comparable with the Bank's.

All this has given rise to considerable discussion. The tardiness of the government in conserving exchange, followed by the prohibition of imports, including even nutritious foodstuffs in short domestic supply, has naturally raised doubts as to the judgment and technical competence of the responsible authorities. In extenuation it may be said that it was desirable to harmonise new control procedures with the Geneva Agreements, and that some improvement in the dollar position was to be hoped for with the introduction of the European Recovery Programme. (It is now estimated that this country will receive more than $\$ 600 \mathrm{Mn}$. U.S. dollars through orders given here for E.R.P. in its first year, but fulfilment of the orders will increase our imports from the U.S.A. Canada's
direct financial contribution to E.R.P., if any, has not yet been established.)

Criticism has also been directed to the nondiscriminating character of the restrictions, particularly the prohibitions and the $25 \%$ excise, at a time when the aim of policy should be to divert trade by discrimination rather than to suppress it by prohibition, quota and taxation.

Another source of contention has been the policy of maintaining parity with the U.S. dollar. The government has hitherto favoured a return to the free price system, but on the question of the foreign exchange rate argues that a selective policy is needed for the sake of internal trade, notwithstanding its preference for non-selective measures elsewhere. Also, the government holds that a lower value of the Canadian dollar will do little to correct the unbalance» through checking imports from the United States, that it would restrict importation from overseas pari passu, and cannot much stimulate export industries as most of these are already operating at capacity.

The case for depreciation of the dollar is argued with great energy by those concerned about gold mining, the one depressed export industry. Depreciation is also favoured by others who have little or no economic interest in it, on the ground that the adoption of parity in July, 1946, has proved a move in the wrong direction from the standpoint of balancing our international trade. This argument usually recognises that a moderate depreciation (say 10 to $20 \%$ ) would not be enough in itself to correct the unbalance, but stresses that a movement of the rate in the direction of what appears to be the long-term equilibrium would reduce the extent and severity of special Government controls and enable their removal at an earlier date. This point carries additional weight when the possible effect of capital movements is considered. The inward movement of American capital, as indicated by monthly figures of trade in outstanding securities, almost ceased when the dollar was placed at par, and it is held by competent private authorities that it is essential to return to an exchange rate which can be held without too much effort if the inward capital movement is to continue. It is believed, in short, that there is a large potential demand for the Canadian dollar at a rate low enough to inspire confidence in its stability.

From another angle the Government has been criticised on constitutional grounds for intro-

[^26]ducing new taxation (the $25 \%$ excise) without the consent of, or any special delegation of powers by, Parliament. There have been several similar cases since the summer of 1944 which did not draw criticism, perhaps because they brought about lower rather than higher taxation.

Investment.-Despite a pause in the early part of the year attributed to the swift rise of prices, construction work of all kinds expanded very greatly in 1947, roughly $50 \%$ in terms of dollars and $25 \%$ in terms of physical volume. The market value of production of "plant, equipment and housing " (i.e., gross home investment, including imported machinery, etc., but excluding inventory) has been estimated as follows :-

(1).-National Accounts, Income and Expenditure, 1938-1946. (Ottawa, D.B.S.) 1947. Figures for 1946 and 1947 are taken from the preliminary edition of the same bulletin for 1947.
(2).-Wholesale Index, Annual average, \% of 1926.

* Provisional.

Increased investment in inventory is estimated at $\$ 475 \mathrm{Mn}$. and $\$ 780 \mathrm{Mn}$. in 1946 and 1947 respectively.

The available supply of trained labour and domestically produced building materials and equipment is now considerably larger than at any time since the war, and though wages and prices are relatively very high the anticipated increase in new work this year, based on a survey of business intentions, is some $16 \%$ in value and $5 \%$ in physical volume. $\dagger$

The principal limitations on investment are now financial rather than physical, though it can be argued that ultimately they arise from physical scarcities. The swift rise in gross home investment has been made possible to a large extent by dis-investment in the United States through sale of our reserves of U.S. dollars. Now that these reserves are virtually exhausted, it will be hard to avoid a great curtailment of investment, though some branches of it can continue if they have a low content of imported goods, as in housing, or if there is foreign borrowing or direct investment by a parent concern in the United States.

As to the domestic supply of capital funds,

[^27]| Monthly Averages or Months | FINANCE |  |  |  |  | PRICES． |  |  |  | TRADE AND PRODUCTION， |  |  |  |  |  |  | EMPLOYMENT． |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |  | Wholesale |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  | 等 | d |  |  |  |  |  |  |  | 8 |  |  |  |  |
|  |  |  |  |  |  | m | 毛 | 志 |  |  |  |  |  |  | E |  |  |  |  |
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|  |  |  |  |  |  | 啠 | $\begin{aligned} & \text { ह융 } \\ & \text { ज्र우 } \end{aligned}$ | 答 |  |  |  |  |  |  | H్ర |  |  |  |  |
|  |  |  |  |  |  | \％ | \％ | \％ |  |  |  |  |  |  | 000 |  | \％ | \％ | \％ |
|  | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 13 | 14 | 15 | 16 | 17 | 18 | 19 |
| 1926 Av | － |  | 253 | 125 | 195 | 100 | 100 | 100 | － | 84 | 107 | 63 |  | 100 | 272 | － | 100 | 100 | 100 |
| 1934 Av． |  | － | 274 | 111.5 | 195 | 59 | 73.5 | 71.5 | － | 43 | 55 | 26 |  | 36 | 193 | 88.8 | 109 | 91 | 96 |
| 1935 Av． | 84 | － | 263 | 104 | 208 | 63 | 73 | 72 | 96.2 | 46 | 62 | 26 | 86 | 51.5 | 197 | $91 \cdot 9$ | 97 | 98 | 100 |
| 1936 Av． | 109 | 98.1 | 299 | 91.5 | 221 | 70 | 74 | 74 | $98 \cdot 1$ | 53 | 80 | 39 | 95 | 46 | 208 | 96.5 | 87 | 104 | 104 |
| 1937 Av． | 116 | 103.8 | 293 | 96 | 235 | 87 | 80 | 85 | $101 \cdot 2$ | 67 | 84 | 32 | 108 | 58 | 220 | 104．5 | 101 | 115 | 115 |
| 1938 Av． | 95 | $99 \cdot 0$ | 258 | 98 | 242 | 74 | 78 | 78 | $102 \cdot 2$ | 56 | 71 | 26 | 102 | 52 | 202 | 101 | 107 | 111 | 111 |
| 1939 Av． | 92 | 101.8 | 264 | 104 | 258 | 64 | 75 | 75 | 101.5 | 63 | 78 | 29 | 109 | 519 | 212 | 105 | 111 | 113 | 114 |
| 1940 Av． | 77 | $105 \cdot 2$ | 287 | 113 | 275 | 67 | 82 | 83 | $105 \cdot 6$ | 90 | 100 | 32 | 130 | 161 | 235 | 107 | 92 | 133 | 126 |
| 1941 Av． | 68 | $100 \cdot 6$ | 327 | 122 | 303 | 71 | 89 | 90 | 111.8 | 121 | 137 | 49 | 157 | 178 | 270 | 134 | 130 | 172 | 155 |
| 1942 Av ． | 64 | $99 \cdot 3$ | 379 | 118 | 333 | 82 | 92 | 96 | $117 \cdot 0$ | 137 | 198 | $42 \cdot 9$ | 185 | 121 | 282 | 153 | 131 | 209 | 175 |
| 1943 Av． | 84 | $97 \cdot 5$ | 449 | 115 | 400 | 96 | 93 | 100 | 118.4 | 144 | 250 | 64.7 | 199 | 89 | 289 | 161 | 128 | 227 | 184 |
| 1944 Av． | 84 | $97 \cdot 1$ | 505 | 113 | 471 | 103 | 94 | $102 \cdot 5$ | $118 \cdot 9$ | 146 | 290 | $92 \cdot 8$ | 199 | 114 | 304 | 173 | 104 | 223 | 182 |
| 1945 Av． | 100 | $95 \cdot 3$ | 569 | 126 | 542 | 105．5 | 94 | 103 | 119.6 | 132 | 272 | $101 \cdot 5$ | 176 | 167.7 | 302 | $18 \% \cdot 1$ | 110 | 201 | 174 |
| 1946 Av． | 116 | $85 \cdot 3$ | 577 | 140 | 597 | 112 | 99 | 108 | 123.6 | 161 | 195 | $78 \cdot 1$ | 159 | － | 307 | 214．3 | 138 | 187 | 174 |
| JAN．．． | 89 | 96.7 | 507 | 125 | 505 | 104 | 94 | 103 | 118.6 | 130 | 234 | 56.9 | 193 | 96 | 279 | 175.0 | 90 | 215 | 179 |
| FEB． | 93 | $96 \cdot 6$ | 433 | 120 | 502 | 105 | 94 | 103 | 118.6 | 112 | 240 | $56 \cdot 4$ | 191 | 108 | 264 | $185 \cdot 6$ | 89 | 214 | 178 |
| MAR． | 93 | 96.3 | 533 | 117 | 494 | 105 | 94 | 103 | 118.7 | 132 | 307 | $82 \cdot 9$ | 194 | 166 | 300 | $201 \cdot 7$ | 87 | 213 | 177 |
| APRIL | 94 | $96 \cdot 0$ | 485 | 113 | 521 | 105 | 94 | 103 | 118.7 | 134 | 318 | 95．4 | 190 | 205 | 292 | $179 \cdot 7$ | 99 | 211 | 175.5 |
| MAY | 97 | 96.0 | 689 | 142 | 562 | 105 | 94 | 103 | 119.0 | 144 | 319 327 | 110.8 129.0 | 186 182 | 169 204 | 311 322 | $176 \cdot 0$ 184.0 | 103 113 | 209 | 175 175 |
| JUNE | 103 | $95 \cdot 6$ | 608 | 126 | 554 | 106 | 94 | 103 | 119.6 | 146 | 327 | 129.0 | 182 | 204 | 322 | 184.0 | 113 | 207 | 175 |
| JULY | 101 | $94 \cdot 6$ | 542 | 121 | 527 | 108 | 94 | 104 | 120.3 | 139 | 286 | 114.3 119.0 | 174 171 | 117 150 | 306 314 | 189.2 189.8 | 119 124 | 204 199 | 175 173 |
| AUG．．． | 100 | $94 \cdot 4$ | 473 | 113 | 523 | 109 | 94 | 103 | 120.5 | 128 | 300 225 | 119.0 96.2 | 171 | 150 169 | 314 300 | 189.8 186.0 | 124 | 199 188 | 173 169 |
| SEPT． | 102 | $94 \cdot 6$ | 516 | 111 | 527 | 107 | 94 | 103 | 119.9 | 122 | 225 | 96.2 106.2 | 161 | 169 | 300 341 | 186.0 189.8 | 125 | 188 | 169 171 |
| OCT． | 104 | $94 \cdot 4$ | 575 | 114 | 577 | 109 | 94 | 103 | 119.9 119.9 | 134 | 233 | $106 \cdot 2$ $124 \cdot 2$ | 159 | 142 201 | 341 322 | $189 \cdot 8$ $200 \cdot 8$ | 131 132 | 186 184 | 173 |
| NOV．．．．．．． | 107 | $93 \cdot 9$ | 858 | 161 | 601 | 109 | 94 94 | 103 | $119 \cdot 9$ $120 \cdot 1$ | 121 | 236 | 126.0 | 157 | 235 | 272 | 187－4 | 108 | 180 | 168 |
| DEC．．．．．． | 113 | $92 \cdot 2$ | 608 | 152 | 594 | 109 | 94 | 103 |  |  |  |  |  |  |  |  |  |  |  |
| JAN．．．．．．． | 124 | $90 \cdot 0$ | 599 | 142 | 581 | 110 | 95 | 104 | 119.9 | 140 | 191 | $83 \cdot 3$ | 160 | \％ | 287 | $196 \cdot 1$ | 190 | 182 | 167 |
| FEB． | 122 | $85 \cdot 9$ | 534 | 139 | 583 | 110 | 95 | 105 | $119 \cdot 9$ | 117 | 155 | $66 \cdot 2$ | 159 | E | 263 | 212．7 | 101 | 183 | 167 |
| MAR． | 119 | $83 \cdot 8$ | 568 | 133 | 578 | 110 | 96 | 106 | $120 \cdot 1$ | 140 | 180 | 78.5 | 162 |  | 302 | $229 \cdot 2$ | 106 | 185 | 169 |
| APRIL | 125 | $84 \cdot 3$ | 576 | 131 | 590 | 111 | 99 | 108 | $120 \cdot 8$ | 161 | 180 | $70 \cdot 6$ | 166 | \％ | 282 | $221 \cdot 6$ | 115 | 186 | 169 |
| MAY | 124 | $85 \cdot 1$ | 612 | 131 | 588 | 112 | 99 | 109 | 122.0 | 164 | 199 | $82 \cdot 8$ | 162 | \％ | 296 | $208 \cdot 5$ | 131 | 185 | 170 |
| JUNE | 123 | $84 \cdot 9$ | 561 | 130 | 576 | 113 | 99 | 109 | $123 \cdot 6$ | 158 | 169 | $62 \cdot 4$ | 156 | － | 291 | $210 \cdot 5$ | 142 | 187 | 17 |
| JULY | 119 | $85 \cdot 1$ | 555 | 133 | 589 | 114 | 99 | 109 | 125－1 | 162 | 191 | 71.5 | 153 |  | 304 | $212 \cdot 0$ | 148 | 184 | 173 |
| AUG．． | 117 | $85 \cdot 0$ | 487 | 135 | 589 | 111 | 100 | 109 | $125 \cdot 6$ | 163 | 246 | 84.5 | 150 |  | 325 | $220 \cdot 8$ | 152 | 187 | 176 |
| SEPT． | 104 | $84 \cdot 9$ | 589 | 138 | 604 | 110 | 100 | 109 | $125 \cdot 5$ | 156 | 172 | 63.8 | 152 |  | 324 | $213 \cdot 8$ | 152 | 188 | 178 |
| OCT． | 102 | 85.0 | 631 | 144 | 620 | 113 | 101 | 111 | 126.8 | 186 | 207 | $90 \cdot 5$ | 158 |  | 371 349 | $210 \cdot 5$ | 152 | 193 194 | 183 |
| NOV． | 103 | 85.0 | 621 | 159 | 636 | 113 | 101 | 111 | $127 \cdot 1$ | 198 | 235 214 | $95 \cdot 2$ $87 \cdot 5$ | 166 |  | 349 295 | 212．4 | 125 | 191 | 181 |
| DEC．．． | 106 | 85.0 | 593 | 164 | 625 | 113 | 102 | 112 | 127．1 | 182 | 214 | $87 \cdot 5$ | 168 |  | 295 | $212 \cdot 4$ | 125 | 191 | 181 |
| 1947 | 106 | $84 \cdot 9$ | 621 | 162 | 623 | 114 | 104 | 114 | 127.0 | 174 | 210 | $85 \cdot 4$ | 174 |  | 302 | $220 \cdot 1$ | 122 | 194 | 181 |
| FEB． | 109 | $84 \cdot 7$ | 560 | 166 | 617 | 115 | 107 | 118 | 127.8 | 177 | 179 | $66 \cdot 0$ | 176 |  | 270 | $233 \cdot 4$ | 124 | 194 | 180 |
| MAR． | 106 | $84 \cdot 6$ | 574 | 168 | 619 | 116 | 108 | 120 | 128.9 | 209 | 212 | $70 \cdot 4$ | 177 |  | 306 | 238.5 | 129 | 195 | 181 |
| APR． | 105 | $84 \cdot 8$ | 604 | 173 | 636 | 117 | 112 | 123 | $130 \cdot 6$ | 226 | 193 | 61.8 106.9 | 178 |  | 3115 | 2284.0 | 150 | 198 | 185 |
| MAY | 104 | $84 \cdot 6$ | 684 | 175 | 607 | 118 | 113 | 125 128 | $133 \cdot 1$ $134 \cdot 9$ | 240 | 271 276 | 106.9 117.7 | 176 |  | 332 | $235 \cdot 3$ | 165 | 201 | 189 |
| JUNE ： | 105 | $84 \cdot 3$ | 597 | 182 | 615 | 119 | 116 | 128 | $134 \cdot 9$ | 231 | 276 | 117.7 | 176 |  | 30 | 235 | － |  |  |
| JULY | 107 | $83 \cdot 8$ | 612 | 186 | 617 | 120 | 116 | 129 | $135 \cdot 9$ | 227 | 239＊ | 83．1＊ | 171 |  | 343 | $236 \cdot 1$ | 176 | 202 | $\underline{193}$ |
| AUG．． | 105 | 83.9 | 524 | 189 | 618 | 120 | 117 | 「131 | 136.6 | 205 | 224 | $75 \cdot 5$ | 168 |  | 331 352 | $237 \cdot 0$ | 180 | 203 | 193 195 |
| SEPT． | 104 | $84 \cdot 0$ | 593 | 194 | 619 | 120 | 123 | ${ }^{\top} 134$ | $139 \cdot 4$ | 208 | 222 | $70 \cdot 3$ 81.5 | 175 179 |  | 352 388 | $240 \cdot 5$ | 181 | 205 | 198 |
| OCT． | 105 | $84 \cdot 2$ | 721 | 202 | \％628 | 123 | 127 | 139 5142 | $142 \cdot 2$ $143 \cdot 6$ | 254 229 | 256 | 86.3 | 178 |  | 356 | $258 \cdot 3$ | 170 | 205 | 200 |
| DEV． | 107 106 | $84 \cdot 4$ $84 \cdot 8$ |  | 216 210 | 628 641 | 127 131 | 131 | 142 143 | 146.0 | 194 | 269 |  | 179 |  | 321 | $242 \cdot 5$ | 142 | 199 | 194 |
| 1948 |  |  |  |  |  |  |  |  |  |  | 238 |  | 177 |  | 317 | $248 \cdot 6$ | 137 | 200 | 189 |
| JAN． | 107 102 | $92 \cdot 1$ $92 \cdot 1$ | － 649 | 203 200 | 628 623 | 134 132 | 136 137 | 147 | 150．1 | 182 | 211 |  | 181 |  | 286 | 251.7 |  | 202＊ | 180＊ |
| MAR． |  | 98.0 |  |  |  |  |  |  |  |  | 231 |  |  |  | 324 |  |  |  |  |

INew base，\％of 1935－9．

Col．1．－＂Investor＇s Index．＂Index of current market valuation of share holders＇equity in 100 companies．（ $\%$ of $1935-39$ ．）
＂2．－Based on the calculated yield of a bond having a constant 15－year maturity period．（\％of $1935-39$ ．）
，3．－From 33 banking centres，comprising about $85 \%$ of total debits． Excludes debits to accounts of central bank since its founding in April，1935．Largely influenced by financial transactions
＂4．－Refers to operations in Canada only．Includes loans to provincial and municipal governments．
，5．－Includes governmental deposits．Excludes all deposits with pro－ vincial，postal and Quebec savings banks，and with trust companies．
，＂6－8．－Col． 6 comprises 70 items；col．7， 296 items；col．8， 508 items．
9．－Comprises separate groups for food，fuel，lighting，rent，clothing，
home furnishing，sundries（including services）．（\％of 1935－39）．
＂11．－Excludes all exports of both monetary and non－monetary gold since
1937；includes gold in small quantities only，shipped as dust，
home furnishing，sundries（including services）． 11. Excludes all exports of both monetary and non－monetary gold since
1937；includes gold in small quantities only，shipped as dust， quartz，etc．，in earlier annual averages．
Col．12．－Comprises agricultural（vegetable）products and animal products Comprises．，in earfer annual averages．
groups，includes partly and fully manufactured producte，in some cases made from imported raw materials，e．g．，rubber．
－Adjusted for seasonal variation．New index includes more industries and products than formerly（ 170 series），but excludes bullding； base $1935-9$ ；weighted by the net values for that period．
14．－Based on value of contracts awarded，deflated annually for changes in union rates of wages，and monthly for changes in prices of building materials．
15．－Revenue freight only ；excludes cars received from U．S．connections，
16．－Revisedjback to January，1938．Index of value，comprising urban department，variety and indopendent stores；also country general stores．Adjusted for number of business days and seasomal variation． Base $1935=100$ ．From January，1929，to December，1937，does not include country general stores．
17．－Not seasonally adjusted． 15 employees only．Includes part－time workers on same basis as full－time．Excludes farm labourers，civil servants，education，hospitals，finance and other service industries．
indications of capital shortage have appeared. Idle bank balances and other liquid assets have been drawn down, there has been greater recourse to the capital market by firms and provinces and municipalities, while commercial borrowing from the banks has increased at a pace so rapid that some restraint or offset must be introduced as a check against further increase of money supply. Meanwhile, according to new estimates of the Dominion Bureau of Statistics*, the flow of private saving has shrunk.

The internal balancing force which made possible the capital expansion of 1947, without expansion of money supply, appears to have been repayment of national debt out of the proceeds of taxation and sale of U.S. dollars. Some $\$ 500 \mathrm{Mn}$. of debt was repaid to the commercial banks in the year ending February 29, and they promptly found new investments in commercial loans and other bonds, their cash reserves remaining virtually unchanged. The reserve ratio has been allowed to drop slightly from over $11 \%$ to the pre-war level of some $10 \frac{1}{2} \%$.

It is probable that the very large programme now getting under way for this year will have to be most severely curtailed, or, failing this, that many projects will have to be abandoned temporarily before completion, or be carried forward at a very slow pace. Either outcome will involve heavy losses.

There is indirect evidence that the liquid resources of consumers are being depleted, notwithstanding the highest levels of income on

[^28]record. Cash or down payments on purchases of real property have become much smaller and a good deal of the financing is by second and even third mortgages. At the same time consumers are making more retail purchases on credit* while the number of post-dated cheques and cheques returned by the banks owing to insufficient funds has increased. $\dagger$ Collections have become more difficult.

The annual report of the Foreign Exchange Control Board has just appeared, but comes too late for description here. As to the federal budget, it is expected early in May. At the moment everyone is concerned as to how the European Recovery Programme will affect Canada. There is an uneasy feeling that this country has attempted too much already and that much more must be done.

Sugar, the last commodity to be rationed by coupon, was derationed on November 3, at which time the price ceiling was raised one cent a pound. Informal rationing of butter has been necessary for the past two months, owing to inadequate cold storage reserves to tide over the season of lowest milk production. Removal of price ceilings (e.g., meats) and subsidies (e.g., flour, oats, barley) continued in the autumn, but since the imposition of new import restrictions price ceilings have been restored on other products. A new period of control has begun before the old has ceased.

[^29]

# LONDON \& CAMBRIDryat ECONOMIO SRRVTA蔦 

## BULLETIN II. YOL. XK AUCUST Misth. 1448.

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## TABLE OF CONTENTS



## THE ECONOMIC POSITION

Fuly 31st, 1948.
During the second quarter of 1948 industrial production as a whole has been maintained at about the level of the previous quarter and $10 \%$ above the average level for 1947. The chief cause for anxiety at present lies in the production of coal, which after rising satisfactorily in the early months of the year, has recently suffered a check; the output of steel, on the other hand, continues substantially to exceed expectations.

There are continued signs that the budget surplus is reducing demand for certain less essential consumers' goods and services, but it does not appear that any appreciable amount of labour is as yet being displaced from the less essential trades, and there is little evidence that there is any appreciable acceleration of the movement of labour into under-manned industries, such as coal and textiles, where numbers employed are rising much more slowly than had been hoped. Total unemployment, already extremely low, continues to fall.

It is, however, possible that disinflation is assisting exports both by encouraging some manufacturers to seek markets abroad rather than at home, and by reducing shortages of particular components. In any case, exports have continued to rise in a very encouraging way and in the second quarter reached about $134 \%$ of their 1938 volume, as compared with $126 \%$ in the first quarter and $109 \%$ for the whole of 1947. This expansion of exports was more than offset by the rise in imports, due to increases in both prices and quantity. As a result of this, the apparent adverse balance of trade (taking imports c.i.f.) rose from $£ 119 \mathrm{Mn}$. in the first quarter to $£ 132 \mathrm{Mn}$. in the second. To some extent the rise in the volume of imports may be due to bilateral treaties, which link increased imports to increased exports ; but though, with American aid and while the proceeds of the Argentine railways last, we can probably afford this level of imports for the present, it is unlikely that we shall be able to maintain it beyond the middle of next year unless the rise in exports continues strongly.

# THE BALANCE OF PAYMENTS IN THE FIRST HALF OF 

By D．J．Morgan and F．W．Paish

In the Economic Survey for 1948 （Cmd．7344）， published in March last，the hope was expressed that it would prove possible to reduce the drain on our reserves of gold and dollars by reducing（ $a$ ） our adverse balance of trade ；（b）the proportion of our imports obtained from the dollar area； （c）government expenditure abroad；and （d）exports of capital．It is now becoming possible to see how far the Survey＇s expectations for the first half of 1948 have been fulfilled．

TABLE 1.
VALUE AND VOLUME OF EXPORTS AND IMPORTS．

|  |  |  | VALU |  |  | $\begin{aligned} & \text { VOL } \\ & \text { INI } \\ & \text { NUM } \end{aligned}$ | $\begin{aligned} & \text { UME } \\ & \text { OEX } \\ & \text { BERS } \end{aligned}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 范。 | $\stackrel{3}{4}$ | $\frac{x}{2}$ | $\frac{9}{ة}$ | \％\％ | （Base Wei | $\begin{aligned} & \text { Year } \\ & \text { ghts) } \end{aligned}$ |
|  |  | $\begin{aligned} & \text { an } \\ & \text { 甲 } \\ & \text { ءi } \end{aligned}$ | $\begin{aligned} & \text { 会 } \\ & \text { ! } \\ & \stackrel{0}{0} \end{aligned}$ |  | $\begin{aligned} & 0 \\ & 0 \\ & 0 \\ & 0 \\ & \text { on } \end{aligned}$ |  |  |
|  | £Mn． | £Mn． | £Mn． | £Mn． | £Mn． | \％of | 1938 |
| 1938 | 471 | 62 | 533 | 920 | 387 | 100 | 100 |
| $1946$ | 915 | 50 | 965 | 1，301 | 336 | 99 | 68 |
| $1947$ |  | 59 | 1，196 | 1，789 | 593 | 108 | 77 |
|  | 250 | 18 | 268 | 364 | $96$ | 101 | 67 |
| 2ndQr． | 265 | 18 | 283 | $457$ | $174$ | 102 | 78 |
| Jan．－June | 515 | 36 | 551 | 821 | 270 | 101 | 72 |
|  | 302 | 11 | 313 | 517 | 204 | 114 | 88 |
| 4th Qr． | 320 | 12 | 332 | 451 | 119 | 118 | 77 |
| July－Dec． | 622 | 23 | 645 | 968 | 323 | 116 | 83 |
| $\begin{aligned} & 1948 \text { 1st Qr. } \\ & \text { 2nd Qr. } \end{aligned}$ | 354 390 | $15$ | $369$ | $488$ | 119 | 126 | 80 |
| Total |  |  | $406$ | 538 | 132 | 134 | 81 |
| Jan．－June Economi | $\begin{gathered} 744 \\ \text { c Surve } \end{gathered}$ | $31$ Forec | $775$ | 1，026 | 251 | 130 | 81 |
| 1948 |  |  |  |  |  |  |  |
| Jan．．June， |  |  | 705 | 880＊ | 175 | 125 | 78 |

＊Obtained by adding $11 \%$ to f．o．b．figure．
To begin with，the reduction in our adverse trade balance is a good deal less than had been hoped．This has not been due to any failure of British exports ；on the contrary，their volume for the half year has increased from $116 \%$ of 1938 to $130 \%$ ，as compared with the Survey＇s forecast of $125 \%$ ．That our adverse balance of trade was $£ 76 \mathrm{Mn}$ ．more than the Survey had expected was due entirely to the fact that the value of imports for the half－year，instead of falling by $£ 88 \mathrm{Mn}$ ．，as had been hoped，rose by $£ 58 \mathrm{Mn}$ ．Of the excess of $£ 146 \mathrm{Mn}$ ．over the
estimate，about two－thirds seem to have been due to higher prices and one－third to the fact that the volume of retained imports was nearly $81 \%$ of 1938 ，as compared with the $78 \%$ expected by the Survey．It is probable that this higher volume of imports has been due，at least in part，to the obligation to take more imports in exchange for more exports under bilateral trade agreements．

While the Survey＇s estimates of the fall in the total adverse balance of trade were over－optimistic， its hopes of a reduction of the adverse balance with the Western Hemisphere have been fully fulfilled．

TABLE 2.
DIRECTION OF IMPORTS AND EXPORTS． （PERCENTAGES OF TOTAL．）

|  | 1938 year | $\begin{gathered} 1947 \\ \text { 4th } \\ \text { Qr. } \end{gathered}$ | $\begin{gathered} 1948 \\ 1 \mathrm{st} \\ \text { Qr. } \end{gathered}$ | $\begin{aligned} & 1948 \\ & \text { Apr.- } \\ & \text { May } \end{aligned}$ | Survey Forecast （Jan．June） 1948 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| IMPORTS（c．i．f．） |  |  |  |  |  |
| Canada and N ewfound－ <br> land <br> $\begin{array}{llll}8.8 & 13.0 & 11.7 & 10.6\end{array}$ |  |  |  |  |  |
|  |  |  |  |  |  |
| Argentina ．．．．．．． | $4 \cdot 2$ | $7 \cdot 2$ | $6 \cdot 9$ | $4 \cdot 1$ |  |
| Rest of W．Hemisphere＊ | ＊6．8 | 8.4 | $6 \cdot 9$ | $8 \cdot 2$ |  |
|  | $32 \cdot 6$ | $43 \cdot 4$ | $36 \cdot 0$ | 30.7 | 34 |
| South Africa ．．． <br> Other Sterling Areas | $1 \cdot 6$ | $1 \cdot 7$ | 1.7 | 1.5 |  |
|  | $29 \cdot 6$ | $31 \cdot 0$ | $35 \cdot 2$ | $35 \cdot 8$ |  |
|  | $31 \cdot 2$ | $32 \cdot 7$ | 36.9 | $37 \cdot 3$ | 40 |
| Europe \＆DependenciesOther $\ldots \ldots$ | $31 \cdot 9$ | $20 \cdot 3$ | 21.5 | $22 \cdot 6$ |  |
|  | 4－2 | $3 \cdot 6$ | $5 \cdot 8$ | $9 \cdot 3$ |  |
| Other ．．．．．．．．． | $36 \cdot 1$ | 23.9 | $27 \cdot 3$ | $31 \cdot 9$ | 26 |
| Total ．．． | 100 | 100 | 100 | 100 | 100 |
| EXPORTS and RE－EXU．S． | PORTS（f．o．b．） |  |  |  |  |
|  | 5.4 | $4 \cdot 5$ | 4.9 | $3 \cdot 9$ |  |
| Canada and Newfound－ |  |  |  |  |  |
| Argentina $\quad \cdots \quad \cdots$ | $3 \cdot 7$ | $2 \cdot 8$ | $2 \cdot 9$ | $2 \cdot 4$ |  |
| Rest of W．Hemisphere＊ | $3 \cdot 9$ | $4 \cdot 5$ | $5 \cdot 0$ | $5 \cdot 7$ |  |
|  | $17 \cdot 6$ | 16.0 | $17 \cdot 0$ | 16.4 | 15 |
| South Africa ．．．．．． Other Sterling Areas ．．． | $7 \cdot 5$ | $7 \cdot 4$ | $7 \cdot 3$ | 6.8 |  |
|  | $34 \cdot 1$ | $41 \cdot 4$ | $41 \cdot 8$ | $39 \cdot 8$ |  |
|  | $41 \cdot 6$ | $48 \cdot 8$ | $49 \cdot 1$ | $46 \cdot 6$ | 50 |
| Europe \＆DependenciesOther $\ldots$ ．．． | 36－2 | $29 \cdot 0$ | $27 \cdot 5$ | $29 \cdot 3$ |  |
|  | $4 \cdot 6$ | $6 \cdot 2$ | $6 \cdot 4$ | $7 \cdot 6$ |  |
| Other | $40 \cdot 8$ | $35 \cdot 2$ | $33 \cdot 9$ | 36.9 | 35 |
| Total ．．．．．．．．． | 100 | 100 | 100 | 100 | 100 |

[^30]It had been hoped that the proportion of imports coming from the Western Hemisphere
would be reduced from $43 \%$ in the last quarter of 1947 to $34 \%$ in the first half of 1948, while the proportion of total exports going to the Western Hemisphere was expected to fall from $16 \%$ to $15 \%$. In fact, during the first five months of 1948, the proportion of imports from the Western Hemisphere fell almost exactly as estimated, while exports to the Western Hemisphere rose from $16 \%$ to nearly $17 \%$ of the total. This expansion was achieved in spite of a fall in exports to the United States in April and May, due to the cessation of abnormal shipments of partly worked gold in the first quarter and to a reduction in shipments of brass scrap for refining, which in the fourth quarter of 1947 had amounted to one-tenth of recorded exports.

The fall in the proportion of imports from the Western Hemisphere was achieved by increasing the proportions both from the sterling area, which rose from $33 \%$ in the last quarter of 1948 to $37 \%$ in the first five months of 1948 and from European and other countries, which rose from $24 \%$ to $29 \%$. The rise in the proportion from the sterling area was about 3 points less, and that from the rest of the world about 3 points more, than the Survey had expected.

One effect of the Government's success in obtaining more imports from "soft currency areas" in place of those from " hard currency areas" is that (taking imports on an f.o.b. basis and ignoring imports of newly mined gold), while our adverse balance of trade with the Western Hemisphere has been much reduced, our favourable balance of trade with the rest of the world has nearly disappeared. As a result of this development and of the coming into force of E.R.P., the distinction between hard and soft currency areas will henceforth be of less importance, and we shall need to pay rather less attention to the precise sources of our imports and destinations of our exports, and rather more to our total adverse balance of trade. It also seems possible that part of the rise in import prices during the second quarter of 1948 was due to
the purchase of higher-priced goods from softcurrency areas in order to economise in the use of hard currencies. If we can now again afford to purchase in the cheapest markets, the change may help to prevent a further worsening of the terms of trade.

About the other items which enter into the balance of payments for the half-year there is as yet little information, and we can compare the results with the Survey's forecast only by making the following assumptions: (a) that the distribution of trade in June was the same as in April/May ; (b) that the net deficit of other invisible payments on income account has been as forecast in the Survey; and (c) that trade and payments figures can be taken as identical for the half year.

Assumptions (b) and (c) are probably both optimistic, and the actual adverse balance on income account is likely to prove larger than shown. In spite of this, the increase in the total drain on our reserves of gold and dollars over the Survey's estimate (Table 4) was smaller than the increase in the adverse balance on current account, as shown in Table 3. Our net reduction in reserves amounted to $£ 254 \mathrm{Mn}$. for the half year, as compared with the Survey's estimate of $£ 222 \mathrm{Mn}$., and it therefore seems that our net loss on capital account was only $£ 57 \mathrm{Mn}$. (or less if the adverse balance of $£ 197 \mathrm{Mn}$. on income account is an underestimate), as compared with the Survey's forecast of $£ 86 \mathrm{Mn}$.

How far the unexpectedly low rate of net drain on capital account can be regarded as permanent must depend on its causes, which are as yet not known. On the whole, however, it seems likely that it has been due less to a reduced rate of withdrawals from large sterling balances than to an increased willingness on the part of other countries to hold working balances in London, probably as a result of the greater confidence in sterling induced by the coming into force of E.R.P. If this explanation is correct, we must regard the reduced adverse

TABLE 3.
BALANCE OF PAYMENTS ON CURRENT ACCOUNT FOR THE FIRST HALF OF 1948.
( $£ \mathrm{Mn}$. at Current prices).

balance on capital account as temporary and expect some increase in future months in the drain on our reserves from this cause.

The total drain on our reserves of $£ 254 \mathrm{Mn}$. was covered as follows :-

TABLE 4.
CHANGES IN GOLD AND DOLLAR RESERVES. (£ Mn.)

|  | Survey's Forecast 512 | Revised Estimat 512 |
| :---: | :---: | :---: |
| Gold Reserves $31 / 12$ |  |  |
| S. African Gold Loan ... | 80 | 80 |
| Drawings on U.S. Credit | 74 | 74 |
| Drawings on Canadian Credit | 11 | 13 |
| Bought from I.M.F. by U.K. | - | 15 |
| " ", " India | 165 | 11193 |
| Withdrawals Jan.-June |  |  |
|  |  |  |
| Adverse Balance on Income a/c | 136 | 197 |
| ", ", Capital a/c | 86 | 57 |
|  | 455 | 451 |
| Received from E.R.P. |  | 22 |
|  |  |  |
|  | 455 | 473 |

It can be seen that, as a result of the drawing of an extra $£ 2 \mathrm{Mn}$. on the Canadian Credit, and of $£ 26 \mathrm{Mn}$. from the International Monetary Fund by the U.K. and India, the gold reserve on June 30th, even before taking credit for the first $£ 22 \mathrm{Mn}$. received under the European Recovery Programme, was very little smaller than the Survey's forecast.

The broad picture which emerges from the foregoing outline indicates that there has been some notable progress in the first half of the year. The volume of exports has shown a very satisfactory increase, the dollar deficit has been more closely confined, and, as is shown in the following article, the sterling balances have been brought under some measure of control. The second half of 1948 therefore opens in some ways more auspiciously than did the first.

An important cause of the increase over the estimate of the adverse balance of trade and payments during the past half-year was the rise in the volume of imports and it seems reasonable to expect that this rise will go little, if any, further. On the other hand, there seem to be good prospects that the recent rise in the volume of exports will be continued, so that, unless its effects are offset by a further substantial worsening of our terms of trade (the effects of a general rise in prices become less important as the value of exports approaches that of imports), the remainder of the year should bring a pronounced narrowing of the adverse balance.

On the whole, prospects that the terms of trade may stop getting worse, and may even
begin to improve are better than they have been for some time. The continued rise in industrial wages in the United States seems to suggest that world prices of manufactured goods will continue to rise, while the good harvests expected throughout the world may at least check the rapid rise in prices of foodstuffs and other farm products. Even though the effect of our long-term import contracts will be to postpone the full benefit we obtain from this check to the price-rise, as in the past it postponed the full impact of the price-rise itself, an easier world food situation should begin to give us some relief before the end of the present year.

What are the prospects of a rise in the volume of exports sufficient to bring our adverse balance of payments within the limits of the aid we may expect from E.R.P., and ultimately to replace it with a favourable balance large enough to cover our contractual repayments of debt ? For the next twelve months the task should not prove too difficult. We may reasonably expect, in grants and loans, not less than $£ 350 \mathrm{Mn}$. from E.R.P. for the fifteen months ending June, 1949. In addition we still have some $£ 75 \mathrm{Mn}$. left of the advance payment made to Argentina out of the proceeds of the sale of the Argentine Railways. If we allow $£ 150 \mathrm{Mn}$. for the adverse balance on capital account, this leaves us between $£ 250 \mathrm{Mn}$. and $£ 300 \mathrm{Mn}$. to cover our adverse balance on income account. If, further, as we may hope, increasing shipping and other earnings bring our net invisible imports down to, say, $£ 75 \mathrm{Mn}$. for the twelve months, we should have left some $£ 200 \mathrm{Mn}$. to cover our adverse balance of trade (taking imports f.o.b.). At present prices, this would require an expansion in our volume of exports from $130 \%$ of 1938 in the first half of 1948 to about $140 \%$ of 1938 in the twelve months ending June, 1949. Seeing that the volume of exports in the second quarter of this year was already $134 \%$ of 1938, this should be well within our capacity. It is therefore reasonable to hope that by June, 1949, we shall have been able to replace at least part of the $£ 100 \mathrm{Mn}$. of gold which the delayed start of E.R.P. obliged us to draw from our reserves in the second quarter of 1948.

In the following year (1949-50), however, things will be far less easy. The Argentine advance payment will have been exhausted, and our receipts from E.R.P. will certainly be substantially reduced. Let us put them at $£ 200 \mathrm{Mn}$. for the twelve months ending June, 1950, and assume that this is just about enough to cover our adverse balance on capital account
plus our net invisible imports. Then our exports and re-exports would have to equal our imports (f.o.b.). At existing levels of prices, this would involve our having to increase our volume of exports to nearly $160 \%$ of the 1938 level. This will be a very serious task, but, if other conditions are favourable, it should not prove an impossible one. Given a continuance of a sound budgetary policy in this country and of a high level of activity in the United States, and given also the power of other European countries directly or indirectly to use part of the dollars they receive under E.R.P. for purchases in this country, we may have a chance of reaching or nearly reaching the target figure of an export volume of $154 \%$ of 1938 by the end of the present year. This will depend largely on our own ability to produce more for export, especially of those commodities, such as wool and cotton, which are still furthest from their export targets.

In the still longer run, when we again become dependent entirely on our own resources, the problem becomes indeed formidable. If we assume a need to repay foreign debts and otherwise to export capital at the rate of $£ 150 \mathrm{Mn}$. a year, even with our net invisible imports reduced to zero we should require a volume of exports equal to over $170 \%$ of the 1938 level. Whether we shall be able not only to reach, but permanently to maintain, exports at this level will depend as much on the prosperity and stability of the rest of the world
at that time as on the success of our own efforts in making the necessary goods available for export at competitive prices.

TABLE 5
PROGRESS OF THE EXPORT DRIVE

| Group |  | Volume Index Number |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\left\|\begin{array}{c} \text { Value } \\ 1948 \\ 2 \text { ndQr. } \end{array}\right\|$ | $\begin{aligned} & 1947 \\ & \text { Year } \end{aligned}$ | $\begin{gathered} 1947 \\ \text { 4th Qr. } \end{gathered}$ | $\begin{gathered} 1948 \\ \text { 1st Qr. } \end{gathered}$ | $\begin{array}{r} 1948 \\ 2 \mathrm{ndQr} . \end{array}$ | Target End 1948 |
|  | £Mn. | \% of 1938 |  |  |  |  |
| Food, drink, tobacco | 24-64 | 81 | 101 | 104 | 104 | 125 |
| Raw Materials: |  |  |  | 12 | 30 | 39 |
| Other... | $7 \cdot 43$ | 63 | 47 | 67 | 58 | 44 |
| Manufactures : |  |  |  |  |  |  |
| Pottery, glass, etc. | 11.58 | 154 | 169 | 195 | 206 | 223 |
| Iron and Steel, etc. | 25.51 | 107 | 110 | 109 | 114 | 111 |
| Non-ferrous ... | 11.18 | 173 | 181 | 241 | 171 | 207 |
| Cutlery, etc... | 10.82 | 183 | 191 | 200 | 211 | 213 |
| Electrical Goods | $18 \cdot 62$ | 164 | 179 | 198 | 221 | 252 |
| Machinery ... | $62 \cdot 67$ | 158 | 169 | 176 | 196 | 208 |
| Cotton ... | $29 \cdot 62$ | 43 | 46 | 52 | 58 | 79 |
| Wool ... ... | 23.43 | 88 | 102 | 116 | 123 | 202 |
| Silk and Rayon | $9 \cdot 85$ | 148 | 164 | 171 | 199 | 245 |
| Other Textile | $7 \cdot 36$ | 78 | 74 | 70 | 78 | 106 |
| Apparel ... | 7.62 | 137 | 125 | 110 | 122 | 201 |
| Footwear ... | 1.85 | 141 | 140 | 158 | 126 | 295 |
| Chemicals, eto. | 20.99 | 140 | 139 | 149 | 156 | 184 |
| Oils, etc. ... | 2.83 | 71 | 71 | 48 | 79 | 116 |
| Leather ... | 2.03 | 60 | 62 | 71 | 69 | 136 |
| Paper, Card ... | $5 \cdot 04$ | 112 | 113 | 121 | 114 | 154 |
| Vehicles ... | $60 \cdot 32$ | 185 | 228 | 245 | 264 | 255 |
| Rubber ... | 1.64 | 174 | 174 | 171 | 186 | 330 |
| Total Manu. <br> factures ... | $337 \cdot 30$ | 123 | 133 | 143 | 152 | 175 |
| Total | $390 \cdot 11$ | 109 | 118 | 126 | 134 | 154 |

# RECENT PAYMENTS AGREEMENTS 

By G. S. Dorrance. ${ }^{1}$ )

At the present time (July 15th) there are twenty-seven agreements in force between the United Kingdom and other countries in addition to the loan agreements with Canada and the United States and the "gentlemen's agreements" still in operation between this country and the colonial empire and certain parts of the sterling area. These agreements fall into four fairly clearly defined groups :-Scheduled Territories (and Middle East), Western Europe, Eastern Europe and Latin America( ${ }^{2}$ ).

The most urgent task facing the government, both before and after the convertibility crisis, was the problem of the "sterling balances."

[^31]The success with which this difficulty was met in 1947 can be gauged from the estimated decline in these balances (apart from the " writeoff " created by the Australian and New Zealand gifts) of $£ 135 \mathrm{Mn}$. Where they are owned by

[^32]colonies, the use of these balances is under the direct control of the Colonial Office and, apart from some drain through Hong Kong, all available statistics appear to bear out the statement of the Secretary of State that these balances " have remained remarkably steady since the end of 1946 " $\left({ }^{3}\right)$. With Australia and New Zealand, we have reached quite informal agreements regarding the limitations on the use of their balances and, in particular on their restrictions of hard currency expenditure. During 1947, they utilized about $£ 20 \cdot \mathrm{Mn}$. of their balances for net payments, both in hard currency and in sterling. During the current year there appears to be some movement in the reverse direction, although up to the present the change may be partly accounted for by seasonal influences.

With Ceylon ( ${ }^{4}$ ), India ( ${ }^{(5)}$, Pakistàn ( ${ }^{6}$ ), Iraq ( ${ }^{7}$ ), Egypt $\left({ }^{8}\right)$, and South Africa ( ${ }^{9}$, we have negotiated formal agreements and the Treasury has made an order placing Palestine $\left({ }^{10}\right)$ in a comparable position. With all these countries, except South Africa, the arrangements follow a fairly consistent pattern. In the first place, the total sterling balances, except for agreed releases, are immobilized in "No. 2 Accounts" at the Bank of England or with other Banks, or are invested in British securities which the countries concerned agree not to liquidate in order to finance current expenditures. For each country there are certain agreed sums which are to be transferred from the blocked accounts to "No. 1 Accounts" maintained at the Bank of England or with other banks. These releases fall into two main categories. First there are working balances which the countries concerned agree to maintain fairly stable. Secondly there are " free" releases which these countries may use for current expenditure with the sterling area or for the purchase of other currencies from the United Kingdom Exchange Control. However, with the exception of Ceylon (which has net receipts of dollars which it agrees to surrender to the sterling area pool) and Palestine (where the initial releases are quite limited) the net purchases of "hard" currencies are limited to only a part of the total releases. (In the case of India, it is provided that these

[^33]sums shall be purchased from the I.M.F. on Indian account). In addition, provision is made for the settlement of a number of outstanding accounts between the U.K. and these countries, payment to be made to or from " No. 1 Accounts." In the cases of Ceylon, Iraq and Egypt, it is provided that if there are any capital transfers between the rest of the sterling area and these countries they will be credited or debited to these countries' No. 2 Accounts.

The arrangements with South Africa take the form of a loan agreement under which the Union has lent to the U.K. $£ 80 \mathrm{Mn}$. in gold. South Africa has received a sterling balance for this amount, which it can use as it desires, and the U.K. can make any use it wishes of the gold. The concessions involved in the plan are that S. Africa will no longer be expected to surrender any " hard" currency income to the "sterling area pool." The U.K. will also make certain relaxations in its import limitations on non-essential goods from S. Africa. On the other hand $S$. Africa agrees to recompense the U.K. in gold for any net drawings which it may make on the dollar-pool. Thus, all dealings with S. Africa are in fact on a gold basis, and as we have a current account surplus with S. Africa this arrangement is to our advantage.

Since, however, S. Africa remains in the sterling area and there is thus no limitations on capital transfers from the U.K., apart from those imposed by the Union itself, exports to this Dominion may to some extent be financed from the proceeds of British capital exports rather than by the surrender of gold to the U.K.

With Western Europe ${ }^{(22}$ ) the policy adopted by the Government appears to have been to attempt to maintain some of the attributes involved in the position of sterling as an "international currency." Practically all the agreements $\left({ }^{13}\right)$ provide for the opening of accounts by the Bank of England with the Central Bank in the country concerned, and vice versa. All payments between the sterling area and these countries are finally settled through these accounts. Each country agrees to hold an amount not exceeding a specified figure in the currency of the other. The total amount of credit involved in these agreements is approximately $£ 200 \mathrm{Mn}$. In the case of Denmark there is no maximum

[^34]limit to the currency which shall be accumulated by either country. Provision is made for the settlement of balances in excess of the agreed maximum holdings in gold.

With the exception of security purchases by United Kingdom residents from French residents, all the agreements provide that no capital transfers may be made through these clearing accounts.

With Austria $\left({ }^{14}\right)$, and Italy $\left({ }^{15}\right)$, and Turkey $\left({ }^{16}\right)$, there are no provisions for reciprocal credit extensions. In these cases all payments are made in sterling to the debit or credit of the sterling balances of these countries. The only special restriction is that Italy agrees to maintain a minimum balance of $£ 10 \mathrm{Mn}$., which may only be reduced by the amount of Italy's payment of war-created debts due to the U.K.

Eire and Iceland, while members of the Western European Area, are also members of the sterling area. Our arrangements with these countries follow the normal arrangements in force for the sterling area. For them, sterling is a fully convertible currency, on condition that all their hard currency earnings are converted into sterling. The only limit is that Eire's net conversion of sterling into dollars is limited to $£ 14 \mathrm{Mn}$. in the period October 1st, 1947 to June 31st, $1948\left({ }^{17}\right)$ and the agreement extending this arrangement, now being negotiated, will probably contain a similar provision.

In the agreements which were negotiated prior to the institution of convertibility in 1947, provision was made that all sterling balances, arising from current payments made by the U.K., could be freely used for expenditure in any part of the world. The suspension of convertibility meant that we were unable to continue such arrangements. However, with the countries of Western Europe, we have attempted to retain some of the "convertible" attributes of sterling. With all these countries, except Austria and Greece, provision is made that transactions with other countries may be settled through the clearing accounts when agreed between the U.K. and the country from whose account the transfer is made. While it is practically impossible to obtain any information on the volume of transactions completed under these arrangements, it is unlikely that they have involved large transfers. At the same time Britain has steadfastly refused to enter into the multilateral compensation arrangements

[^35]established between Belgium, France, Italy, Netherlands, and Bi-Zonia ( ${ }^{18}$ ), despite the fact that we are listed as an occasional member.

The Bank for International Settlements, in its most recent report ( ${ }^{19}$ ), draws attention to the general disequilibrium in which these countries find themselves. It is very possible that Britain would find full membership in this group a serious burden at the present time, as it would probably result in an increase in our accumulation of European currencies and a drain on our hard currency reserves without any offsetting augmentation of such assets. It is difficult to see what form the future developments may take. Sympathetic American opinion seems inclined to the view that one of the first steps we must take under E.R.P. is to reduce the restrictions on intra-European trade, particularly those arising from monetary causes. It appears likely that some E.R.P. aid may take the form of dollars to be spent solely within Europe $\left({ }^{20}\right)$. In this case, if we could claim dollars in settlement of amounts owed to us, which at present seems to be sometimes impossible $\left({ }^{21}\right)$, we should obtain reserves with which we could meet the enlarged claims which would fall on us if sterling owned by Western Europe were to become as fully convertible as sterling held by residents of the sterling area. There would be much to support such a development and even in this country opinion seems to be moving in its favour $\left({ }^{22}\right)$.

The British system of transferable accounts provides a method of international settlement with which European nations are conversant. However, the experience of the period before August 20th, 1947, makes it clear that we cannot contemplate entering on such a scheme until Europe's balance of payments with the rest of the world is brought into equilibrium, either by the development of " hard currency " income or by grants which will offset the adverse balance. Alternatively, if we were to receive grants of free dollars for use in Europe, in addition to our own needs for sustenance, we should be in a position to repay our overall

[^36]indebtedness to these countries. However, until these conditions are fulfilled we must be careful before we let ourselves be encouraged to do too much to make sterling a convertible currency for Western European payments.

There is a series of agreements in force with Czechoslovakia ( ${ }^{23}$ ), Finland ( ${ }^{24}$ ), Poland $\left({ }^{25}\right)$, and U.S.S.R. $\left({ }^{26}\right)$. The Czech and Finnish agreements are legacies from the pre-August, 1947, arrangements and thus are similar to those in force with many of the Western European countries. The Polish Agreement provides for the settlement of all outstanding claims between the two countries, and for the transfer of surplus goods to Poland. In return, Poland is to pay a lump settlement of $£ 3 \mathrm{Mn}$. in gold during the current year, and $£ 10 \mathrm{Mn}$. in gold over the next 15 years. Current transactions are established on a similar basis to that in force for most of the Western European countries and provision is made to enable Poland to use sterling for payments to third countries if the two governments agree.

The agreement with the U.S.S.R. provides for the settlement of all claims between the two countries, the U.S.S.R. to repay the amount due to the U.K. in twelve (or fewer) annual instalments. Provision is also made for Russia to use sterling for payments to third countries, with the permission of the U.K. authorities. However, the two countries undertake to supply each other with goods (in 1948, grain from the U.S.S.R., and machinery from the U.K. ; in future years, agricultural and wood products from U.S.S.R. and manufactured articles from U.K.). It is hoped that this trade will be roughly balanced and will expand beyond its present level ( ${ }^{27}$ ).

While our arrangements with Eastern Europe are on a similar basis to those with Western Europe, the Russian agreement provides a step towards bilateral trade balancing with a country with which we previously had an export surplus. If this trend is forced upon us further by Eastern Europe, it may deprive us of a possible source of gold which could otherwise be used to meet our deficit elsewhere. ( ${ }^{28}$ ) In addition, the goods which these countries

[^37]desire are reconstruction and development goods, which use resources that are perhaps our most potent hard currency earners. Thus, while trade with Eastern Europe should be encouraged in order to increase our supplies of essential agricultural goods, it should be remembered that any gains made by bilateral agreements with this area may, in part, be offset by losses in other markets, so long as the resources available to our engineering and similar industries are are limited.

While Latin America is essentially a " dollar " area, we have made a series of agreements with some of the important countries. The Argentine agreement $\left({ }^{29}\right)$ takes the form of an arrangement whereby the British investment in Argentine railways (valued at $£ 150 \mathrm{Mn}$.), is repatriated. Payment takes the form of $£ 50 \mathrm{Mn}$. held by the Argentine as a result of pre-February, 1948, food purchases by the U.K. and $£ 100 \mathrm{Mn}$. advance payment made by us for food exports from the Argentine from the end of February, 1947, until March, 1948. Any sterling held by the Argentine after these transactions will be available only for payments to the scheduled territories.

Under the agreements with Brazil $\left({ }^{30}\right)$ and Uruguay $\left({ }^{31}\right)$, parts of their accumulated sterling balances (Brazil $£ 4 \mathrm{Mn}$., Uruguay $£ 1 \mathrm{Mn}$. plus all sterling payments since June 30th, 1947), have been released for payments to the scheduled territories or, with the permission of the U.K. authorities, to other countries. In addition, extra amounts have been released to permit these countries to make capital payments to the U.K., chiefly for the repatriation of Britishowned investments in these countries $(£ 13 \mathrm{Mn}$. for Uruguay, the total for Brazil as yet undetermined). The agreement with Brazil also provides for the expansion of trade with the U.K. The U.K. and Brazil undertake to facilitate trade in a specified list of commodities which involve exports of $£ 37 \mathrm{Mn}$. by the U.K. and imports of $£ 31 \mathrm{Mn}$., the deficit presumably to be financed by drawings on Brazil's balances and by trade with the rest of the sterling area. The result of this bilateral bargain is to increase our annual imports of essential raw materials and foodstuffs from Brazil by approximately $£ 10 \mathrm{Mn}$. per aǹnum, at the expense of foregoing a favourable balance of trade of $£ 4-5 \mathrm{Mn}$., which might possibly have been settled in hard currency, and of committing ourselves to an increase of

[^38]$£ 20 \mathrm{Mn}$. in our exports of engineering products, petroleum products, coal and textiles $\left({ }^{32}\right)$.

Further agreements are, at present (July 15th) being negotiated with other Latin American countries, none of which have, as yet, been published. It has, however, been stated that as a result of these negotiations, all current payments to Chile are now fully convertible into any currency $\left({ }^{33}\right)$.

As a result of these agreements it would appear that our arrangements for the control of foreign-owned balances have been put upon a more regular footing, and that this year our adverse balance of payments on capital account will be a good deal less than last year's total of $£ 297 \mathrm{Mn}$. Nevertheless the figures recently

[^39]given in Parliament $\left({ }^{31}\right)$ of the releases permitted in the first five months of 1948 from the sterling accounts of Argentina, Brazil, Ceylon, Egypt, India, Iraq, Pakistan and Uruguay do not give grounds for excessive complacency :


If these releases can be taken as typical, it seems clear that this country must be prepared to reconcile itself to a very considerable adverse balance of payments on capital account in the coming years.
${ }^{(34)}$ Hansard, 5/7/48. Written Answers to Questions, p. 20.

# THE INDEX OF INDUSTRIAL PRODUCTION 

By C. F. Carter

(on behalf of the Group of the Department of Applied Economics, Cambridge, responsible for the Index.)

In the first six months of this year our Index of industrial production continued at some $18 \%$ above 1946, and $8 \%$ above the average of 1947, the falls in March and May being due to the Easter and Whitsun holidays. There seems little reason why, on the average of the year, this level should not be maintained or bettered ; and the implied forecast in the Economic Survey, that real national income in 1948 would be about equal to that in 1947, seems almost bound to be too pessimistic. The Central Statistical Office interim index, which includes also the production of Finished Munitions, has moved parallel to our own but a few points higher. Since more of the constituent groups of the official index are now published, it would be most interesting to make a detailed comparison of the two ; but unfortunately no proper account of the construction of the interim index has yet been published. A detailed monograph on our own index, with further historical comparisons with pre-war years, is now in the press, and will be available shortly.*

## Exports and Production

Since nearly the whole of British exports is made by industries included in the Index, it is of interest to measure the progress of the export drive by comparing the volume index of exports

[^40](corrected for the varying lengths of quarters) with the quarterly averages of the index of production. The result is as follows :

| Year |  | 1946 |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 1 | 2 | 3 |  | 4 |
| Volume of Exports-\% of 1946 |  | 86 | 99 | 10 |  | 111 |
| Index of Production \% of 1946 |  | 3 | 97 |  |  | 111 |
| Year |  |  | 47 |  |  |  |
| Quarter | 1 | 2 | 3 | 4 | 1 | 2 |
| Volume of Exports-\% of 1946 | 103 | 103 | 114 | 118 | 127 | 136 |
| Index of Production-\% of 1946 | 98 | 109 | 107 | 119 | 118 | 120 |

It will be seen that up to the end of 1947 the two series kept closely together, their averages for 1947 being almost identical. It is interesting to note that if the two series are taken back to pre-war years their levels are also similar both for 1935 and for the average of 1935-38; in other words, the proportion of our industrial output going to export, both in 1946 and 1947, was broadly the same as before the war. With the 'turn of the year,' however, the export series seems at last to have broken away, and it now has a steeper trend. Up to the end of 1947 exports were, by and large, taking a constant proportion of an increasing production; now they are taking an increasing proportion of a production which is still probably climbing slowly.

## Revision of The Index

Since the first publication of our index in February a number of improvements have become possible. New data have become
available; and in some cases the basic series on which we rely have been extensively revised or altered by the authorities producing them. As foreshadowed in the May 'Bulletin,' the shipbuilding series have been revised in the light of expert advice (see below) ; while the publication of the first half-dozen reports of the 1946 Partial Census of Production has provided much better information on the net output of certain industries in that year and on the movement in the volume of output since 1935.

It is clear that when the reports of the next complete Census of Production are fully available, our whole Index will have to be revised; it is
an 'interim' index, like the official one. A process of piecemeal revision of the present index, introducing new principles for the calculation of weights for some industries but not others, would be as likely to disturb as to correct its accuracy. We have therefore been sparing in our corrections of the weights used for the monthly series, nearly all of which still seemed reasonable in the light of the new data; those now used (and set out in the monograph referred to above) will in general be used until a major revision of the index is called for. We have corrected all the basic series in the light of the most recent information, and we are not inclined,

## INDEX OF INDUSTRIAL PRODUCTION (Excluding Finished Munitions)

1946 average $=100$

| Period | Total Index |  |  |  |  |  |  |  |  |  |  | Building, Building Materials \& Furniture |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | A | B |  |  |  |  |  |  |  |  |  | A | B |  |  |  |
| Weight | 1000 | 1011 | 77 | 51 | 62 | 27 | 31 | 116 | 118 | 120 | 59 | 105 | 116 | 144 | 51 | 39 |
| Av. 1935* | (99) | (98) | 142 | (123) | 76 | 47 | 108 | (74) | (84) | 94 | 76 | (153) | (138) | 86 | (127) | 100 |
| Av. 1946 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 |
| $\begin{gathered} \text { Av. } 1947 \\ 1946 \end{gathered}$ | 108 | 107 | 105 | 107 | 101 | 96 | 119 | 123 | 107 | 100 | 100 | 119 |  | 103 | 106 | 115 |
| JAN. ... | 89 | 90 | 92 | 90 | 92 |  | 62 | 86 | 86 | 101 | 97 | 68 | 70 | 102 | 91 | 86 |
| FEB. | 95 | 95 | 98 | 96 | 98 | 97 | 79 | 94 | 92 | 99 | 99 | 72 | 86 | 103 | 93 | 89 |
| MAR. | 96 | 97 | 102 | 95 | 103 |  | 79 | 88 | 93 | 98 | 102 | 81 | 91 | 106 | 95 | 97 |
| APR. | 93 | 94 | 95 | 94 | 101 |  | 88 | 93 | 93 | 100 | 98 | 83 | 89 | 94 | 92 | 90 |
| MAY | 102 | 102 | 104 | 105 | 106 | 102 | 93 | 100 | 101 | 103 | 103 | 94 | 99 | 102 | 101 | 103 |
| JUNE | 97 | 97 | 96 | 97 | 97 |  | 112 | 100 | 98 | 97 | 97 | 97 | 98 | 94 | 93 | 98 |
| JULY | 97 | 97 | 96 | 99 | 95 |  | 85 | 95 | 100 | 99 | 101 | 105 | 104 | 90 | 100 | 98 |
| AUG. | 93 | 92 | 95 | 97 | 90 | 102 | 99 | 89 | 95 | 93 | 92 | 103 | 101 | 84 | 91 | 92 |
| SEPT. | 107 | 106 | 105 | 108 | 102 |  | 119 | 107 | 108 | 98 | 103 | 126 | 121 | 99 | 102 | 112 |
| OCT, | 112 | 111 | 109 | 113 | 108 |  | 125 | 114 | 113 | 106 | 104 | 127 | 120 | 105 | 116 | 112 |
| NOV. | 113 | 113 | 111 | 112 | 109 | 99 | 128 | 118 | 117 | 108 | 106 | 125 | 115 | 109 | 119 | 117 |
| $\begin{aligned} & \text { DEC } \\ & 1947 \end{aligned}$ | 107 | 105 | 97 | 94 | 99 |  | 133 | 114 | 107 | 97 | 98 | 121 | 107 | 108 | 109 | 105 |
| JAN. | 107 | 106 | 103 | 115 | 104 |  | 117 | 109 | 110 | 98 | 96 | 112 | 103 | 110 | 109 | 108 |
| FEB. . | 85 | 85 | 72 | 77 | 83 | 96 | 60 | 100 | 75 | 81 | 80 | 79 | 75 | 109 | 91 | 83 |
| MAR. . | 102 | 102 | 100 | 94 | 93 |  | 100 | 112 | 107 | 97 | 95 | 98 | 91 | 109 | 101 | 114 |
| APR. | 104 | 104 | 102 109 | 103 | 102 |  | 133 | 115 | 104 | 98 | 95 | 111 | 105 | 100 | 106 | 105 |
| JUNE... | 115 | 1113 | 1109 | 108 | 103 | 88 | 142 | 115 | 109 | 103 | 102 | 119 | 111 | 99 | 114 | 113 |
| JULY | 105 | 104 | 104 |  |  |  |  |  |  |  |  |  |  | 88 |  |  |
| AUG. | 101 | 100 | 104 | 103 | 95 | 92 | 108 | 112 | 105 | 102 98 | 99 | 125 | 109 | 88 | 98 104 | 106 |
| SEPT. | 114 | 113 | 113 | 117 | 108 |  | 133 | 128 | 116 | 105 | 106 | 130 | 119 | 99 | 110 | 127 |
| OCT. | 121 | 119 | 118 | 122 | 111 |  | 138 | 145 | 121 | 108 | 112 | 137 | 124 | 108 | 110 | 128 |
| NOV. ... | 122 | 121 | 121 | 115 | 112 | 109 | 129 | 152 | 122 | 106 | 114 | 141 | 126 | 115 | 109 | 135 |
| $\begin{aligned} & \text { DEC. } \\ & 1948 \end{aligned}$ | 114 | 111 | 110 | 101 | 103 |  | 118 | 144 | 108 | 96 | 105 | 131 | 114 | 111 | 99 | 121 |
| JAN. | 117 | 117 | 118 | 112 | 113 |  | 136 | 142 | 117 | 96 | 113 | 130 | 115 | 117 | 109 | 134 |
| FEB. | 123 | 120 | 124 | 122 | 117 | 81 | 128 | 158 | 118 | 96 | 118 | 139 | 122 | 117 | 108 | 141 |
| MAR. | 115 | 112 | 116 | 99 | 114 |  | 125 | 140 | 103 | 95 | 111 | 135 | 116 | 109 | 101 | 133 |
| MAY. | 122 | 120 | 126 | 113 | 117 |  | 132 | 148 | 112 | 98 | 118 | 148 | 129 | 113 | 109 | 157 |
| JUNE... | 122 | 120 | 115 | 98 | 118 | 105 | 143 | 138 | 102 | 101 101 | 112 | 145 149 | 125 | 105 109 | 106 | 125 |

[^41]as long as the present index continues, to revise figures for 1946 and 1947. Figures for the months of 1948 are liable to be revised as late items of information arrive. We shall, however, continue to improve the comparison with 1935 as reports of the 1946 Partial Census are published; for the quality of the information provided by this Partial Census is generally far better for making this comparison than any which was previously available to us.

The Partial Census results for Tailoring and Dressmaking enable us to put this part of the 1935 comparison-originally based on input and employment indicators-on a sounder footing, by providing a reliable measure of the movement in the total value of output, and some information about the change in the average price charged for certain garments. After making an allowance for the up-grading of average quality caused by rationing, we arrived at a measure of the movement of output in real terms which was surprisingly close to our previous one.

In the Chemicals trade, however, the Partial Census shows a much greater expansion than we had assumed in the quantity of medicines, etc. produced, and we have revised the 1935 comparison accordingly. It appears also that in this case our method of estimating the value of the net output of the trade from the movement of the wages bill has given too high a result ; we have therefore reduced the weight of the trade
by some $20 \%$, while considerably increasing the share of Drugs and Medicines in that weight.

## Quarterly Index for Shipbuilding

The output of the shipbuilding industry, measured by completed ships, shows wide variations from month to month, according to the presence or absence of large ships in the figures, which are little related to the activity of the industry. We have therefore decided that our ' A' index of shipbuilding, which must logically be based on completions, is likely to be misleading, and we have suspended publication of it. At the same time we have revised the ' $B$ ' index by using an average of keels laid, launchings and completions as a measure of work carried out in the shipbuilding yards ; merchant shiprepairing is represented by an appropriate employment figure (corrected for holidays and for estimated changes in productivity) in place of the previous assumed series. We have taken the opportunity to revise the weights, bringing in the weight of Marine Engineering as being more closely related to Shipbuilding than to Mechanical Engineering, and we have improved the quality of the comparison with 1935 . In order to minimise the danger of a false importance being attached to month-to-month variations, as a large ship reaches one of the stages named above, we have decided to publish our ' B ' index at quarterly intervals. The new figures will be found in the Table.

## FINANCE

By F. W. Paish

Government Finance.-The Exchequer Returns for the first quarter of the 1948/9 financial year show Ordinary Revenue at $£ 795 \mathrm{Mn}$., Ordinary Expenditure at $£ 614 \mathrm{Mn}$., and a revenue surplus of $£ 181 \mathrm{Mn}$., as compared with a Revenue of $£ 840 \mathrm{Mn}$., Expenditure of $£ 620 \mathrm{Mn}$. and a surplus of $£ 220 \mathrm{Mn}$. in the first quarter of 1947/8.

The appearance of a reduced revenue surplus as compared with the first quarter of $1947 / 8$ is misleading, and the true position was very much more favourable. Of this year's revenue, only $£ 39 \mathrm{Mn}$. was derived from Sales of Surplus War Stores, Surplus Receipts from Trading, Miscellaneous Receipts and the Special Contribution, whereas last year the first three of these items
contributed no less than $£ 193 \mathrm{Mn}$. If we omit these items, which mainly represent either the cancellation of old debt held by departments or payments out of capital, it would seem that both the genuine revenue and the genuine surplus for the quarter were over $£ 100 \mathrm{Mn}$. larger than a year ago.

The return of Expenditure was less satisfactory, for the fall compared with the corresponding period of last year was only $£ 6 \mathrm{Mn}$., out of an estimated fall of $£ 234 \mathrm{Mn}$. for the whole year. It would seen that both revenue and expenditure are tending to run ahead of estimates, for Revenue (excluding the items listed in the previous paragraph) was equal to $20.7 \%$ of the estimate for the year, whereas in the first quarter
of 1947/8 the proportion of the first quarter's revenue to that for the whole year was only $19.6 \%$, and Expenditure was equal to $20.6 \%$ as compared with $19.3 \%$ a year ago.

TABLE 1.
ORDINARY REVENUE AND EXPENDITURE.

| Weekly Average £Mn. | Ordinary Revenue Total | Expenditure |  | Surplus $(+$ ) or Deficit (-) |
| :---: | :---: | :---: | :---: | :---: |
|  |  | Supply Services | Total |  |
| 1938/9* | $17 \cdot 8$ | $15 \cdot 8$ | $20 \cdot 2$ | $-2.4$ |
| 1945/6 | $62 \cdot 9$ | $95 \cdot 7$ | $104 \cdot 9$ | $-42 \cdot 0$ |
| 1946/7 | $64 \cdot 0$ | 63-9 | $74 \cdot 9$ | $-10.9$ |
| 1947/8 | $73 \cdot 5$ | $50 \cdot 7$ | 59.9 | $+12 \cdot 6$ |
| 1938/9* Apr.-June | $10 \cdot 1$ | $12 \cdot 0$ | 18.0 | $-7.9$ |
| July-Sept. | $13 \cdot 3$ | $15 \cdot 3$ | $18 \cdot 1$ | -4.8 |
| Oot.-Dec. | $14 \cdot 0$ $34 \cdot 0$ | $15 \cdot 7$ $20 \cdot 2$ | $21 \cdot 6$ 23.2 | $-7 \cdot 6$ +10.8 |
| Jan. Mar. |  |  |  |  |
| 1946/7 Apr.-June | $48 \cdot 4$ | $61 \cdot 3$ | $69 \cdot 4$ | $-21 \cdot 0$ |
| July-Sept. | $54 \cdot 2$ | $54 \cdot 2$ | $69 \cdot 9$ | $-15 \cdot 7$ |
| Oot.-Dec. | $56 \cdot 2$ | $58 \cdot 1$ | $65 \cdot 5$ | $-9.3$ |
| Jan.-Mar. | $98 \cdot 1$ | $83 \cdot 3$ | $95 \cdot 6$ | $+2.5$ |
| 1947/8 April-June | $64 \cdot 6$ | $38 \cdot 6$ | $47 \cdot 7$ | $+16.9$ |
| July-Sept. | $61 \cdot 4$ | $50 \cdot 0$ | 61.5 | -0.1 |
| Oot.-Dec. | 57.9 110.4 | $47 \cdot 3$ | $56 \cdot 0$ | $+1 \cdot 9$ |
| Jan.-Mar. | $110 \cdot 4$ | $67 \cdot 1$ | $78 \cdot 7$ | $+31.7$ |
| 1948/9 Apr.-June | $61 \cdot 1$ | 38.5 | $47 \cdot 2$ | $+13.9$ |
| Apr. 1-May 1 | $69 \cdot 3$ | $40 \cdot 4$ | $54 \cdot 6$ | $+14.7$ |
| May 2-29 | $63 \cdot 4$ | $33 \cdot 6$ | $36 \cdot 3$ | $+27 \cdot 1$ |
| $\text { May 30- June } 30$ | $51 \cdot 2$ | $40 \cdot 8$ | $49 \cdot 6$ | $+1 \cdot 6$ |
| July 1-31 | 59.6 | $45 \cdot 1$ | $50 \cdot 2$ | + 9.4 |

* Including expenditure under the Defence Loans Acts, 1937 and 1939.

Extra-budgetary payments continued to fall and at $£ 148 \mathrm{Mn}$. were $£ 27 \mathrm{Mn}$. below the previous quarter, chiefly as a result of reduced payments for war damage.

TABLE 2.
EXTRA-BUDGETARY PAYMENTS. £Mn.

| 1948 | $\begin{aligned} & \text { April } \\ & \text { (31 days) } \end{aligned}$ | $\begin{aligned} & \text { May } \\ & \text { (28 days) } \end{aligned}$ | $\begin{aligned} & \text { June } \\ & \text { (32 days) } \end{aligned}$ | Total (91 days) |
| :---: | :---: | :---: | :---: | :---: |
| Net E.P.T. Refunds... | $0 \cdot 6$ | 1.2 | ${ }_{0.8}^{17}$ | ${ }_{2 \cdot 6}$ |
| Post-war Credits | $2 \cdot 0$ | $1 \cdot 6$ | $1 \cdot 7$ | $5 \cdot 3$ |
| Net War Damage Payts W.D.C. | . 3.0 | 16.0 | 13.0 | $32 \cdot 0$ |
| Board of Trade |  | 1.5 | $1 \cdot 0$ | 2.5 |
| Housing | $30 \cdot 9$ | $20 \cdot 7$ | 21.7 | $73 \cdot 3$ |
| Coal Nationalisation | $8 \cdot 0$ | $5 \cdot 0$ | 5.0. | $18 \cdot 0$ |
| Cotton Buying | -0.5 | $10 \cdot 0$ | $-0.5$ | 9.0 |
| Overseas Development | $2 \cdot 1$ | 2.5 | - | $4 \cdot 6$ |
| Other (net) ... | $2 \cdot 5$ | $1 \cdot 6$ | $-3.7$ | $0 \cdot 4$ |
|  | $48 \cdot 6$ | $60 \cdot 1$ | $39 \cdot 0$ | $147 \cdot 7$ |

The surplus of $£ 181 \mathrm{Mn}$. on revenue account was rather more than sufficient to cover these payments, and after providing for sinking funds, left some $£ 31 \mathrm{Mn}$. for the redemption of debt. As small savings remained at a very low level, more than the whole of this sum was needed for net repayments of long-term debt, and shortterm borrowing increased by $£, 18 \mathrm{Mn}$.

## TABLE 3.

GOVERNMENT BORROWING. £Mn.

$$
\begin{array}{cccc}
\text { April } & \text { May } & \text { June } & \text { Total } \\
\text { (31 days) } & (28 \text { days }) & (32 \text { days }) & (91 \text { days })
\end{array}
$$

| Nat. Savings Certs. | 0.8 | $-1.9$ | $-1.2$ | $-2.3$ |
| :---: | :---: | :---: | :---: | :---: |
| $2 \frac{1}{2} \%$ Def. Bonds | $2 \cdot 7$ | $2 \cdot 1$ | $2 \cdot 1$ | 6.9 |
| Other Debt-Internal | $-0.9$ | -0.1 | $-0.1$ | $-1.1$ |
| External | $0 \cdot 3$ | -0.1 | $-5 \cdot 3$ | $-5 \cdot 1$ |
| Repayments ... | $-16 \cdot 7$ | $-17 \cdot 1$ | $-13 \cdot 8$ | $-47 \cdot 6$ |


| Total Long and Medium-term Borrowing | $-13.8$ | $-17 \cdot 1$ | $-18 \cdot 3$ | $-49 \cdot 2$ |
| :---: | :---: | :---: | :---: | :---: |
| Tax Reserve Certs. | $1 \cdot 0$ | $-2 \cdot 3$ | $5 \cdot 9$ | $4 \cdot 6$ |
| Treas. Dep. Rects. | $55 \cdot 5$ | $30 \cdot 5$ | $91 \cdot 0$ | $177 \cdot 0$ |
| Treas. Bills-Tender | $20 \cdot 0$ | $30 \cdot 0$ |  | $50 \cdot 0$ |
| W Tap .. | $-60.9$ | $-69 \cdot 1$ | $-12.9$ | -142.9 |
| W. \& M. Advances- |  |  |  |  |
| Govt. Depts. | -11.9 | $-19 \cdot 6$ | $-32.8$ | $-64.3$ |
| Bank of England | $-6.0$ | - |  | $-6.0$ |
| Short-term Borrowing | $-2 \cdot 3$ | $-30 \cdot 5$ | $51 \cdot 2$ | 18.4 |
| Total Borrowing | $-16 \cdot 1$ | $-47 \cdot 6$ | $32 \cdot 9$ | $-30.8$ |

This comparatively small net change in short-term borrowing, was, however, the resultant of much larger changes in the individual items of the floating debt, for Tap Treasury Bills fell by $£ 143 \mathrm{Mn}$. and Ways and Means Advances by $£ 70 \mathrm{Mn}$., while Treasury Deposit Receipts rose by $£ 177 \mathrm{Mn}$. and Tender Treasury Bills by $£ 50 \mathrm{Mn}$. To some extent these changes seem to have been merely a reversal of the abnormal movements of the previous quarter, when large quantities of tap bills were transferred to the clearing banks to enable them to expand their deposits by the $£ 150 \mathrm{Mn}$. paid to the accounts of the Argentine railways. Whether the deposits have been redistributed between the banks as a result of the repayment of the Argentine railways' debentures during May, or whether they are still held by the railway companies pending the repayment of their preference and ordinary shares, it would be reasonable for the tap bills in due course to be replaced by more usual types of bank assets, such as tender bills and T.D.R's. This explanation does not, however, account for the whole of the fall of $£ 213 \mathrm{Mn}$. in tap bills and Ways and Means Advances, let alone the $£ 79 \mathrm{Mn}$. by which the bill holdings of the Exchange Equalisation Account should have been increased as a result of the quarter's net sales of gold and dollars. The explanation may lie in a decrease in the volume of overseas-owned sterling balances held in the form of tap bills. We know that during the first five months of $1948, £ 57 \mathrm{Mn}$. of these balances were released for general purposes,
$£ 25 \mathrm{Mn}$., for augmenting working balances and $£ 131 \mathrm{Mn}$., for the purchase of U.K. concerns and securities (*).

Other Finance.-The clearing bank statements for the second quarter of 1948 show clearly the effects of the renewed expansion of Government borrowing. It is true that, in spite of the increase of $£ 50 \mathrm{Mn}$. in issues of Treasury Bills by tender, the running off of the tap bills exceptionally sold to the banks in the previous quarter caused the Discounts of nine clearing banks to fall from $£ 786 \mathrm{Mn}$. to $£ 639 \mathrm{Mn}$. But this decline was more than offset by an increase of $£^{200} \mathrm{Mn}$. in their holdings of Treasury Deposit Receipts and with a further increase of $£ 39 \mathrm{Mn}$. in Advances and some expansion in Cash and Money at Call, there was a rise of $£ 111 \mathrm{Mn}$. in net Deposits.

The effect of this rise in Deposits on the volume of money seeking investment was increased during May by the repayment of the Argentine Railway debentures, thus putting into circulation part of the $£ 150 \mathrm{Mn}$. of deposits created for the purpose during February. It is consequently not surprising that our mid-month index of fixed interest security prices rose from 133.2 in April to 135.3 in May and that, in spite of the international situation, it still stood at
*Hansard, 5/7/1948, Written Answers to Questions p. 20

TABLE 4
NINE CLEARING BANKS

|  |  | Gross Deposits £Mn. | Balances with other Banks \& Items in transit £Mn. | Net Deposits <br> £ Mn. | Increase in Net Deposits in <br> Preceding 12 months |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1945 | March | 4,241 | 137 | 4,104 | 447 |
|  | June ... | 4,517 | 174 | 4,343 | 622 |
|  | September | 4,654 | 135 | 4,519 | 599 |
|  | December | 4,609 | 195 | 4,414 | 283 |
| 1946 | March | 4,513 | 158 | 4,355 | 251 |
|  | June | 4,797 | 187 | 4,610 | 267 |
|  | September | 5,040 | 155 | 4,885 | 366 |
|  | December | 5,407 | 251 | 5,156 | 742 |
| 1947 | March ... | 5,285 | 168 | 5,117 | 762 |
|  | June ... | 5,382 | 215 | 5,167 | 557 |
|  | September | 5,344 | 159 | 5,185 | 300 |
|  | December | 5,651 | 256 | 5,395 | 239 |
| 1948 | March | 5,524 | 186 | 5,338 | 221 |
|  | April ... | 5,588 | 188 | 5,400 | 262 |
|  | May ... | 5,594 | 227 | 5,367 | 253 |
|  | June | 5,672 | 223 | 5.449 | 282 |
|  | July .. | 5,629 | 179 | 5,450 | 281 |

135.2 in July. Prices of industrial securities, on the other hand, were exposed, not only to the foreign news, but also to the effects of dividend limitations and the disinflationary results of the budget surplus; and our mid-month index of ordinary shares, after rising from 172 in April to 175 in May, fell to 169 in June and 161 in July, or only just above the low point reached last October. As a result of this weakness, a number of recent capital issues have not been fully subscribed.

## WAGES

By A. L. Bowley

Since V-day the upward course of wage-rates has been marked by three periods of rather rapid change and two of very little movement.*

From April to August, 1945, there was a rather rapid increase and then little movement till the end of the year. In the first half of 1946 in many industries the loss of overtime payments was to a great extent compensated by increase in wage-rates for the normal week. Then from July,

[^42]1946, to July, 1947, there were few changes, but in many cases working-hours were reduced with little change in the week's total. (See Bulletin, February, 1948, pp. 19-20.) In the latter half of 1947 there were considerable increases for builders, coal-miners and agricultural labourers, and the index rose about $4 \%$. Sir Stafford Cripps' appeal for stationariness in wages was not met at once, for there were outstanding claims for increases for transport workers by road and rail, printers, and textile workers.

These, together with substantial rises in women's minimum rates, brought the index up another $3 \%$ by the end of April. Since April there have been increases in women's minimum rates in confectionery, etc., where wage-rates had lagged behind others governed by Trade Boards, in builders' wages (which are linked to the Retail Prices Index), and for labourers employed by Local Authorities. The wages of Local Authority and of builders' labourers have generally been nearly equal; but the former did not change with the builders' increase last November, and equality has been restored by an increase (unconfirmed) of 6 s . weekly in July. Now both classes of labourers will receive about $£ 5$ weekly, the exact sum varying from town to town.

The very important claim of engineering and shipbuilding workers for a substantial increase is under discussion. The last increase in these industries was in April, 1946, since which date there has been a general rise in wage rates and in the cost of living.

The accompanying table shows the movements between critical dates in detail. It also gives an alternative estimate for coal and the general average, where it is assumed that wagerates in mines for unchanged work did not change from the end of 1944 till November, 1947. (See Bulletin, November, 1947, p. 112.)

| Percentage of August, 1939 |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Bricklayers | 1945 | 1945 | 1946 | 1947 | 1947 | 1948 |
|  | July | Dec. | July | July | Dec. | July |
|  | 133 | 133 | 153 | 153 | 166 | 170 |
| Labourers | 141 | 142 | 163 | 163 | 179* | 183 |
| Printers' Compositors... | 125 | 125 | 137 | 150 | 150 | 163 |
| Dock Labourers | 123 | 145 | 145 | 145 | 145 | 145 |
| Engineers' Fitters | 141 | 141 | 150 | 150 | 150* | 150 |
| Labourers | 1541 | 1544 | 166 | 166 | 166 | 166 |
| Shipbuilders | $156^{2}$ | 156 | 167 | 167 | 167 | 167 |
| Railwaymen | 1411 | 154 | 154 | 165 | 165 | 170 |
| Cotton | 172 | 172 | 183 | 183 | 183 | 204 |
| Wool | 146 | 158 | 158 | 169 | 169 | 176 |
| Local Authorities | 143 | 143 | 156 | 165 | 165 | 175 |
| Trams | 139 | 139 | 151 | 151 | 151 | 163 |
| Lorry Drivers | 135 | 135 | 144 | 144 | 144 | 155 |
| Boots | 137 | 137 | 163 | 163 | 163 | 189 |
| Confectionery | 159 | 169 | 169 | 193 | 193 | 214 |
| Tailoring | 153 | 153 | 183 | 183 | 183 | 208 |
| Shirts | 153 | 153 | 183 | 183 | 183 | 208 |
| Tobacco | 132 | 131 | 131 | 132 | 132 | 137 |
| Coal | 204 | 201 | 208 | 208 | 244 | 244 |
| Agriculture | 20 | 201 | 230 | 230 | 259 | 259 |
| Weighted Average | 1531 | 156 | 167 | 170 | 1763 | 182 |
| * Amended from | ber |  |  |  |  |  |
| Alternative: |  |  |  |  |  |  |
| Coal | 192 | 192 | 192 | 192 | 219 |  |
| Weighted Average | 152 | 155 | 165 | 168 | 174 | 180 |

It is interesting to compare the movements shown by wage index numbers with the estimates of the changes in the total weekly wages bill published monthly in the Ministry of Labour Gazette.


It appears that one point in our index corresponds over moderately long periods with about $£ 200,000$ in the national weekly wage-bill.

The changes in the Bulletin index and the Ministry's wage-index may be compared as follows :-

JUNE $1947=100$ IN BOTH INDEX NUMBERS.

| 1947 |  | Bulletin | Ministry |  | Bulletin | Ministry |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | July | . 100.7 | 100 | 1948 | Jan. 105.4 | 104 |
|  | Aug. | $100 \cdot 7$ | 101 |  | Feb. 106.6 | 104 |
|  | Sept. | 101.5 | 101 |  | Mar. 107.3 | 105 |
|  | Oct. | 101.5 | 102 |  | Apr. 107.5 | 105 |
|  | Nov. | 104-5 | 103 |  | May 107.5 | 105 |
|  | Dec. | 104.5 | 103 |  | June 107-6 | 106 |

The Ministry shows a slower rate of increase since October, 1947, than does our Index. In November there was a considerable increase in miners' wages, to which we give a heavy weight. It is curious that in the account of the change given in the Gazette (November, 1947, p. 423), it is taken as affecting only 391,000, where 735,000 were employed (p. 415).

Unfortunately, the Ministry has not published the weights taken as basis (i.e., total wage bill in 1946), nor are any details given of the changes in separate industries that are taken into account. It is not even clear whether the basis for the monthly changes in the amount of the weekly wages bill is the same as that for the indexnumber. In the 12 months from July 1st, 1947, the aggregate amount of change was estimated at $£ 2,400,000$ while the percentage change in the index was 6 , or about $£ 400,000$ to a point. In the Bulletin index, re-based for June, 1947, the percentage change was 7.6.

In neither index nor in the table of the changes of amount is there any inclusion of overtime ; the basis is the wage for the normal working week.

[^43]
## I. THE BUILDING AND CIVIL ENGINEERING INDUSTRIES

By Ian Bowen

In the table below, estimates are given for the value of output of the building and civil engineering industries in the first quarter of 1948. The estimates have been made by applying factors of output per head to the official returns of labour employed on different classes of work. Adjustments have been made to allow for movements in costs, seasonal variations in hours of work, and the amount of time taken off work as a result of of holidays. The movements in costs allow only for changes in wage-fates and in materials prices.

The estimated figure for the first quarter of 1948 is $£ 170.5 \mathrm{Mn}$. This shows a decline from the fourth quarter of 1947, although it is higher than any previous quarter for which figures are given. The main causes of the decline are the reduction of some 14,000 in the average amount of labour employed, and the seasonal factor.

## Types of Work

The value of work done on new housing was the item showing the largest decline since the fourth quarter of 1947. This was due to the steady withdrawal of labour from new housing. There was also some reduction in the work done on war damage repairs for houses, and a slight reduction in the value of work done on the other housing items. This fall is not inconsistent with the rise in the numbers of finished houses which has occurred during the first six months of this year, as work on the earlier stages of house building declined considerably.

The outlook for new and other housing work seems to be that private enterprise building will, to some extent, retrieve the labour force that has left new housing jobs. On the other hand, a force working in the other direction is the raising of the licensing limit. This is bound to result in an increase in the value of work done on repairs and maintenance to houses.

During the first quarter of 1948 the value of new work put in hand was undoubtedly less than the value of work completed, possibly by as much as $£ 40 \mathrm{Mn}$. The load of unfinished work on the industry was certainly reduced during this quarter.

## Prefabrication

There is still no information on the factory cost of permanent non-traditional houses that are being built. The total number built to the end of the quarter was over 40,000 , including 1,262 aluminium houses.

## OUtlook for Building Activity for the Remainder of 1948

Since the end of the first quarter of the year there has been a considerable stepping up in the value of work licensed as well as the lifting of the licensing ceiling. Although the total employed in the industry may decline, this increase in the amount of work begun will probably suffice to avert any major unemployment of building resources later in the year.

ESTIMATED GROSS OUTPUT OF THE BUILDING AND CIVIL ENGINEERING INDUSTRIES IN GREAT BRITAIN (£Mn.).

|  | HOUSING |  |  |  | WORK <br> OTHER THAN HOUSING |  |  | TOTAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | New houses | Conversions and adaptations | War damage repairs for houses | Repairs and maintenance for houses | Other war damage repairs | Industry and agriculture | Other |  |
| 1946 Qr. I | $30 \cdot 3$ | $5 \cdot 6$ | $25 \cdot 7$ | 11.0 | $3 \cdot 6$ | $12 \cdot 3$ | $19 \cdot 0$ | $107 \cdot 5$ |
| 1946 Qr. II | 42.5 | 5.8 | $23 \cdot 6$ | $13 \cdot 0$ | $3 \cdot 9$ | $16 \cdot 8$ | 22.5 | 128.1 |
| ", III | $48 \cdot 6$ | $5 \cdot 4$ | $19 \cdot 6$ | 13.9 | $3 \cdot 5$ | $19 \cdot 9$ | 21.6 | $132 \cdot 5$ |
| ,, IV | $62 \cdot 1$ | $6 \cdot 1$ | $20 \cdot 1$ | $16 \cdot 2$ | 4*1 | 4.3 | $25 \cdot 6$ |  |
| Total | 183.5 | $22 \cdot 9$ | $89 \cdot 0$ | 54-1 | $15 \cdot 1$ | $73 \cdot 3$ | $88 \cdot 7$ | $526 \cdot 6$ |
| 1947 Qr. I | $42 \cdot 1$ | $4 \cdot 8$ | 13.5 | $13 \cdot 4$ | 3-1 | 16.9 | 21.4 | 115.2 |
| ,", II | $51 \cdot 1$ | $6 \cdot 6$ | 17.4 | $19 \cdot 3$ | 4-3 | 26.4 | 34.7 | $159 \cdot 8$ |
| ,, III | 49.5 | $5 \cdot 7$ | $14 \cdot 6$ | $18 \cdot 1$ | $4 \cdot 1$ | $26 \cdot 9$ 31.1 | $40 \cdot 5$ |  |
| , IV | 60.0 | $6 \cdot 2$ | $15 \cdot 4$ | $22 \cdot 6$ | $4 \cdot 4$ |  |  |  |
| Total | $202 \cdot 7$ | $23 \cdot 3$ | $60 \cdot 9$ | $73 \cdot 4$ | $15 \cdot 9$ | 101.3 | $130 \cdot 8$ | 608-3 |
| 1948 Qr. I | 56.4 | 6.0 | 13.4 | $22 \cdot 3$ | $4 \cdot 3$ | $27 \cdot 8$ | $40 \cdot 3$ | $170 \cdot 5$ |

# II. PRODUCERS' EQUIPMENT 

By T. Barna

Gross investment in fixed capital in the U.K. was of the order of $£ 1,600 \mathrm{Mn}$. in 1947 and of this about $£ 800 \mathrm{Mn} \ddagger$ represented work of construction. The other $£ 800 \mathrm{Mn}$. was the output of the engineering and shipbuilding industries entering into gross capital formation, plus imports of plant and machinery. Road vehicles and shipbuilding accounted for about $£ 200 \mathrm{Mn}$. The Monthly Digest publishes figures in terms of value relating to various kinds of machinery, and this information, covering about one-third of the residual $£ 600 \mathrm{Mn}$., is brought together in this note.

The table below shows the supply of certain kinds of machinery, both home produced and TABLE 1
SUPPLY OF CERTAIN KINDS OF MACHINERY U.K., £ Mn.

| 1935 | 1946 | 1947 | 1948 |
| :--- | :--- | :--- | :--- |

1st Qr.

Agricultural machinery Machine tools-metal working wood working Prime movers and boiler plant Textile machinery. Printing machinery
Tobacco machinery
Office machinery
Electric motors and generators
Refrigerating machinery
Water treatment plant
Industrial furnaces
Total A
Total B
Notes: Total A excludes the last three items. Values either at manufacturers' prices, or imports, c.i.f., excluding duty. Domestic refrigerating machines are excluded.
Sources : Census of Production, 1935, Monthly Digest of Statistics, Trade Accounts.

* Rate of first half-year.
$\uparrow$ Rate of Jan.-Feb.
imported, thought to be included in gross capital formation. The Monthly Digest gives manufacturers' invoice values, distinguishing sales to the home market and exports ; imports have been added to home market sales. The most convenient pre-war year of comparison is 1935, because of the Census of Production then. (The results of the 1937 inquiry are not yet fully published.) Exports have been deducted, allowing for the fact that f.o.b. values are higher than manufacturers' receipts. As far as possible the figures have been made comparable but it must be realised that the coverage and classification in the different sources are not exactly the same. A comparison of 1946 deliveries, as given in the Monthly Digest, with the recently published results of the 1946 Partial Census of Production reveals certain differences which may be explained at a later date. It is best to use the

[^44]figures as indicators rather than as absolute measures of the contents under each heading. The coverage is not complete ; but also as parts and accessories produced are mostly included, there may be some duplication, in so far as parts are used in the production of complete machines, though the most important duplications have been avoided (such as internal combustion engines to be used in motor cars). Also, the figures make no allowance for the cost of distribution or installation. Customs duties are excluded.

Although the total of $£ 167 \mathrm{Mn}$. in 1947 represents only a small proportion of gross capital formation, the items included are among the most vital for our industrial re-equipment. The figures for the first quarter of 1948 show, fortunately, no signs of capital cuts. All essential machines reach the home user in greater abundance than in 1935, the average volume being about double that of 1935 .

It is regrettable that the Monthly Digest usually publishes these figures with two or three months' delay when they are so important*. In some cases the delay is as much as six months; otherwise, another $£ 25 \mathrm{Mn}$. worth of machinery could have been included in our table.

Estimates are now also available for the value of road vehicles, including parts, produced for the home market. These are shown below. Not all private cars enter into gross capital formation, but it can be assumed that nowadays a major part is bought by business.


Notes: Imports include non-agricultural tractors. Values exclude customs duty, purchase tax and distributive margin.
Sources: Monthly Digest of Statistics. Trado Accounts.
The Monthly Digest also gives certain important items of capital formation by quantity but not by value; among these are railway rolling stock, ships, electric generators and mining machinery. It is hoped that at a later date it may be possible to estimate the value of these as well as of other items, and to extend the coverage of the estimates given in the Bulletin.

[^45]
# WORLD COMMODITY SURVEY 

By C. F. Carter.

The movements of commodity production and prices during 1948 will be watched all over the world with great interest. World demand, which early in the year was flagging, has received the stimulus of a continuation of the supply of dollars through the European Recovery Programme. This stimulus may merely help to sustain prices which would otherwise have slumped, and bring into much-needed use goods (such as Cuban sugar) which would otherwise have been in burdensome surplus. But other commodities are in inadequate and inelastic supply, and, with an unrestricted American demand still running at boom levels, E.R.P. may drive up prices of these still further. It is especially important to this country to know which pattern will predominate; for, with imports mainly composed of food and raw materials, and with a considerable import surplus, we are especially vulnerable to a further adverse movement of the terms of exchange between primary products and manufactures. The hand of Congress, generous as it is, is only offering enough dollars to maintain our present imports on a fairly stable price level. There is no provision in E.R.P. for the very serious possibility that a fair proportion of American aid may cancel itself out through the rises in price which it induces.

The table overleaf contains some signs of encouragement. Even with E.R.P. demand, Cuban sugar prices are weak, and there is certainly plenty of sugar for those with the currency to buy it. Wheat prices are falling, and are now back to the level of last July, while the good crops now promised almost everywhere may bring the price still lower. It must be rememberod. however, that Britain is already buying mer wheat at less than the free market price, and does not stand to gain immediately by a fall. Cotton prices have fallen considerably from their spring peak. The prices of wool, rubber and cocoacommodities of which the Sterling Area is a net exporter-have recently been higher than ever. Latest information shows a slight decline of wool prices. The price-spread between fine and coarse grades has increased again, which suggests that demand, though insistent, is discriminating. It should be noted, too, that even at their recent high levels, rubber prices are less than twice pre-war; so that our earnings from rubber sales are, compared with pre-war, less
adequate to buy other commodities, many of which have increased in price by a factor of three or five.

It would be unwise, however, to build hopes upon price movements which may prove to be only temporary fluctuations. The full force of E.R.P. demand may not yet have been felt in the markets. To meet the demand of an increased world population, and of a Western Hemisphere with full employment, the production of most commodities needs to be safely above the level of the late 1930 's. In the table, only rubber, copper, zinc, and perhaps wheat after the harvest, are shown as above that level. The quantity rises between the last two seasons, welcome as they are, have nowhere (except perhaps in rubber) brought us near abundance. There are certainly no signs of such a rise in production, or such an easing of demand, as would promise a substantial fall in prices; and it will be wise to assume that the prices of Britain's imports during the first year of E.R.P. will be considerably higher than those earlier assumed.

## Wheat, Maize, Oats, Barley and Rye

The International Wheat Agreement was stillborn, the U.S. Senate having failed to ratify it by the closing date ; negotiations must now start again from the beginning. Figures issued by the U.S. Office of Foreign Agricultural Relations, nominally covering Russia and China, have now been included in the table. These estimates actually show a small rise in wheat production from 1946 to 1947, in part due to a supposed 100 Mn . bushel increase in the Russian crop. They show North American production in 1947, $60 \%$ above the 1935/9 average at 1,722 Mn. bush., and European production (including Russia in Asia) $30 \%$ down at $1,890 \mathrm{Mn}$. bush. ; the net fall from these two areas together is 300 Mn . A rise of 60 Mn . bush. in Australia ( $35 \%$ of the pre-war quantity) and unimportant movements in other areas bring a world total of $5,790 \mathrm{Mn}$. bush., or $97 \%$ of prewar. But there are now at least $6 \%$ more mouths to be fed.

The out-turn of maize in 1947, at $4,830 \mathrm{Mn}$. bush., is estimated at about $2 \%$ above the 1935/9 average. The pattern of production in 1947 was surprisingly similar to the pre-war years, the increase being accounted for by a 100 Mn . bush. increase (to $2,546 \mathrm{Mn}$.) in North

## WORLD COMMODITY SURVEY

| $\begin{gathered} \text { Commo- } \\ \text { dity } \end{gathered}$ | Season | Unit | Pre-war base | WORLD PRODUCTION |  |  | WORLD CONSUMPTION |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  | Last season | Last season \% of pre-war | Current season $\%$ of pre-war | Last season | Last season \% of pre-war | Current season \% of pre-war |
| Wheat... | All crops harvested in calendar year | Mn. bush. of 60 lb . | $\begin{gathered} \text { Average } \\ 1935-9 \end{gathered}$ | 5,790 | 97 | (100) | n.a. | - | - |
| Fats and Oils | Calendar year | 000 tons | $\begin{aligned} & \text { Average } \\ & 1935-9 \end{aligned}$ | $\begin{gathered} 17,700 \\ \text { (oil equiv.) } \end{gathered}$ | 92 | n.a. | n.a. | - | - |
| Sugar ... | Begins Sept. | 000 tons | 1937-8 | $\begin{gathered} 25,977 \\ \text { (raw value) } \end{gathered}$ | 89 | 95 | $\begin{gathered} 24,556 \\ \text { (raw value) } \end{gathered}$ | 86 | (90) |
| Tea . | Calendar year | Mn. lb. | $\begin{gathered} \text { Average } \\ 1936-8 \end{gathered}$ | $\begin{gathered} 774 \\ \text { (exports) } \end{gathered}$ | 87 | n.a. | 774 <br> (absorption excl. local produce) | 87 | n.a. |
| Coffee ... | Begins July | Mn. bags of 132 lbs . | $\begin{aligned} & \text { Av. 1935/6 } \\ & \text { to } 1939 / 40 \end{aligned}$ | $\begin{gathered} 28.8 \\ \text { (exportable) } \end{gathered}$ | 81 | n.a. | $29 \cdot 6$ (in 1948) | n.a. | n.a. |
| Cocoa ... | Begins October | 000 tons | $\begin{aligned} & \text { Av. } 1935 / 6 \\ & \text { to } 1938 / 9 \end{aligned}$ | 630 | 92 | 94 | (630) | (95) | (97) |
| Cotton... | Begins <br> August | Mn . bales ( 480 lb . net) | $\begin{aligned} & \text { Av. } 1935 / 6 \\ & \text { to } 1939 / 40 \end{aligned}$ | $24 \cdot 9$ (m) | 81 | n.a. | $28 \cdot 1$ | (100) | n.a. |
| Wool (apparel) | Begins July (d) | Mn. lb. (greasy) | $\begin{aligned} & \text { Av. } 1935 / 6 \\ & \text { to } 1938 / 9 \end{aligned}$ | 2,900 | 99 | n.a. | 3,400 | 110 | n.a. |
| Jute . | Begins July | 000 tons | $\begin{aligned} & \text { Av. } 1934 / 5 \\ & \text { to } 1938 / 9 \end{aligned}$ | 1,400 (n) | 82 | n.a. | n.a. | - | - |
| Sisal . | Calendar year | 000 tons | $\begin{gathered} \text { Average } \\ 1934-8 \end{gathered}$ | 210 (o) | 88 | (92) | n.a. | - | - |
| Rubber... | Calendar year | 000 tons | $\begin{gathered} \text { Average } \\ 1936-9 \end{gathered}$ | $\begin{gathered} 1,820 \text { incl. } 1,260 \\ \text { natural } \end{gathered}$ | 175 | (185) | $\begin{aligned} & 1,725, \text { incl. } 1,100 \\ & \text { natural } \end{aligned}$ | 155 | (157) |
| Copper... | Calendar year | 000 tons | $\begin{gathered} \text { Average } \\ 1937.8 \end{gathered}$ | 2,130 (primary) | 100 | (113) | n.a. | - | - |
| Lead | Calendar year | 000 tons | 1938 | 1,280 | 78 | n.a. | n.a. | - | - |
| Tin | Calendar year | 000 tons | $\begin{gathered} \text { Average } \\ 1936.8 \end{gathered}$ | 113.5 (in ore) | 64 | n.a. | 132.4 | 77 | n.a. |
| Zinc . | Calendar year | 000 tons | $\begin{gathered} \text { Average } \\ 1934-8 \end{gathered}$ | 1,450 | 109 | n.a. | n.a. | - | - |

[^46]
(f) Average 1934-38. (g) Price ratios are in terms of the currency in which quoted; the corresponding sterling ratios are added marked (g), where necessary. (h) \% of early 1939. (j) \% of 1937 . (k) \% of average 1934-8 for London sales. (l) Including some now used as a source of fats. (m) season 1947-48. (n) excluding additions to up-country stocks. (o) The total world production of hard fibres may be estimated as about 450,000 tons for both 1947 and 1948.

American production, obtained from an area smaller by $7 \%$. But 1947 maize production was $9 \%$ less than that of 1946, the fall in U.S. production between the two years being estimated at 850 Mn . bush., from $3,250 \mathrm{Mn}$. to $2,400 \mathrm{Mn}$.

North America and Europe, including Russia, account for most of the production of oats, estimated for 1947 at $3,740 \mathrm{Mn}$. bush., or $5 \%$ less than the previous year and $14 \%$ less than the 1935/9 average. The familiar picture of an increased production in North America, more than offset by a fall in European crops, is repeated here. The same pattern is presented by barley, though here Asia and North Africa are important producers. The 1947 production, 2,165 Mn. bush., was about $9 \%$ less than pre-war, and $4 \%$ more than in 1946.

More than half the world's rye is produced in the U.S.S.R., most of the rest being in Eastern Europe; estimates for this crop are therefore very difficult to make, but the Office of Foreign Agricultural Relations suggests a figure of $1,490 \mathrm{Mn}$. bush. for 1947, or about $14 \%$ less than the 1935/9 average.

Rice
The U.S. Department of Agriculture's estimate of world production of rough rice in the $1947 / 8$ season is $7,086 \mathrm{Mn}$. bush., or $4 \%$ less than the 1935/6-1939/40 average, but $10 \%$ more than the $1945 / 6$ season. Well over $90 \%$ of the world's rice is produced in Asia, India and China each producing over 2 Mn . bush.. Indian production is $7 \%$ above pre-war, but her needs have expanded still more rapidly; the crop in China and Japan is down, but the greatest proportionate reductions are shown by the exporting areas- $23 \%$ in Burma, 34\% in French IndoChina, $34 \%$ in Siam, and $14 \%$ in South Korea. Allowing for the increase in Asiatic populations, it is clear that the world is still a long way from having enough rice. The needs of the nonAsiatic world are being met by a much increased production in North and South America and Africa.

## Coffee

By the courtesy of the Pan-American Coffee Bureau, we have been able to introduce into our table some up-to-date figures for coffee. These relate to " net exportable production "-that is, to production less local consumption ; a concept which at present differs from actual exports by the drawing down of stocks held in the producing countries (largely Brazil). Before the war, however, exportable production differed from
actual exports by the amounts of coffee added to stock or destroyed. The distinction is of importance in the Brazilian figures ; in the five crop-years $1935 / 6$ to 1939/40, Brazilian exportable production averaged 22.6 Mn . bags, but her actual exports averaged only 14.7 Mn . bags. The large fall in exportable production since before the war represents, therefore, not the emergence of scarcity, but the ending of a state of surplus.

In the main the adjustment has been made by Brazil, whose production has fallen almost to the level of her actual exports of the late 1930's. The preponderance of Latin America, and of Brazil within Latin America, is shown by the following table:-

EXPORTABLE PRODUCTION OF COFFEE, 1947-8:
Brazil ... ....
Rest of America...
British East Africa


The other major Latin American producers are Colombia ( 5.5 Mn . bags, against 4 Mn . pre-war), El Salvador ( 1.0 Mn .), Guatemala ( 0.8 Mn .), and Venezuela ( 0.7 Mn .). Two minor pre-war exporters, Cuba and Peru, are now consuming most of their own coffee, and are virtually out of the market.

The African total, at 3.4 Mn . bags, compares with 2.3 Mn . in the pre-war period. Most of the producing areas show a substantially increased production, especially French West Africa, where the rise is from 207,000 bags in $1935 / 9$ to 665,000 last year. It is worth noting, however, that most of the increases reported from Africa have taken place since 1945.

The position in Asia is very different. The Indian export surplus, 155,000 bags before the war, has disappeared. Such data as are available for the Netherlands East Indies show an exportable production in 1947/8 of only 250,000 bags, compared with $1,350,000$ before the war. In the list of coffee producers the N.E.I. has sunk from third to fourteenth place, and her re-entry into the market, as the effects of war damage are overcome, will clearly have an important effect.

The total exportable production in 1947/8 of 28.8 Mn . bags is only $80 \%$ of pre-war, but this reduction is more than accounted for by the pre-war difference between Brazil's production and her actual exports. The 1948 consumption outside producing countries, which has to be set against this, is estimated at 29.6 Mn . bags, the deficit being, of course, met quite easily from stocks. The estimate reveals an almost unparalleled dependence on a single consumer;
more than two-thirds of the world's coffee is now consumed in the United States. This gives a level of consumption of 20 lb . per head per year, against less than $1 \frac{1}{2} \mathrm{lb}$. in Britain. European imports have fallen from an average of 11.3 Mn. bags in $1935 / 9$ to 6.6 Mn . in 1947 ; British imports and consumption have almost doubled, and Belgian imports are substantially higher, but these movements do not offset a $55 \%$ fall in French imports and the disappearance of the German demand. U.S. imports, on the other hand, have risen from a pre-war average of 14 Mn . bags to a peak in 1946 of nearly 21 Mn .; and, after allowing for re-exports and stock changes, consumption in 1947 is believed to have been nearly 21 Mn . bags. A conservative estimate puts U.S. consumption in 1948 at 20 Mn . bags;

European consumption equal to the previous year's imports, at 6.6 Mn . ; and the demand of other countries at 3 Mn .

Green coffee spot prices in New York are around three times pre-war-four times the low level of 1940. The current price for Brazilian Santos No. 4 is about $27 \mathrm{c} . / \mathrm{lb}$., compared with a 1935/9 average of 8.9 c . This price rise is not exceptionally large, but it undoubtedly gives some incentive to increased production. Will a coffee surplus soon re-appear, facing the industry again with the problems so familiar in the 1930's ? Or will the memory of those lean years restrain production, while a recovering European demand pushes sales to new high levels? In a year's time we may begin to see which way the post-war coffee market will take.

\| Approximate before 1924. † Exclusive of Investments in Affliated Banks
$\dagger \dagger$ Not available.

* Minimum rates from 1933.
$\ddagger$ Figures below are quarterly totals in 1946 .

STOCKS \& SHARES-
NEW CAPITAL ISSUES -
BANK OF ENGLAND
PRINCIPAL BANKS

TREASURY BILLS-

Index Nos. of Prices and Yield as percentage of 1924 level; on 15 th of month.
Sensitive Index.-Geometric Mean of monthly percentage changes,
Issues during month in Gt. Britain (a), for U.K. (b), for Abroad, excluding Government loans, etc.-As published
by THE MLDLAND BANK, LTD. Three-months' totals in 1946.
Deposits. 11 - 17 th of month.
Bank Notes and Gurrency Notes in circulation 11th-17th of month. Issues amalgamated, November 22nd, 1928.
Current Deposit and other accounts," etc. Before September, 1939, averages for the month of 9 clearing banks (i.e--excluding the National Bank, Ltd., and the District Bank), afterwards, data for last making up day of the month
From June, 1940, to May, 1946, end of month ; otherwise 11th-17th of month.
Issued by tender. Total of Bills issued by tender during 13 weeks preceding date of Exchequer Return.
Otherwise Issued. Total of Treasury Bills in existence less those issued by tender.
Day-to-Day Rate and $\mathbf{3}$ Month' Rate. Averages for week ending 15 th of month.

| WHOLESALE. |  |  |  |  |  |  |  |  | RETAIL. |  |  | WAGES |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Monthly Averages or Months. | Price of Gold. <br> s. per fine oz. | Bar Silver (Cash). <br> d. per oz. | Board of Trade Index Nos. Materials, General. Food. ete. Per Cent, of 1924. |  |  | Statist (Sauerbeek) <br> Index Nos. Raw <br> Food. Materials. Total <br> Per Cent, of 1924. |  |  | Cost of Living. Per | of Labou <br> Food. <br> Cent, of 1 | Rent. <br> 924. | $\begin{aligned} & \text { Index } \\ & \text { of Average } \\ & \text { Weekly } \\ & \text { Wage-Rates. } \\ & \text { \% of Dec. } \\ & 1924 . \end{aligned}$ |
| 1913 Av....... | 84.75 |  | 60 | 60 | 60 | 59 | $62 \cdot 5$ | 61 | 57 | 59 | 68 | $63 \ddagger$ |
| 1919 Av. | $90 \cdot 33$ | 57 |  |  | - | 142 | 152 | 148 | 123 | 129 | 71 | 110 |
| 1920 Av | 112.0 | 61.4 | 185.0 | 163.6 | 198.0 | 180 | 181 | 180.5 | 142 | 150 | 82 | 130 |
| 1921 Av . | 107.0 | 36.9 | 118.3 | 125.7 | 115.5 | 121.5 | 105 | 111.5 | 129 | 135 | 101 | 143 |
| 1922 Av . | 89.5 | 344 | $95 \cdot 6$ | $99 \cdot 3$ | 93.6 | 100 | $90 \cdot 5$ | 94 | 105 | 103 | 104 | 110 |
| 1923 Av. | 90.25 | 319 | $95 \cdot 6$ | $93 \cdot 0$ | $97 \cdot 2$ | 94 | 91 | 93 | 99 | 99 | 101 | 98 |
| 1924 Av . | $93 \cdot 62$ | 34 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 |
| 1925 Av . | 85.5 | 321 | $95 \cdot 7$ | $100 \cdot 1$ | $93 \cdot 4$ | 98.5 | 98 | 98 | 101 | 100 | 100 | 10012 |
| 1926 Av. | 84.83 | 28.7 | $89 \cdot 1$ | $93 \cdot 1$ | $87 \cdot 0$ | 91.5 | $89 \cdot 5$ | $90 \cdot 5$ | 98 | 96 | 101 | 100 |
| 1927 Av | , | 26.0 | $85 \cdot 2$ | $91 \cdot 4$ 91.6 | 82.0 80.7 | 87.5 | ${ }_{85}^{88 \cdot 5}$ | 88 86 | ${ }_{95}^{96}$ | 94 | 103 | $100 \frac{1}{2}$ |
| 1928 Av . | " | 26.7 | $84 \cdot 4$ | $91 \cdot 6$ | $80 \cdot 7$ | $87 \cdot 5$ | 85 | 86 | 95 | 92 | 103 |  |
| 1929 Av. | " | $24 \cdot 4$ | $82 \cdot 1$ | 87.4 | $79 \cdot 4$ | $84 \cdot 5$ | 81.5 | 83 | 94 | 90.5 | 104 | $99 \pm$ |
| 1930 Av . |  | 17.7 | 71.9 | $76 \cdot 1$ | $69 \cdot 6$ | 74 | $66 \cdot 5$ | 70 | 90 | 85 | 104 | 988 |
| 1931 Av | $92 \cdot 5$ | $14 \cdot 6$ | $62 \cdot 9$ | $67 \cdot 4$ | ${ }^{60 \cdot 8}$ | 64 | 56 | 59.5 | 84.5 | 77 | 105 | 97 |
| 1932 Av. | 118 | 17.8 | $61 \cdot 3$ | 66.7 | 58.9 | 61 | 55.5 | 57.5 | 82.5 | 74 | 105 | $95 \frac{1}{4}$ |
| 1933 Av . | 124.9 | 18.1 | $61 \cdot 4$ | $63 \cdot 1$ 64.8 | $60 \cdot 7$ | ${ }_{59}^{57}$ | 57 58 | 57 | 79.5 80.5 | $70 \cdot 5$ | 106 | 94 |
| 1934 Av .. | 137.65 | 21.2 29.0 | $63 \cdot 2$ 63.7 | $66 \cdot 0$ | $62 \cdot 7$ | 59 | 61.5 | 61 | 81.5 | 73.5 | 107 | 95 |
| 1936 Av . | $140 \cdot 29$ | $20 \cdot 2$ | $67 \cdot 6$ | 69.9 | 66.7 | 62 | 65 | 64 | 84 | 76.5 | 108 | 972 |
| 1937 Av . | $140 \cdot 76$ | $20 \cdot 1$ | $77 \cdot 9$ | $77 \cdot 8$ | $78 \cdot 0$ | $71 \cdot 5$ | 75 | $73 \cdot 5$ | 88.5 | 82 | 108 | $100 \frac{1}{2}$ |
| 1938 Av . | 142-5 | 19.5 | $72 \cdot 6$ | $74 \cdot 1$ | $72 \cdot 1$ | 65 | 66 | $65 \cdot 5$ | 89 | 82 | 109 | $104 t$ |
| 1939 Av. | 154 | 20.5 | 73.6 | $74 \cdot 1$ | $73 \cdot 4$ | 65 | 72 | 69 | 91 | 83.5 | 110 | 1054 |
| 1940 Av. | 168 | $22 \cdot 2$ | 97.8 | $101 \cdot 0$ | 96.3 | 86 | 96.5 | 93 | $100 \cdot 5$ | 97 | 111 | 117 |
| 1941 Av. | 168 | $23 \cdot 4$ | $109 \cdot 3$ | 111.1 | 108.4 | 96.5 | 106 | $102 \cdot 5$ | 113.5 | 98.5 | 112 | 127 |
| 1942 Av.. | 168 | $23 \cdot 5$ | 114.2 | 119.8 | 111.4 | 108.5 | 109.5 | $109 \cdot 5$ | 114 | 95 | 112 | $136 t$ |
| 1943 Av. | 168 | $23 \cdot 5$ | 116.6 | $121 \cdot 6$ | 114.1 | 106.5 | 1130 | 111 | 113.5 | ${ }_{99}^{97.5}$ | 112 | 144 |
| 1944 Av. | 168 $170 \cdot 5$ | 23.5 $30 \cdot 1$ | 119.0 121.0 | $120 \cdot 1$ 120.2 | 121.4 | 107 | 124 | 117 | 116 | 99.5 | 112.5 | $160 \frac{1}{2}$ |
| 1946 Av.. | 172-25 | $48 \cdot 8$ | 125.5 | $120 \cdot 3$ | 128.2 | 107.5 | $140 \cdot 5$ | 128 | 116 | 99 | 116 | 174 |
| 1947 Av . | $172 \cdot 25$ | $64 \cdot 5$ | $137 \cdot 3$ | $125 \cdot 2$ | $144 \cdot 1$ | 116.5 | 190 | $160 \cdot 5$ | 116/102 | 95.5/101 | 116/100 | 1802 |
| 1946 JAN. | 172.25 | 44 | 123.2 | 119.8 | $124 \cdot 9$ | 107 | 126.5 | 119 | $11{ }^{\text {§ }}$ | 99 | $\stackrel{8}{113}$ | 1687 |
| FEB. | $172 \cdot 25$ | 44 | $123 \cdot 0$ | 119.8 | $124 \cdot 7$ | $107 \cdot 5$ | 127 | 119.5 | 116 | 99 | 113 | 170 |
| MAR. | $172 \cdot 25$ | 44 | 123.2 | $120 \cdot 4$ | 124.7 | $107 \cdot 5$ | 127.5 | 120 | 116 | 99 | 113 | 170 |
| APR. | $172 \cdot 25$ | 44 | 123.7 | $120 \cdot 6$ | 125.2 | 108 | 129.5 | 121 | 116.5 | 99 | 114 | 1739 |
| MAY | 172.25 172.25 | 44 44 | $124 \cdot 0$ $124 \cdot 1$ | 120.8 120.6 | $125 \cdot 7$ 126.1 | 107.5 107.5 | ${ }_{131}^{130 \cdot 5}$ | 122 122 | 116 117 | 99 100.5 | 114 114 | 175 175 |
| JUNE. | 172.25 | 44 | $124 \cdot 1$ | $120 \cdot 6$ | 126.1 | $107 \cdot 5$ | 131 |  |  |  |  |  |
| JULY | $172 \cdot 25$ | 44 | 126.4 | 122.4 | 128.6 | 109 | $135 \cdot 5$ | 125.5 | 117 | $100 \cdot 5$ | 114 | $176 \pm$ |
| AUG. | $172 \cdot 25$ | 55.5* | 126.6 | 121.1 | 129.6 | 107 | 138 | $126 \cdot 5$ | 116 | ${ }_{98.5}^{98 \cdot 5}$ | 114 | 1768 |
| SEPT | $172 \cdot 25$ | $55 \cdot 5$ | 127.0 | $120 \cdot 4$ | $130 \cdot 7$ | 107.5 | ${ }_{162.5}^{144}$ | 1314 | 116 116 | 98.5 98.5 | 114 | 1777 |
| OCT. | 172.25 | ${ }_{55}^{55 \cdot 5}$ | 127.2 128.2 | 119.6 119.2 | $131 \cdot 4$ | 108 | ${ }_{165 \cdot 5}^{162.5}$ | 142.5 | ${ }_{116} 116$ | ${ }_{98.5}^{98}$ | 114 | 178 |
| DEC. | 172.25 | ${ }_{55 \cdot 5}$ | 128.9 | 118.9 | $134 \cdot 3$ | 108 | 167.5 | 144 | 116.5 | 98.5 | 114 | $178 \pm$ |
| 1947 |  |  | $130 \cdot 1$ | $119 \cdot 2$ | 136.2 | 109 | 174 | 148.5 | 116 | 98.5 | 114 | $178 \pm$ |
| JAN. | $172 \cdot 25$ 172.25 | 44** | 131.2 | $120 \cdot 3$ | 137.2 | 109 | $177 \cdot 5$ | 151 | 116.5 |  | 114 | $178 \pm$ |
| MAR. | 172.25 | 46 | 131.5 | $120 \cdot 5$ | 137.5 | 109 | 180.5 | 152.5 | 116 | 98.5 | 114 | $178 \pm$ |
| APR. | $172 \cdot 25$ | 46 | 134.0 | 124.3 | 139.3 | 110 | 184.5 | $155 \cdot 5$ | 116 | ${ }_{94.5}^{95}$ | 118 | 1781 1781 |
| MAY | 172.25 | ${ }_{43}^{44 \cdot 25}$ | 135.5 136.0 | $125 \cdot 3$ 126.1 | 141.0 141.4 | $109 \cdot 5$ 114.5 | $185 \cdot 5$ 184 | 156 157 | 116 $116 \dagger$ | ${ }_{94 \cdot 5 \dagger}^{94 \cdot 5}$ | $119 \dagger$ | 178 ${ }^{\frac{1}{2}}$ |
| JUNE | $172 \cdot 25$ | 43 | 136.0 | 126.1 | $141 \cdot 4$ | 114.5 |  |  |  |  |  |  |
| JULY | 172.25 | 39.75 | 138.5 | 127.8 | 144.3 | 117.5 | 188.5 | 160.5 | 101 | 101 | 100 100 | 1797 |
| AUG. | 172.25 | $39 \cdot 75$ | 138.9 | $127 \cdot 0$ | 145.5 | 119.5 119.5 | 190 194 | $162 \cdot 5$ $164 \cdot 5$ | 100 | 99 100 | 100 | 181 |
| SEPT | $172 \cdot 25$ | $42 \cdot 75$ |  |  |  | 121 | ${ }_{201}^{194}$ | 170 | 101 | 101 | 100 | 181 |
| OCT. | 172.25 | ${ }_{45}^{43 \cdot 25}$ | $142 \cdot 8$ 145.2 | 127.2 129.8 | 151.6 153.9 | 123 | 205.5 | 173 | 103 | 103 | 100 | $186 \frac{1}{4}$ |
| NOV. | $172 \cdot 25$ $172 \cdot 25$ | 45 | 145.8 | $130 \cdot 6$ | $154 \cdot 2$ | 123.5 | 212 | 177.5 | 104 | 103 | 100 | 186 ${ }^{\frac{1}{4}}$ |
| 1948 | 172.25 | 45 |  | 132.3 | 163.2 | 1251 | 216 | 180 | 104 | 104 | 100 | $188 \pm$ |
| FEB. | 172.25 | 45 | 155.1 | 137.6 | 165.2 | 127.5 | $217 \cdot 5$ | $182 \cdot 5$ | 106 | 108 | 100 | 90. |
| MAR. | $172 \cdot 25$ | 45 | 155.5 | 137.4 | 166.0 | 130 | 219 | 184 | 106 | 109 | 100 99 | 1919 |
| APR. | 172.25 | 45 | 157.2 157.9 | 138.5 138.6 | 167.7 169.0 | 129 | ${ }_{224}^{220}$ | ${ }_{187}^{184 \cdot 5}$ | 108 | 108 | 99 | 192 |
| MUNE.......... | 172.25 | 45 | 159.2 | $140 \cdot 2$ | 170.0 | 134 | 225 | 190 | 110 | 113.5 | 99 | $192 \pm$ |
| JULY........ | 172.25 | 45 |  |  |  |  |  |  |  |  |  | 1923 |

PRICE OF GOLD-
bOARD OF TRADE INDEX -
STATIST (SAUERBECK) cost of living index-

Annual averages of London dally rates. From Sept. 1939, Bank of England official rate.
Average (cash) price of bar silver; to Dec. 1944, Standard (.925 (average for month) of 200 commodities as percentage of 1924 average; Geometric Mean of Wholesale Prices (average for month) of 200 commo
Wholesale prices of 19 foodstuffs and 26 raw materials on ast day of month.-STATIST.
Wholesale prices of 19 foodstuirs and 26 raw mater 1924 in cost of maintaining unchanged the standard of Ministry of Labour's index showing movement ing Aug., 1914. For 1st of month, but placed against previous donth, e.g., reading for March ist is shown against February. Series ended June, 1947. See note $\dagger$ above. As above, for food only and for rent and rates.
For description see Sp. Memo No, 28 and Bulletin for Jan., 1944, pp. 6-8.

|  | TOTAL IMPORTS． <br> （Declared Values） |  |  |  |  |  | EXPORTS OF U．K．GOODS． <br> （Declared Values） |  |  |  | OUTPUT． |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Monthly <br> Averages or <br> Months． |  |  <br> 会 <br> £ Mn． | Manufactures． <br> £ Mn |  |  |  |  <br> 卷$\circ$ <br> 0 <br> 0 <br> 0 <br>  $£ \mathrm{Mn}$ ． | Materials． $\begin{aligned} & \text { B } \\ & \text { ~ } \\ & \text { H } \end{aligned}$ $£ \mathrm{Mn} .$ | $£ \mathrm{Mn}$ ． |  |  |  |  | Mn． <br> Units | Mn ． <br> lbs． |
| 1913 Av． | $24 \cdot 2$ | 23.5 | 16.1 | $64 \cdot 1$ | $9 \cdot 4$ | 54．7 | 2.7 | 5.8 | 34．3 | 43.8 | 5510 | 197 | 147 |  |  |
| 1919 Av． | $\left\{\begin{array}{l}58.9 \\ 59.9\end{array}\right.$ | $53 \cdot 9$ $50 \cdot 6$ | $\left.\begin{array}{l}22 \cdot 2 \\ 24 \cdot 7\end{array}\right\}$ | $\ddagger 135 \cdot 6$ | 13.7 | 121.9 | $\left\{\begin{array}{l}2.8 \\ 2.8\end{array}\right.$ | 10.1 $9 \cdot 3$ | 52.7 53.5 | $\ddagger 66.6$ | 4401 | 142 | 151 |  |  |
| 1920 Av ． | 63.8 | 59.2 | 37.8 | 161.2 | $19 \cdot 0$ | 142.2 | $4 \cdot 2$ | $12 \cdot 1$ | 93.4 | 111.2 | 4386 | 154 | 173 |  |  |
| 1921 Av ． | $47 \cdot 3$ | $22 \cdot 6$ | $20 \cdot 4$ | $90 \cdot 5$ | $8 \cdot 9$ | $81 \cdot 6$ | $3 \cdot 1$ | $5 \cdot 3$ | $49 \cdot 1$ | 58.6 | 3127 | 50 | 71 |  |  |
| 1922 Av ． | $39 \cdot 3$ | $24 \cdot 9$ | $19 \cdot 1$ | $83 \cdot 6$ | $8 \cdot 6$ | 75.0 | $3 \cdot 0$ | $8 \cdot 5$ | 47－4 | $60 \cdot 0$ | 4787 | 94 | 113 |  |  |
| 1923 Av ． | $42 \cdot 4$ | $27 \cdot 1$ | $21 \cdot 4$ | 91.4 | $9 \cdot 9$ | 81.5 | 3.7 | 10.9 | $48 \cdot 3$ | $64 \cdot 0$ | 5293 | 143 | 163 |  |  |
| 1924 Av ． | $47 \cdot 6$ | $33 \cdot 4$ | $24 \cdot 9$ | 106.4 | 11.7 | 94.7 | $4 \cdot 7$ | 8.9 | $51 \cdot 7$ | 66．8 | 5110 | 140 | 157 142 | 508 555 |  |
| 1925 Av ． | $47 \cdot 5$ | $35 \cdot 5$ | $26 \cdot 6$ | $110 \cdot 1$ | 12.8 | 97.3 | $4 \cdot 5$ | $7 \cdot 0$ | 51.5 | 64.5 | 4660 | 120 | 142 | 555 |  |
| 1926 Av． | $44 \cdot 2$ | $32 \cdot 8$ | $26 \cdot 2$ | 103.4 | 10.5 | $92 \cdot 9$ | $4 \cdot 1$ $4 \cdot 3$ | 3.9 6.4 | $45 \cdot 0$ | 54.4 59.1 | 2420 4813 | 47 140 | 69 174 | 587 686 | $2 \cdot 2$ $3 \cdot 3$ |
| 1927 Av ． 1928 Av ． | $44 \cdot 9$ $44 \cdot 25$ | $29 \cdot 4$ $28 \cdot 0$ | $26 \cdot 8$ 26.4 | 101.5 99.7 | 10.3 10.0 | $91 \cdot 2$ $89 \cdot 7$ | $4 \cdot 3$ $4 \cdot 4$ | $6 \cdot 4$ $5 \cdot 85$ | $47 \cdot 1$ $48 \cdot 3$ | $59 \cdot 1$ $60 \cdot 3$ | 4813 4540 | 140 | 174 163 | 686 756 | 3.3 4.4 |
| 1929 Av ． | $44 \cdot 6$ | $28 \cdot 4$ | $27 \cdot 8$ | 101.8 | $9 \cdot 1$ | 92.7 | $4 \cdot 6$ | $6 \cdot 6$ | $47 \cdot 9$ | 60.8 | 4944 | 145 | 185 | 858 | 4.7 |
| 1930 Av ． | $39 \cdot 6$ | $20 \cdot 9$ | $25 \cdot 6$ | $87 \cdot 0$ | $7 \cdot 2$ | $79 \cdot 8$ | $3 \cdot 9$ | $5 \cdot 3$ | $36 \cdot 8$ | $47 \cdot 6$ | 4677 | 119 | 141 | 909 | $4 \cdot 0$ |
| 1931 Av ． | $34 \cdot 7$ | 14.5 | 21.8 | 71.8 | $5 \cdot 3$ | 66.5 | $2 \cdot 9$ | $3 \cdot 9$ | $24 \cdot 4$ | $32 \cdot 6$ | 4207 | 72 | 100 | 951 | $4 \cdot 6$ |
| 1932 Av ． | 31.1 | 13.8 | $13 \cdot 1$ | 58.5 | $4 \cdot 3$ | $54 \cdot 2$ | $2 \cdot 6$ | $3 \cdot 6$ | 23.0 | 30.4 | 3990 | 68 | 101 | 1020 | 6.0 |
| 1933 Av． | 28.3 | $15 \cdot 1$ | 12.5 | $56 \cdot 3$ | $4 \cdot 1$ | 52.2 | $2 \cdot 3$ | 3.8 | 23.5 | 30.7 | 3970 | 79 | 135 | 1130 | $7 \cdot 1$ |
| 1934 Av． | 28.9 | 17.5 | $14 \cdot 2$ | $61 \cdot 0$ | $4 \cdot 3$ | 56.7 | $2 \cdot 5$ | $4 \cdot 0$ | $25 \cdot 4$ | 33.0 | 4230 | 114 | 170 | 1289 | $7 \cdot 7$ |
| 1935 Av ． | $29 \cdot 6$ | $17 \cdot 7$ | $15 \cdot 4$ | $63 \cdot 0$ | $4 \cdot 6$ | 58.4 | $2 \cdot 6$ | $4 \cdot 4$ | $27 \cdot 4$ | 35.5 | 4262 | 123 | 189 | 1464 | $9 \cdot 9$ |
| 1936 Av． | 31.8 | $20 \cdot 7$ | $17 \cdot 7$ | $70 \cdot 7$ | $5 \cdot 1$ | $65 \cdot 6$ | $3 \cdot 0$ | $4 \cdot 3$ | $28 \cdot 4$ | 36.7 | 4369 | 148 | 225 | 1685 | 11.6 |
| 1937 Av ． | 35.9 | $26 \cdot 3$ | 22.9 | $85 \cdot 7$ | 6．3 | 79.4 | $3 \cdot 2$ | $5 \cdot 4$ | 33.7 | 43.5 | 4610 | 163 | 249 | 1909 | $12 \cdot 4$ |
| 1938 Av． | $35 \cdot 8$ | $20 \cdot 7$ | 19.5 | $76 \cdot 6$ | $5 \cdot 1$ | $71 \cdot 5$ | $3 \cdot 0$ | $4 \cdot 7$ | $30 \cdot 4$ | $39 \cdot 2$ | 4353 | 130 | 199 | 2031 | 11.2 |
| 1939 Av ． | $33 \cdot 2$ | $20 \cdot 1$ | 19.9 | 73.8 | $3 \cdot 8$ | 70.0 | 3.0 | $4 \cdot 5$ | 28.2 | $36 \cdot 6$ | 4437 | 153 | 253 | 2201 | $14 \cdot 2$ |
| 1940 Av． | $35 \cdot 0$ | $28 \cdot 2$ | 26.5 | $90 \cdot 2$ | $2 \cdot 2$ | 88.0 | $2 \cdot 8$ | $2 \cdot 0$ | $26 \cdot 3$ | 32.7 | 4290 | 157 | 248 | 2398 | $14 \cdot 1$ |
| 1941 Av． | $35 \cdot 2$ | 18.9 | $27 \cdot 4$ | $82 \cdot 2$ | $0 \cdot 7$ | 81.5 | $2 \cdot 6$ | 1.3 | 22.9 | 27.0 | 3957 | 142 | 236 | 2697 | 11.4 |
| 1942 Av ． | $36 \cdot 3$ | $18 \cdot 7$ | 26.0 | 83.0 | 0.4 | 82.6 | 1.5 | 0.8 | $19 \cdot 7$ | $22 \cdot 6$ | 3930 | 146 | 244 | 2971 | 10．1 |
| 1943 Av． | $42 \cdot 8$ | $21 \cdot 9$ | 36.8 | 102.8 | $0 \cdot 5$ | $102 \cdot 3$ | $1 \cdot 6$ | 0.8 | 16.7 | 19.4 | 3815 | 138 | 251 | 3079 | 10.2 |
| 1994 Av ． | $43 \cdot 3$ | $23 \cdot 3$ | $39 \cdot 8$ | 108.9 | $1 \cdot 3$ | $107 \cdot 6$ | $1 \cdot 9$ | 0.7 | $19 \cdot 0$ | $22 \cdot 1$ | 3688 | 130 | 234 | 3196 | 10.9 |
| 1945 Av． | $40 \cdot 8$ | 24.5 | $25 \cdot 1$ | $92 \cdot 0$ | $4 \cdot 2$ | 87.8 | $4 \cdot 6$ | $1 \cdot 3$ | $25 \cdot 6$ | $33 \cdot 3$ | 3506 | 137 | 227 | 3107 | 11.5 |
| 1946 Av ． | $53 \cdot 1$ | 32.5 | $20 \cdot 4$ | 108.4 | $4 \cdot 2$ | $104 \cdot 2$ | $5 \cdot 3$ | $2 \cdot 7$ | $65 \cdot 5$ | $76 \cdot 2$ | 3646 | 149 | 244 | 3437 | $14 \cdot 9$ |
| $\begin{gathered} 1947 \mathrm{Av} \text {. } \\ 1946 \end{gathered}$ | $67 \cdot 1$ | 46.7 | $33 \cdot 3$ | $149 \cdot 0$ | $4 \cdot 9$ | 146．1 | $5 \cdot 4$ | $2 \cdot 9$ | $83 \cdot 2$ | $94 \cdot 8$ | 3782 | 147 | 240 | 3548 | 16.9 |
| JAN． | 48.4 | $27 \cdot 5$ | $17 \cdot 1$ | $96 \cdot 2$ | $4 \cdot 2$ | 92.0 | $5 \cdot 4$ | $2 \cdot 4$ | $46 \cdot 2$ | 57.2 | 3410 | 144 | 229 | 4142 | $14 \cdot 3$ |
| FEB． | $37 \cdot 5$ | $24 \cdot 0$ | $15 \cdot 9$ | $79 \cdot 4$ | $3 \cdot 7$ | $75 \cdot 7$ | $4 \cdot 6$ | $2 \cdot 6$ | $50 \cdot 2$ | $60 \cdot 1$ | 3607 | 146 | 247 | 3462 | 13.4 |
| MAR． | $54 \cdot 9$ | 28.0 | $18 \cdot 1$ | $103 \cdot 8$ | $4 \cdot 6$ | $99 \cdot 2$ | $5 \cdot 9$ | $3 \cdot 1$ | 56.3 | 67.8 | 3772 | 147 | 256 | 3820 | $14 \cdot 8$ |
| APRIL | $49 \cdot 9$ | $28 \cdot 6$ | $17 \cdot 3$ | 98.3 | $3 \cdot 8$ | $94 \cdot 5$ | $6 \cdot 0$ | $3 \cdot 2$ | $59 \cdot 4$ | 70.9 | 3440 | 149 | 252 | 3057 | 13.9 |
| MAY | $57 \cdot 3$ | $37 \cdot 4$ | $19 \cdot 2$ | 116.4 | $3 \cdot 6$ | 112.8 | $6 \cdot 9$ | $3 \cdot 0$ | $74 \cdot 3$ | $86 \cdot 1$ | 3920 | 151 | 262 | 3237 | 16.0 |
| JUNE | $53 \cdot 3$ | $27 \cdot 7$ | $19 \cdot 6$ | $102 \cdot 9$ | 3.7 | $99 \cdot 2$ | $4 \cdot 2$ | $2 \cdot 1$ | $57 \cdot 0$ | $65 \cdot 4$ | 3587 | 151 | 240 | 2762 | $12 \cdot 9$ |
| JULY | $46 \cdot 6$ | $31 \cdot 2$ | $21 \cdot 6$ | $101 \cdot 4$ | $4 \cdot 4$ | 97.0 | $7 \cdot 1$ | $2 \cdot 9$ | $78 \cdot 6$ | 90.8 | 3491 | 147 | 226 | 2765 | $15 \cdot 6$ |
| AUG． | 64.0 | $32 \cdot 8$ | 22.0 | $121 \cdot 1$ | $4 \cdot 9$ | $116 \cdot 1$ | $5 \cdot 0$ | $2 \cdot 6$ | $67 \cdot 7$ | $77 \cdot 4$ | 3065 | 145 | 226 | 2847 | $12 \cdot 9$ |
| SEPT． | 51.3 | $30 \cdot 3$ | $22 \cdot 2$ | 106．2 | $3 \cdot 8$ | 102.4 | 4.3 | 2.0 | $62 \cdot 8$ | $71 \cdot 3$ | 3759 | 147 | 239 | 3105 | 15.5 |
| OCT． | $62 \cdot 4$ | $38 \cdot 8$ | $24 \cdot 1$ | $127 \cdot 5$ | $4 \cdot 0$ | 123.5 | $5 \cdot 4$ | 3.1 | 80.8 | $91 \cdot 4$ | 3891 | 156 | 254 | 3733 | $17 \cdot 4$ |
| NOV． | $57 \cdot 3$ | $40 \cdot 5$ | $24 \cdot 3$ | 124.4 | $4 \cdot 8$ | 119.6 | $4 \cdot 7$ | 3.4 | $80 \cdot 6$ | $91 \cdot 8$ | 3896 | 154 | 264 | 3938 | 16.5 |
| $\begin{aligned} & \text { DEC. } \\ & 1947 \end{aligned}$ | $57 \cdot 0$ | $32 \cdot 5$ | 25.4 | $117 \cdot 0$ | $5 \cdot 2$ | 111.8 | $3 \cdot 9$ | $2 \cdot 5$ | $74 \cdot 2$ | $83 \cdot 6$ | 3629 | 153 | 236 | 4372 | $15 \cdot 3$ |
| JAN． | $61 \cdot 6$ | $35 \cdot 1$ | $22 \cdot 3$ | 121.5 | $5 \cdot 1$ | 116.4 | $4 \cdot 7$ | $3 \cdot 6$ | $80 \cdot 1$ | 91.2 | 3707 | 150 | 240 | 4671 | $17 \cdot 6$ |
| FEB． | 59.2 | $29 \cdot 5$ | $22 \cdot 2$ | 112.8 | $6 \cdot 6$ | 106.2 | 3.7 | $3 \cdot 1$ | 66.8 | $76 \cdot 0$ | 3777 | 126 | 206 | 3681 | $12 \cdot 8$ |
| MAR． | $65 \cdot 1$ | 38.0 | 25.0 | 129.9 | $6 \cdot 4$ | 123.5 | $4 \cdot 5$ | $3 \cdot 3$ | 71.5 | $82 \cdot 6$ | 3844 | 123 | 196 | 3984 | $15 \cdot 9$ |
| APRIL | $71 \cdot 0$ 74.9 | 46.7 43.9 | 27.7 32.4 | 146.8 | 6.7 | $140 \cdot 2$ | $4 \cdot 5$ | $2 \cdot 9$ | 71.8 | 82.4 | 3672 | 139 | 236 | 3387 | $15 \cdot 2$ |
| MAY | $74 \cdot 9$ $70 \cdot 5$ | $43 \cdot 9$ $46 \cdot 1$ | $32 \cdot 4$ $34 \cdot 8$ | $153 \cdot 2$ $154 \cdot 2$ | $7 \cdot 1$ $4 \cdot 1$ | $145 \cdot 6$ $150 \cdot 1$ | 4.4 5.9 | 3.3 2.9 | $79 \cdot 3$ | $89 \cdot 7$ | 3794 | 142 | 244 | 3092 | 16.6 |
| JUNE | $70 \cdot 5$ | $46 \cdot 1$ | $34 \cdot 8$ | $154 \cdot 2$ | $4 \cdot 1$ | $150 \cdot 1$ | $5 \cdot 9$ | $2 \cdot 9$ | $81 \cdot 2$ | $93 \cdot 0$ | 3851 | 144 | 254 | 2842 | 16.8 |
| JULY | 82.0 | 56.4 | $39 \cdot 2$ | $179 \cdot 2$ | $4 \cdot 3$ | 174.9 | $6 \cdot 2$ | $3 \cdot 0$ | $97 \cdot 1$ | $110 \cdot 3$ | 3332 | 143 | 212 | 2866 | 18.2 |
| AUG． | $77 \cdot 0$ | $56 \cdot 6$ | $38 \cdot 3$ | 174.0 | $3 \cdot 6$ | $170 \cdot 4$ | $6 \cdot 1$ | $2 \cdot 9$ | $82 \cdot 1$ | $93 \cdot 6$ | 3344 | 147 | 234 | 2767 | $12 \cdot 9$ |
| SEPT． | 71.5 | $48 \cdot 2$ | $39 \cdot 0$ | $160 \cdot 7$ | $3 \cdot 4$ | $157 \cdot 3$ | $5 \cdot 4$ | $2 \cdot 0$ | 89.0 | $99 \cdot 0$ | 3779 | 150 | 266 | 3150 | 18.7 |
| OCT． | $68 \cdot 5$ $51 \cdot 7$ | $48 \cdot 9$ 46.2 | $41 \cdot 8$ | $161 \cdot 4$ | $4 \cdot 0$ | $157 \cdot 4$ | $5 \cdot 9$ | 2.2 | $96 \cdot 8$ | 108.2 | 4021 | 161 | 275 | 3725 | $20 \cdot 1$ |
| DEC． | $51 \cdot 7$ $62 \cdot 3$ | $46 \cdot 2$ 50.5 | $38 \cdot 5$ $39 \cdot 0$ | 138.2 153.4 | $4 \cdot 0$ | 134.2 | 6.6 6.8 | $2 \cdot 4$ | $89 \cdot 8$ | 102.3 | 4254 | 166 | 273 | 3983 | $18 \cdot 3$ |
| 1948 | 623 | 50. | $30^{\circ}$ | $153 \cdot 4$ | 4.0 | $149 \cdot 4$ | 6.8 | $2 \cdot 7$ | $94 \cdot 7$ | $110 \cdot 2$ | 3790 | 165 | 243 | 4432 | $19 \cdot 2$ |
| JAN． | 68.7 | 51.7 | 39.2 | $161 \cdot 8$ | $5 \cdot 4$ | 156.4 | $8 \cdot 2$ | $3 \cdot 5$ | 104．2 | 119.5 | 4110 | 168 | 281 | 4541 | $19 \cdot 6$ |
| FEB． | 57.8 80.9 | $51 \cdot 8$ | 35.9 | 148.1 | $3 \cdot 9$ | $144 \cdot 2$ | $7 \cdot 1$ | $4 \cdot 2$ | 97.7 | 112.9 | 4100 | 176 | 289 | 4227 | 18.8 |
| MAR． | $80 \cdot 9$ $75 \cdot 5$ | $53 \cdot 2$ $64 \cdot 8$ | $41 \cdot 9$ $44 \cdot 2$ | 178.2 | $6 \cdot 1$ | $172 \cdot 1$ | $7 \cdot 6$ | $3 \cdot 9$ | $105 \cdot 8$ | 121.0 | 3908 | 179 | 291 | 3959 | $19 \cdot 7$ |
| APR． | $75 \cdot 5$ 73.9 | $64 \cdot 8$ 58.9 | $44 \cdot 2$ $40 \cdot 7$ | 186.2 176.0 | $5 \cdot 3$ $5 \cdot 6$ | $180 \cdot 8$ | $8 \cdot 3$ | $5 \cdot 0$ | 109．7 | 126.4 | 4247 | 181 | 294 | 3744 | $19 \cdot 6$ |
| JUNE． | 71.8 | $60 \cdot 7$ | $42 \cdot 6$ | $176 \cdot 0$ $177 \cdot 1$ | $5 \cdot 6$ $4 \cdot 8$ | $170 \cdot 4$ $172 \cdot 3$ | $8 \cdot 1$ $8 \cdot 3$ | 6.1 6.7 | 112．5 | 129.9 | 3927 | 184 | 293 | 3482 | $18 \cdot 3$ |
| JULY |  |  |  |  | 4.8 | $172 \cdot 3$ | $8 \cdot 3$ | $6 \cdot 7$ | $115 \cdot 2$ | $134 \cdot 0$ | 4195 3526 | 181 | 297 232 | 3379 | 20.0 |

$\ddagger$ Change in classification in 1919．Italice as in 1913 ．
EXTERNAL TRADE．－Excluding Munitions from 1940－5．Accounts of Trade of U．K．－Board of Trade．
COAL．－Output of Saleable Coal，including opencast，Gt．Britain－Ministry of Fuel．
IRON AND STEEL．－Output of Pig Iron，Steel Ingots and Castings－Iron and Steel Control．
ELECTRICITY．－Before Apr．1948，units generated by Authorised Undertakers，Great Britain－Electricity Commission． Thereafter stations controlled by Brit．Elect．Authority and N．of Scotland Hydro－eleet．Bd．－Ministry of Fuel． Monthly Totals．Gross weight（excise returns）to December，1934．Subsequently delivered weight（i．e．，ex waste）－Board of Trade．


RETAIL SALES.-Index of value of sales in Departmental Stores, Co-operatives, multiple and independent shops. Each index is based on average daily sales during the whole of 1942 for the category to which it relates. Index numbers re derived from the percentage movements of the dally sales for any month as compared with the corresponding month of the previous Journal, April 1st, 1944, and April 19th, 1947.-BANK OF ENGLAND.

## THE FIRST HALF OF 1948 IN THE U.S.A.

Fuly 2nd, 1948
By A. G. Hart, Columbia University.
The first half of 1948 was again an interval of full employment shadowed by fears of a downturn. A sharp break in the prices of speculative commodities early in the year checked the inflationary process, and also such political moves as were under way for its correction. The " third round " of wage increases, though more modest than its predecessors, is enough to ensure further rises of industrial prices; but good crop prospects give hope that once increased feed supplies filter through the livestock-feeding process (which takes a year or so) food prices may subside.

Production and Employment.-Unemployment at its seasonal winter peak about matched that of the winter months in 1946 and 1947, just passing 2.5 Mn ., but fell off again during the spring. Non-agricultural civilian employment in May was 50.8 Mn ., compared with 49.4 Mn . in May, 1947-a gain of 3\%. Several hundred thousand coal miners (temporarily) and packinghouse workers were on strike during the spring, and the coal stoppage made a perceptible dent in the production curves for iron and steel and their products-but not on the scale of the 1946 strikes.

Comparisons of industrial production and man-hours again give a rather bleak picture. For manufacturing as a whole, output in the first quarter of 1948, outpaced man-hour input by only $\frac{1}{2} \%$ since the first quarter of 1947 ; and in building-material industries (lumber, stone, clay and glass products), there were serious losses. The national product figures also point to little progress. Consumer expenditures rose $10 \%$ from the first-quarter 1947 to first-quarter of 1948, and consumers' prices $9 \%$; while their share in current dollar "gross national product" rose from $70 \%$ to $71 \%$. The gain in product seems to fall short of the growth of the working force.

Wages and Prices.-The "pattern" for wage changes in 1948 will apparently be less uniform than in the last two years. A few unions have settled for unchanged wages. In the Chrysler settlement, the auto-workers have broken precedent by accepting a two-way cost-of-living-adjustment clause. Increases around 10 cents per hour may perhaps be taken as average. The crucial coal wage is under negotiation as this is written, however ; and railway wages may offer surprises.

The break in prices carried the composite
price for all grades of maize down from $\$ 2.58$ for January, to $\$ 2.15$ for February, and the wheat composite from $\$ 3.15$ to $\$ 2.68$. Livestock prices also fell, so that the hog-corn ratio rose only from 10.9 to 11.2 bushels of maize per hundredweight of live hogs. Retail food prices dropped about $4 \%$ from January to March. This timely drop, together with the continuation of rent control, made possible the relatively modest rise of wages. The packing-house strike (though far from general) cut meat supplies and pushed up prices during the spring; and the dent in the meat supply resulting from the partial crop failure of 1946 is just ready to show itself. Prospective increases in world crops in 1948 will presumably come through into American living costs sometime in 1949.

From $175 \%$ of 1935-9, at the end of 1946, wholesale prices rose to $203 \%$ at the end of 1947 ; monthly averages for the first half of 1948 ranged from 200 to $206 \%$. For the index of consumers' prices, the level at the end of 1946 was 153, at the end of 1947, 167 ; the range for the first half of 1948 from 167 to about 170 . In both cases, the non-food components kept on rising in the spring of 1948 ; though some wholesaleprice groupings dropped temporarily at the time speculative commodity markets broke.

Money and Finance.-The non-bank public's cash holdings fell off during the half-year as in early 1947, and for the same reason. In early 1948, the expansion of bank credit continued, but at a much reduced rate. It was more than offset by the retirement of cash through the Treasury's excess of cash income over cash outgo. During the first four months of 1948, currency plus adjusted demand deposits dropped $\$ 5,200 \mathrm{Mn}$. ( $4 \frac{1}{2} \%$ ), while time deposits rose only $\$ 500 \mathrm{Mn}$. ; thus total cash dropped $\$ 4,700 \mathrm{Mn}$. (nearly $3 \%$ ).

The coincidence of this drop with a slowing of the inflation, repeated for the second time, suggests that the tax-collection timetable may be capable of producing a seasonal deflation.* Despite "pay-as-you-go," and despite some concentration of tax refunds early in the year, net receipts of personal income tax are heavily bunched in the first quarter. About half of the tax is collected by with-holding, the other half by quarterly payments under "declarations of estimated income" due March 15, June 15,

[^47]September 15 and January 15th. Both the January instalment on the old year and the March instalment on the new year fall in the first quarter. Besides, there is a strong tendency for taxpayers to be " under-declared"; correction is made either by a revised declaration in January or by payment with the final return in March. Over half the yearly payments under declarations fall in these three months, making the monthly rate of personal tax payments about double the average for the rest of the year. Tax refunds, on the other hand, start to be heavy in March, but the peak months are April and May. Even under the reduced tax rates under the Revenue Act of 1948, the net balance of personal-tax payments will drop from the January-March to the April-June quarter by about $\$ 3,000 \mathrm{Mn}$., or around $7 \%$ of disposable income. This is apparently more than taxpayers will take up by seasonal adjustments of their cash assets.

The slackening of bank-credit expansion is an agreeable surprise to analysts who (like myself) had felt that a marked stiffening of reserve requirements would be necessary. The Federal Reserve authorities did advance requirements for demand deposits in New York and Chicago from $20 \%$ to $22 \%$ in February, and to $24 \%$ in June ; and the banks affected have been curtailing rather than expanding credit. Credit expansion has continued at country banks (particularly in the South-west). But the price break of February undid part of the inflation-created growth of bankable collateral -notably of the borrowing power of livestock growers-and reinforced the recommendations of banking leaders for cautious lending.

The question begins to be raised whether the inflation has gone so far that its cessation will necessarily leave us with a deflationary excess demand for cash balances*. There is no adequate test for this hypothesis in advance of experience. But there are a number of indications that our stock of cash is reasonably adequate for full employment at stable prices in the present range. The long-term record of growth in cash assets puts 1948 about in line with the trend, as judged by years of prosperity with steady prices. Using wholesale prices as deflator, real cash per capita in 1926 dollars grew from $\$ 265$ in 1906 to $\$ 426$ in 1926 to $\$ 702$ in 1948 ; this is $2.4 \%$ per annum

[^48]from 1906 to 1926 and $2.3 \%$ per annum from 1926 to 1948 . $\dagger$ The prospective gross national product of 1948 (about $\$ 250,000 \mathrm{Mn}$. in current dollars), is very close to 1.5 times the prospective average cash supply, which was about the ratio of the pre-inflation year 1940; in 1929, the ratio was 1.9. The notion that people have worked down their cash to subnormal levels because they feared further price increases is also negatived by the weakness of prices of real estate and (discounting the recent " boomlet ") of corporation stocks. Besides, time deposits have recently outgrown demand deposits; and sales of Savings Bonds have been well in excess of redemptions. There are signs in the Federal Reserve's estimate of the distribution of liquid assets of individuals and businesses that cash is shifting to individuals, and business may be somewhat short. Gross national product for 1940 was about 5.2 times the apparent average cash of non-financial corporations and unincorporated business, according to these figures; for 1948, the prospective ratio is around 6.2. But business had some excess cash in 1940. Taking the evidence as a whole, the threat of deflation from inadequacy of cash will not look serious unless prices rise much further. On the other hand, we have "inflated down " the real value of our cash balances to the point where we dare not count much on excess liquidity as a sustaining force.

Prospects for Investment and Activity.The United States is beginning to have fairly adequate figures on the expectations and plans which underlie the investment components of the national product for a few months ahead. Besides construction contracts, we have the results of official sample surveys on intentions to install new plant and equipment. Latest figures show 1948 intentions about $15 \%$ above actual 1947 installations-about enough to continue full-volume operations in these industries with prices marked up to present levels $\ddagger$. For housing, we have information on "new housing starts" in number of housing units, which for the first four months of 1948 show a handsome increase over 1947. Another forwardlooking series is that on new orders placed with

[^49]


DATES - Cols. 25, SOURCES.-Cols. 21-24, 27-30, 40-1-Survey of Current Business. Cols. 25-6, 32-9-Federal Reserve Bulletin. SEE ALSO FURTHER NOTES ON PAGE 100 OF BULLETIN FOR AUG. 1947
manufacturers. These are not running so far ahead of sales as they did at one time; but orders on the books justify full operation in nearly all industries, and there is little sign of slackening. The preliminary report of the Federal Reserve " 1948 Survey of Consumer Finances" shows $27 \%$ of all spending units in early 1948 expecting

COMPONENTS OF GROSS NATIONAL PRODUCT OR EXPENDITURE.
(Seasonally adjusted annual rate, $\$ 000 \mathrm{Mn}$.).

| Year or Quarter | $\begin{aligned} & 1946 \\ & \text { Yr. } \end{aligned}$ | I | II | $\begin{aligned} & 1947 \\ & \text { III } \end{aligned}$ | IV | Yr. | $\begin{gathered} 1948 \\ \text { I } \end{gathered}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Personal consumption expenditures: |  |  |  |  |  |  |  |
| Durable goods ... | 15 | 18 | 19 | 20 | 21 | 20 | 21 |
| Non-durable goods | 87 | 95 | 98 | 100 | 104 | 99 | 104 |
| Services ... ... | 42 | 44 | 45 | 46 | 47 | 45 | 48 |
| Total consumption. | 144 | 157 | 162 | 166 | 173* | 164 | 173 |
| Domestic Investment (gross) : <br> New Construction | 9 | 10 | 10 | 10 | 12 | 11 | 13 |
| Producers' durable equipment | 12 | 16 | 18 | 18 | 19 | 18 | 19 |
| Changes in business inventories (net) | 4 | 2 | -1 | -2 | -1 | -1 |  |
| Total | 25 | 28 | $26 *$ | 27* | 30 | 28 | 36 |
| Foreign investments (net) | 5 | 8 | 10 | 8 | 8 | 9 |  |
| Government purch's -goods \& services | 31 | 28 | 28 | 29 | 30 | 29 | 31 |
| Gross national product | 204* | 221 | 227* | 229* | 241 | 230 | 244 |
| Consumers' disposable income | 158 | 169 | 170 | 178 | 184 | 175 | 186 |
| Consumers' saving | 15 | 12 | 8 | 12 | 11 | 11 | 13 |
| Business saving (gross) | 13 | 15 | 19 | 18 | 19 | 18 |  |

* Components fail to add precisely to this total because of rounding.
their incomes to rise over the coming year, as against $23 \%$ in early 1947 ; though $26 \%$ (as against $22 \%$ in early 1947) thought the general economic outlook is for "bad times ahead." Planned automobile purchases exceeded the prospective supply by a substantial margin, and the same was true for new houses.

Looking at the components of gross national product, there seems to be a substantial margin of safety. The main items run as follows:

Revision of figures indicates that the economy was pretty well weaned from its dependence on inventory expansion during 1947. The foreign investment figure, under the Marshall Plan, will scarcely reach the 1947 levels, but will presumably exceed the first-quarter 1948 level. The total of these volatile elements, which was $\$ 8,000 \mathrm{Mn}$. for the first quarter of 1948 , cannot well fall below $\$ 4,000$ or $\$ 5,000 \mathrm{Mn}$. for the coming period; and the more predictable elements of investment, as we have just seen, will maintain full employment volume as will consumer durables. As to the consumer nondurables and services, the recent tax cut will bring consumers' disposable income perhaps $\$ 8,000 \mathrm{Mn}$. nearer to GNP at full employment ; so that even if consumers insist on raising savings several thousand million they will be able to increase these expenditures. When we add that rearmament will enlarge the government component, encourage private investment and erode the civilian labour force, it is plain that the American problem ought to be inflation rather than deflation for some time yet.


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## THE MEASUREMENT OF PRODUCTION MOVEMENTS

BY<br>C. F. GARTER, W. B. REDDAWAY<br>AND<br>RICHARD STONE

This volume is the first in the series of Monographs to be issued by the Department of Applied Economics, Cambridge. One objective of this monograph is to set out in detail the methods by which the London and Cambridge Economic Service index of industrial production is computed, and this is done in part II. A mere recital of such details, however, would give an inadequate picture of the index, and accordingly part I contains a discussion of the fundamental concept underlying it and of the principles followed in trying to translate that concept into figures. Thus the emphasis of this part is on the measurement of production movements with the London and Cambridge index providing the illustrations. It should be of particular interest to students in its attempt to reconcile the theoretical principles of index-making with the practical limitations of the available data. Part III contains a brief account of historical statistics of industrial production in the United Kingdom. A short bibliography is appended.

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## TABLE OF CONTENTS



## THE ECONOMIC POSITION

October 30th, 1948.
The past quarter has seen no substantial change in the internal position of the country. The sharp fall in industrial production during July and August was seasonal, but there is no evidence that the rate of output has risen much above the level reached towards the end of last year. Although the estimated budget surplus seems hitherto to have been approximately achieved, the disinflationary pressure which it was expected to exert has not been effective in causing workers to move into the under-manned industries, especially coal and textiles. Any labour rendered redundant by the curtailment of demand for less essential consumption goods seems to have been easily absorbed (perhaps as a result partly of an increase over programme in capital creation and partly of some relaxation in the controls on consumption) and unemployment remains at a very low level.

Externally, we are now reaping the results of the internal improvement of the past year, including the good farming season. Exports in the third quarter of 1948 were $£ 17 \mathrm{Mn}$. higher than in the second, while imports were nearly $£ 10 \mathrm{Mn}$. lower, so that the adverse balance or trade (taking imports c.i.f.) fell from $£ 132 \mathrm{Mn}$. to $f_{1} 106 \mathrm{Mn}$. The reduction in the gross drain on our gold and dollar reserves was much larger than this, and it seems likely that the improving
international position of the pound sterling is reducing the drain on capital account. If the reduction in the demand for dollars by the rest of the sterling area can be maintained, there seems to be a fair chance that receipts from E.R.P. may be adequate to cover our total dollar deficit during the twelve months ending June, 1949, especially if the present check to the rise in import prices is maintained.

After next June, however, the problem of our balance of payments is likely again to become serious. The exhaustion of the proceeds of the Argentine railways and the probable reduction in our receipts under E.R.P. will necessitate a further large increase in exports, if even our present level of imports is to be maintained without drawing on our gold reserves. If the necessary exports are to be achieved, without reducing either the standard of living or the volume of capital creation, two problems have to be solved. First, the total volume of production must be increased, and since there is virtually no unemployment and the armed forces cannot be further reduced, this will necessitate an increase in output per head ; and secondly, a large part of the resources released by increased productivity must be made available for producing the goods which are most in demand abroad. The solution of the second problem would, of course, be rendered even more difficult if any substantial volume of resources had to be diverted to re-armament.

# THE ECONOMIC SURVEY FOR 1948 

By S. R. Dennison

The Economic Survey for 1948 published last March (Cmd. 7344) was in many ways a more realistic document than its predecessor for 1947. Perhaps the greatest improvement was the recognition that financial policy and other forms of planning are inseparable. Another significant change was a new emphasis on the uncertainty of forecasts ; a short Foreword which stressed this suggested a relatively modest aim, " to review the economic state of the nation at the beginning of 1948, and to set out some of the prospects and targets, in the light of which the Government intends to plan during the year. No attempt is made to forecast events precisely, to lay down rigidly detailed plans, nor in general to survey the prospect beyond 1948."

In addition to the usual difficulties of forecasting, there was the special uncertainty of whether, and if so how far, aid would be forthcoming from the United States. On this, the Survey hedged. On the one hand, in the statistics " no account is taken of such aid," the intention being to show how the situation would develop in its absence. On the other hand, the prospects in these circumstances would appear to be so unpleasant that it was assumed "as a basis of general policy and planning, that aid in some form will be available." Some attempt was made to meet the difficulty by dividing the year into two periods of six months, giving more detailed forecasts of developments during the first period, and showing how difficult conditions would be in the second if aid were not forthcoming (while planning on the assumption that it would be). Having made the assumption that aid would be forthcoming, the Survey warned us that this must not on any account " be used merely to provide us with greater ease or comfort," but as a means to sustain "working strength and efficiency" while we learned to stand on our own feet. Adam Smith put it better in the concluding words of the " Wealth of Nations" when giving the warning that Great Britain must disabuse herself of the belief that she " possessed a great empire on the west side of the Atlantic" and "endeavour to accommodate her future views and designs to the real mediocrity of her circumstances."

Although uncertainty was the key-note, the Survey had of necessity to put forward many detailed plans. And, indeed, the effects of uncertainty seem to have been under-estimated.

Thus, for example, it was stated that the import programmes for the second half of 1948 had " not yet been decided," because they must "inevitably depend on decisions about the European Recovery Programme" ; but preparations were " being made for either eventuality" of the presence or absence of aid from the United States. Now, of course, it is possible to have some degree of flexibility in the early stages of formulating a plan, but there comes a time when freedom to manœuvre is no longer possible, when a choice has to be made, and one eventuality or the other provided against.

Moreover, the central dilemma of "democratic planning" remains, that the citizens, free from compulsion, may choose to act in a manner not in accordance with the plans. The Chancellor of the Exchequer put this clearly in the House of Commons Debate: "The point which the Opposition constantly raised is how can there be planning unless we are prepared to direct labour. In our view, we can perfectly well plan but we cannot necessarily get the same certainty that the plan will be carried out $100 \%$." It is true that conditions in 1948 could be expected to be better than in 1947, with some easing of the inflationary pressure and thus the removal of some of the discouragements to citizens to act in accord with the plans, which were so potent in 1947. But the essential difficulty remains.

It is usual to discuss the Survey in terms of the consistency of its various targets, and then to judge the success of the process of planning by the extent to which the targets are achieved. This, however, is not a very enlightening procedure, for several reasons. First, there is the fundamental point, which must be considered in judging any system of planning, of whether the targets as formulated do in fact entail the best use of the resources available. It is at least possible that a complete plan in which all the programmes were exactly achieved, with neither shortfall nor over-fulfilment, would give a smaller amount of economic wellbeing than another plan in which the distribution of resources was arranged differently. Secondly, the system in Britain is not completely planned-certain targets only are selected. It may always be possible to achieve given isolated targets if no account is taken of the cost in resources which have to be diverted from other uses. In so far as
the "plan" does succeed in putting first things first, then this danger may be minimised. But it is not abolished, and it could well be that all the targets of the Survey could be achieved, and yet we would be worse off than if they had not been achieved. Thirdly, the use of the word "target" masks many different phenomena. Indeed, its popularity is a sign of the underlying confusion, for it is a nebulous word, without the precision of "plan," " allocation," "programme"" or even "forecast." Some of the so-called targets of the Survey are nothing more than broad objectives ; indeed they are not even that, but what are officially called at other times "the necessities of the situation." By this is meant something which is needed if certain conditions are to obtain. For example, the over-all export target is of this character, being simply the level of exports which needs to be attained if (on certain assumptions about imports, prices and invisible items) a given situation of the balance of payments is to be reached. Failure to achieve the target then means that the postulated situation is not reached. There is no difficulty in revising the target, because it is no more than a general guide and does not in the first instance correspond to any specific entity in the economic system. At the other extreme, the targets for the numbers to be employed in certain industries, or the outputs of particular commodities, are presumably quite specific. Indeed, the Survey often makes them more specific than they need be, or possibly can be; they are often presented as something which must be achieved, and as in fact they rarely are, it should follow that the whole process is a failure.

Nevertheless, we shall consider the Survey to some extent in its own terms, as an attempt to allocate resources, the success of which is to be measured by the extent to which its allocations and forecasts are realised.

## II

The main objective for 1948 put forward by the Survey was "the restoration of external stability, and the narrowing of the gap in our trade with the Western Hemisphere, and above all with dollar countries." This is a very broad objective, in which almost every one of the detailed aims could be included; it means, indeed, little less than the achievement of the new equilibrium of the whole British economy appropriate to post-war circumstances. It is not, of course, to be expected that full equilibrium could be achieved in the year, while it is not unreasonable to suppose that certain of the
unfavourable features of the contemporary situation may not be lasting, so that to procure short-period equilibrium would involve more heroic measures than would be necessary on a longer-term view. The Survey emphasised the obvious fact that "the year 1948 is a year of transition," and that (in contradiction to the declared aim of not looking beyond 1948) " the pattern of 1948 must be judged not only, nor even principally, by the needs of 1948 itself. It must be judged also by the progress during the year towards the more stable position that we must reach." Unfortunately, it is just this that is most difficult, if not impossible, to do, for it again involves making forecasts about the inherently unknowable. All we can do is to assume that an improvement in the balance of payments in the short period is to some degree a movement towards that longer period equilibrium which is the ultimate goal-unless, of course, there are obvious elements of instability which are likely to cause trouble in the future.

The Survey, " in order to describe and measure these problems as clearly as possible," gave " a forecast of exports, a programme of imports, and an estimate of the balance of payments." The missing term is, of course, the balance on invisible account, and this was in fact estimated in some detail. Given forecasts of exports and invisibles, and the possibilities of borrowing or running down of reserves, then there is some kind of ceiling to imports. At the other end, there is the possibility of formulating some volume of imports needed to meet a given level of activity, and the programme actually adopted by the Survey appears to have been the minimum needed to give about the current level of consumption; so far as raw materials are concerned, the basis was "the minimum required to maintain a high level of employment." Thus it would seem that the import programme is the basic " necessity of the situation" to which the others have somehow or other to be made to conform ; the Chancellor of the Exchequer has since referred to the " target" of the balance of payments as "hopeful." Even so, it postulated a drain on gold and dollar reserves of $£ 222 \mathrm{Mn}$. in the half-year, which was stated to be the maximum allowable, but which was presumably regarded as preferable to any further reduction in consumption or of the level of activity.

Within the over-all problem, there is the specific problem of reducing imports from, and increasing exports to, the Western Hemisphere, and this occupied an important place in
the Survey. Again the programme for imports from the Western Hemisphere seems to have proceeded from an estimate of minimum needs, with a planned level " no more than sufficient to maintain the nation in health and working efficiency."

These criteria are, of course, rough and ready. There can be no rigid definitions of " health" or of "working efficiency," and no absolute minimum level of imports. Some approximation to a minimum may be evolved in a siege economy, but we are not in such a state-although the problem is grave, some of the essential components of a state of siege, which greatly simplify the problem, are lacking. In practice, the " minimum " is the result of taking the existing pattern and paring off something here, trimming down there, with a whole series of manipulations all conducted with reference not so much to any broad criteria of "health" and "efficiency," as to innumerable specific circumstances, political as well as purely economic.

The actual results of the transactions during the first six months of 1948 are a vivid demonstration of the impossibility of accurate forecasting. It is true that the adverse balance of $£ 140 \mathrm{Mn}$. was close to the forecast of $£ 136 \mathrm{Mn}$., with a drain on reserves of $£ 254 \mathrm{Mn}$. against an expected $£ 222 \mathrm{Mn}$., but in detail almost every realised result differed appreciably from the estimate. The matter is considered in detail in an article by Mr. Tress in this issue of the Bulletin, and only some general points need be made here. First, the forecasts of the visible balance were upset by apparently unforeseen changes in prices. The Survey seems to have assumed that import prices would fall very slightly, and that export prices would be almost constant. In the event, prices of imports rose by $10 \%$, and those of exports by $3 \%$, over the six months, with a further worsening of the terms of trade, and an adverse balance appreciably greater than that which was forecast. Secondly, the effects of this were offset by an unexpected favourable balance on invisible account, of $£ 16 \mathrm{Mn}$. against an expected adverse balance of $£ 49 \mathrm{Mn}$. Though it is impossible to make any longer-period forecasts from this, it would seem that the favourable balance resulted partly from adventitious elements which may not continue. Thirdly, the diversion of imports seems to have gone more according to plan, but the " uncomfortably large" adverse balance with the Western Hemisphere (at a rate of $£ 390 \mathrm{Mn}$. a year) remains " the most difficult problem with which we have to deal."

The Survey permitted itself some reflections on the longer-term problems of the balance of payments. In the nature of the case, these were confined to stating what are likely to be some of the main factors. The long-term problem was regarded as a projection of the problem of 1948: on the one hand, the over-all problem of making and selling " enough exports year-in and year-out at prices which will command a market and at the same time earn sufficient to meet our needs"; on the other, the achievement of a balance with the Western Hemisphere.

In assessing the over-all problem, the Survey introduced a significant change in the objectives which had hitherto been generally accepted. On the "reasonably realistic" assumption that invisible receipts will "be sufficient, and no more than sufficient " to meet invisible payments, and with prices in the same relation as at the beginning of 1948, exports would have to be $190 \%$ of the 1938 volume in order to pay for the 1938 volume of imports. Though the basis is not very clear, it seems that this requirement should be compared with the original estimate, not of $175 \%$ (as this assumed inter alia an increase in the level of imports above 1938), but of $150 \%$ of the 1938 volume. It has, however, attracted little attention; perhaps this is as well, for the many uncertainties make such estimates of little value, and as the Survey said, whether or not we can " consistently provide adequate food and raw materials for a high level of employment can only be shown by experience." Nevertheless, it was assumed, and probably rightly, that exports cannot be increased to the required extent, that a balance will be reached not only by " an expansion of our exports to a level very far above 1938, but also [by] some contraction of our imports below the level of that year."

Having made this all-important statement, the Survey left it on one side, and went on to look at the Western Hemisphere deficit, said to be the " far more difficult " problem. It may well be, of course, that there is here an underlying disequilibrium, that " a restoration of the pattern of the 1930's would not give a balance between the Sterling Area and the Western Hemisphere unless the flow of long-term capital investment were also restored," and that special measures may be necessary in an attempt to correct it. But it is misleading to attempt to segregate the two problems at all rigidly (for example, as the Survey stated, " if we try to achieve an over-all balance while we are still incurring a large deficit with the Western Hemisphere, we must obviously be aiming at a correspondingly large
surplus with the rest of the world '), and in the long-term the two problems are not separate, but merge into the large question of the pattern and character of world trade.

There seems to be here an underlying difficulty, which is not sufficiently clearly recognised, and which affects more than this particular issue. It is the possible conflict between the immediate needs and those of the long term, with a corresponding difficulty of reconciling measures which may be deemed necessary in the immediate situation with policy designed to move towards a long-term equilibrium. The long-run problem of the balance of payments can be solved only by a " recovery and expansion of the world economy." But we are now in a world of bilateral bargains, " in which prices and exchange rates no longer measure the desirability of goods or currencies," and it is implied that the "immediate necessity" of finding "the means to maintain a high level of import of materials and a high level of internal activity" can be met only by using the methods of bilateralism " to direct trade into or out of particular channels." There the matter was left ; the possibility that the pursuit of the methods needed in the short-term might frustrate any chances of development towards the conditions needed for solution of the long-term problem was not considered.

## III

After its elucidation of the problems of the balance of payments, the Survey proceeded to consider the targets for home production in 1948. These, of course, follow from the need to increase exports, which will require " tremendous effort on the home front " and will be " hampered by the main limiting factors of dollar and steel shortage, as well as by a number of other shortages." The specific targets were given as the carrying forward of " the marked progress made during 1.947 in the coal, steel and transport industries " (this is a " major national objective"), an " even greater effort in the case of textiles" (to earn dollars and to relieve home shortages), and " a first stage in the planned expansion of our agriculture." Each of these was dealt with in some detail, on the basis of "far-reaching programmes approved by the Government," and some attention was paid to electricity and oil ; but all the other limitations, each of which "seriously affects production in one or more industries," mentioned in a single paragraph, were neglected, as were many which were not mentioned. Concentration on a few main objectives may have unfortunate results if it
means neglect of other items, which, though apparently not of major importance, may in fact be essential for the final result. Shortages of particular raw materials, or of component parts, may be just as effective in limiting final output as a shortage of fuel or steel. It is not improbable that the main difficulties of British industry at the present time do not lie in an over-all shortage of coal, steel, or any other single material, but in a multitude of specific shortages, with consequent irregularity of supplies and lack of balance at every stage ; the remedy would then be not to increase the output of a few main primary materials, nor to attempt to regulate the supply of every individual item (for that may be part of the trouble), but to create some means whereby the present congestion can be loosened.

Progress towards reaching the targets has been patchy. The best showing has been by what was said to be the worst bottleneck, steel. A target of 14 Mn . tons of ingots and castings was based on the assumption that it was within the capacity of the industry and attainable " if, but only if, there is freedom from serious fuel, raw material and transport difficulties." In the event, output during the first three months of the year was above the target, and in May this promising start was rewarded by a raising of the forecast to 14.5 Mn . tons for the year. The output for the first half-year was at an annual rate of over 15 Mn . tons; in the third quarter output fell below the target rate in the holiday months of July and August, but in September reached the record rate of 15.4 Mn . tons. The Iron and Steel Federation states that the high level of production has been made possible by the success of special efforts to obtain supplies of scrap. There are, of course, many uncertainties about the future, but it would be surprising if the (revised) target for the year were not exceeded. In spite of this, in April (when output had been above the target rate for three months) revised export targets were announced, the main change being a reduction in exports using steel, the reason being given as shortage of steel capacity. This suggests that the original plans in the Survey (which were presumably based on the target output of 14 Mn . tons) were internally inconsistent. To offset the reductions, the targets of other industries, such as cotton, were raised, though there seems to have been little expectation that they could be reached. Broadly speaking, the experience of the second quarter of the year suggests that the revised targets were no more realistic than the original. At the moment of writing, it has just been announced that a
further revision of export targets is pending, to take account of commitments under the European Recovery Programme, and still more will be required from the cotton industry.

The Survey laid down a target of 200 Mn . tons for deep-mined coal (and 11 Mn . tons opencast), stating that this was "an absolute minimum and every effort [must be] made to exceed it," and that "production must continue to rise throughout the year." Production of deep-mined coal has not continued to rise throughout the year; up to September, the best month was January, the second best June. In the first half of the year, the output was almost 100 Mn . tons, so that it appeared that the prospects of an output of 200 Mn . tons for the year were not unfavourable. Since June, however, there has been the loss of output with holidays, and so far (September) the level achieved in June has not been regained. For the last three months of the year, a weekly output of 4.23 Mn . tons will be needed if the target for the year is to be reached; the average weekly output in the first half of the year was 3.84 Mn . tons, and in September it was 3.83 Mn . tons. There is thus little prospect that the target will be reached, and the expectations are that we shall be at least 3 Mn . tons short. This, however, need not be so very disastrous in the short-term ; it should be possible to meet export needs, and it seems that many industrial concerns have built up good stocks, having learnt by the experience of 1947. Provided that supplies can be maintained to keep the capacity for electricity and gas in operation (it is that capacity which is inadequate to the demands made upon it), the system can be much more readily adjustable to the failure to reach the target than is implied in the over-drawn picture given by the Survey. The longer term prospect is, however, less reassuring.

The output of cotton yarn was to increase from an annual rate of 828 Mn . lbs. at end-1947 to one of $1,000 \mathrm{Mn} . \mathrm{lbs}$. at end-1948, with an output of 900 Mn . lbs. over the year. By June the output had risen (though by no means steadily) to a rate of 897 Mn . lbs. a year, and has since fallen, though again this may be partly attributable to holidays. For worsted yarn, the rate at end-1948 was to be 204 Mn . lbs. ; by June it was at the rate of 187 Mn . lbs., and with half the year gone only 90 Mn . lbs. had been produced towards a target for the year of 190 Mn . lbs.

Each failure to carry out a particular programme may well have its own specific causes. In steel, for example, there are many uncertainties
which make forecasting hazardous ; in coal the failure to provide the new capital thought to be necessary (deliveries of coal cutters, conveyors, and tubs and cars all lag behind programmes) may be a contributory factor. There has, however, also been a general failure to provide the additional man-power said to be necessary, as the following details show :-

| NUMBERS OF | WORKERS EMPLOYED. |  | 000's |
| :---: | :---: | :---: | :---: |
|  | Increase required | Actual | increase |
|  | Year | Jan.-June | July |
|  | 1948 | 1948 | 1948 |
| Coal mining | 32 | 7 | 1 |
| Agriculture | 55 | 26 | 2 |
| Cotton | 58 | 8 | 0.7 |
| Wool | 21 or 22** | 1 | 0.3 |
| Other textiles | ... 23 or 28* | 22 | $-0.3$ |

* The Survey gave two different figures (on different pages) of employment at end-1947, without explanation.
It is only for agriculture and for other textiles that the rate of increase approaches that desired. For coal, cotton and wool the increases are far below the required rates. It may be recalled that these were said to be "targets in the full sense," and their attainment "among the first necessities in 1948." The Survey did not, however, seem very hopeful about reaching them. For cotton, for example, after various methods of stimulating recruitment had been mentioned, it was remarked that it " is unlikely that the high target figure can be reached by such methods alone." These were direct methods, and it was suggested that they might have to be supplemented by more general measures, such as a restraint on " the growth of other industries and services in the textile areas "-that is, a reversal of the policy for the "balanced distribution of industry." Exercise of the limited powers over labour which do exist has been confined largely to recruitment for coal-mining and agriculture ; of a total of 470 individual directions issued in the ten months from October 6th, 1947 (when the control came into operation), 321 were to employment in coal, and 126 to employment in agriculture.

The need for increased man-power in these industries arises from the need to increase their outputs. Changes in the numbers of workers employed may, however, be of secondary importance to changes in productivity (or, in Survey terms, output per worker over the year). Apart from some general observations and frequent stress on its importance, the Survey said little about productivity. The reason was the good one that little is known, that there are so many factors involved that it is impossible to say anything very useful. Yet some assumption must have been made, and in general, it seems to have been that output per worker would
increase during 1948. In some industries, e.g., coal and agriculture, the basis for this hope seems to have been an increase in the amount of capital, though the workers in these industries are far from immune from the appeals to harder work. In others, notably textiles, it lay in longer hours and improvements in organisation. It was observed, however, that the "application" of longer hours in "some sections of the cotton industry is proving difficult" (a nice understatement), while (what is more surprising) the " marked increases in output" which could be obtained from "redeployment" were not matched by an assumption of any significant increase in productivity in the target estimatesthe targets for wool seemed to assume only a slight rise, and those for cotton almost none. In this, the Survey was probably realistic, but it accords ill with its other statements, and even worse with the glowing pictures which are now being drawn of the relatively easy gains to be derived from improved organisation. In all, changes in productivity are one of the major uncertainties, and it is perhaps to these rather than to marginal changes in the numbers employed that attention should be directed; the difficulty is that the innumerable factors at work are probably even less susceptible to control than is the movement of labour.

Output targets were confined to the few more essential industries; for other industries and services there was a comprehensive table of the distribution of man-power at the end of 1948. Like its predecessor in the Survey for 1947, however, this does not seem to have been intended as a forecast, nor as a programme, but simply as an indication of the distribution which might be appropriate to the other programmes. The main features can be summarised in the following table, which also shows the actual changes in the first seven months of 1948 :-


The changes in the first seven months of the year demonstrate the almost complete failure of events to accord with the kind of development said to be needed. In its commentary, the Survey was, indeed, non-committal, being content to point out some of the features and difficulties of the situation. Thus, on the Public Services, it remarked that "it is doubtful whether anything in the development of public policy will lead to large reductions"; however, economy was the objective, and man-power for the "undermanned" industries had to be found from somewhere, so a reduction of 22,000 was put in the table-and the numbers continue to grow. On the distributive trades and other services, it was observed, somewhat naively, that the figures were " in one sense" residual, that the "least useful 200,000 , say, employed in these groups represent labour resources we should willingly use elsewhere if the materials were available for them." The most important real change seems to have been the proposal to reduce the labour force in building and civil engineering; this, of course, was a reversal of earlier plans to increase the size of the industry, and was related to the cuts in capital development. In the White Paper on Capital Investment in 1948 (Cmd. 7268, issued in December 1947) it was stated that the amount of building would be strictly controlled, to ensure that labour released by the capital cuts would not be re-employed on maintenance and small works, but be free for transfer to more urgent needs (though it was hoped that there would be "an automatic decrease" in employment). This was stern doctrine, apparently too stern to be carried into effect, and instead of a considerable decrease ( $12 \%$ ) in the numbers employed, they have risen quite substantially.

Perhaps the increases in some industries which should have reduced their labour force have been to some extent offset by the fact that total employment is appreciably above forecast. But this is largely because unemployment remains well below forecast. The Survey allowed for an increase in unemployment as a result of "the changing pattern of industry," and made specific reference to the possibility of some temporary unemployment in the building industry. It also stressed the need for greater mobility of labour, "both to help the target recruitments, and to provide that general flexibility which the uncertainties of the situation demand." Perhaps the maintenance of a very high level of employment is the chief factor preventing that mobility which is necessary to bring about the redistribution of labour which the Government
desires. Again the important feature is not any specific characteristic of the " man-power situation," but the general suppressed inflationary pressure.

The reductions in capital investment which were announced at the end of 1947 are one contribution to the attempt to relieve the inflationary pressure. The Survey gave the estimates (for gross investment of $£ 1,420 \mathrm{Mn}$. at 1947 prices, instead of the original estimate of $£ 1,600 \mathrm{Mn}$.) with the statement that the reduction was in " expected achievement"; the reduction in programmes " which were projected, but which were in any case beyond our expected capacity to achieve" would be far greater, but could not be estimated. In all the estimates there is a great deal of uncertainty, and the plans are of the vaguest; they "are under continuous adjustment and revision," while the amount of investment which " may finally be achieved in 1948 may differ from earlier forecasts, both in detail and in the balance between the main categories of investment." The present writer believes that too much importance is often attached to investment as the key element in the inflationary situation ; but if it is regarded as the strategic factor to be controlled, then it is unfortunate that the estimates should be so hazardous and the policy so indecisive.

Investment is important not merely as a means of control of the economic situation; it is also highly important for economic efficiency. The Survey stated that the limited resources which could be made available were being " directed to those projects which will make the most substantial and early contribution to exports and the reduction of essential imports." Here there may be one case of the conflict between immediate needs and those of the longer period. Moreover, there seems little evidence that the capital is being directed towards those uses in which it will give the greatest benefit. We may here be suffering from the piece-meal ad hoc approach to economic problems which characterised the Survey, with, for example, immediate investment in coal and agriculture to help to push up their output (without much regard to cost), and perhaps a starving of some other industries which could in fact make better use of the resources.

The final Chapter of the Survey brought together the various programmes in an attempt
to forecast the National Income in 1948. Again, of course, many assumptions had to be made, and again the uncertainty was emphasised. One element which was crucial was the level of wages. The Survey seems to have assumed that there would be no significant rise in money wages, but that " increases in productivity will be accompanied by corresponding increases in money earnings," and reproduced the Prime Minister's Statement on Personal Incomes, Costs and Prices to emphasise the point.

Incomes have not been stabilised as was hoped. In the first eight months of the year, over $4_{4}^{3} \mathrm{Mn}$. workers have had wage increases, involving an increase in normal weekly wages of about $£ 1.2 \mathrm{Mn}$. a week, and the Ministry of Labour index of wage-rates has risen by two points (from 104 to 106, based on June 1947). The recent award to engineers, and probably others to come, will have a further substantial effect. It is thus too early to be sure that the main difficulty has been removed; and, as the Survey said, " no system of economic controls can be wholly proof against strong and persistent inflationary pressure, working against the general objectives of economic policy."

The suppressed inflationary pressure is, indeed, the governing factor, affecting almost every element in the situation internally and externally. It was not even formally recognised in the Survey for 1947, which was thereby a document with little relevance to the real situation. The experience of 1947 showed the unfortunate consequences of attempting to carry out specific plans in defiance of the conditions which accompany suppressed inflation. Although the Survey for 1948 went some way towards recognition of this, it still laid equal stress on "physical" plans and controls; its approach was that it is the plans and controls which matter, and which can be the really effective instruments of policy, if only the financial situation is not such as to frustrate them. It is possible to conceive yet a further stage, in which financial policy (though supplemented by other general measures) is the primary weapon, and in which greater emphasis is placed on decentralised initiative and personal incentive and less on administrative acts of government ; it may be that here recent experience in Western Germany has some relevance to present conditions in Britain.

# THE MARKET FOR CONSUMERS' GOODS AND SERVICES 

By W. B. Reddaway

In recent months there has been a great deal of talk about the sellers' market for consumer goods having virtually ended, about supply and demand being virtually in equilibrium in this field, about purchasing-power being the limiting factor now, and so on. The object of this article is to examine the evidence for making this kind of assertion and to sketch some of the reasons why there has been a change.

In a free-market economy the test of whether a sellers' market had ended or not would consist essentially in seeing whether selling prices had fallen into line with costs (including indirect taxes). In Britain, however, the disequilibrium between supply and demand showed itself mainly in the consumers' inability to buy what they wanted rather than in soaring prices; this inability was sometimes due to legal prohibitions (e.g., through rationing), sometimes to shop shortages, etc. Our main test must, therefore, be to see what improvement there has been in consumers' ability to use their money in the way they would choose.

On this subject the most direct evidence is the list of legal restrictions which have recently been removed or relaxed. This includes the following :-

Food.-De-rationing of potatoes, bread, flour, cakes, breakfast cereals, etc., and certain jams.

Apparel. - De-rationing of footwear ; bonus of 12 coupons per head; down pointing of many articles.

Furniture.-Utility furniture made availavailable to everybody.

House Repairs.-Raising of limit to $£ 100$. None of these relaxations seems to have been nullified by causing shortages in the shops, and there can be no doubt that most of the old regulations were exerting a real restrictive influence a year ago. We may infer that the underlying position must have moved towards equilibrium.

It is interesting to quantify roughly the theoretical effect of the main measures in the apparel field. The bonus of 12 coupons per head permitted consumers to spend about $£ 120 \mathrm{Mn}$. extra on rationed clothing at the old pointings ; the de-rationing of footwear unaccompanied by a reduction in coupon issue " set free" coupons
which would permit consumers to spend about $£ 100 \mathrm{Mn}$. per annum on additional clothing, quite apart from any increased expenditure on footwear ; the downpointings and minor derationings raised the permitted purchasing power of each coupon by between one-third and onehalf. One cannot strictly add these up into a total, because the bonus issue is a single amount, presumably non-recurring, whereas the others increase the regular flow of permitted purchases. But if the bonus coupons had been used by the end of September, as was originally stipulated, and ordinary coupons had been used at a steady rate, then the extra clothing which might legally have been bought in the summer quarter would have been worth well over $£ 200 \mathrm{Mn}$.-i.e., the 1947 rate of expenditure on clothing could legally have been trebled, whilst footwear purchases were unrestricted after the beginning of August. There can be little doubt that for most people, though not all, the limiting factor on clothing purchases has been money, plus some difficulty in finding just what was wanted, rather than coupons.

## Stock Movements

The next indication of the consumer's greater ability to use his money as he chooses is found in the level of stocks. The information is incomplete, and difficult to use because of seasonal movements and price changes. But the retail trade statistics leave little doubt that in 1948 the consumer has, on the average, had a substantially greater volume of stocks from which to choose than in the corresponding period of 1947 ; the improvement averaged fully $10 \%$ for the eight months January-August, and applied to nearly all the main categories for which statistics are computed. It is true that this superiority had disappeared by the end of July, but this is mainly due to the rising trend during 1947, rather than to a fall in 1948. The statistics do not enable one to test this properly except in the case of apparel, for which footwear stocks had been maintained at their highest level, but clothing stocks had shown some decline during July and August.

The sample of retailers reporting stocks is not a very good one, but in the clothing field we can get confirmation from the rise in wholesale stocks. The Board of Trade's index, which is based on returns of the numbers of various garments in stock, showed an average rise of nearly $70 \%$ for
the eight months ; the smaller retailers who buy from wholesalers are unlikely to have experienced so steep a rise, since one would expect a bigger percentage increase in wholesale stocks as supply and demand approached equilibrium, but they must also have been better stocked.

One can also get a general check on the retail trade statistics from the following figures for bank advances to retailers :


Bank advances are bound to rise by a bigger percentage than the value of stocks, because they represent a marginal element in the retailer's finance. Even allowing for this, however, and for the rise in prices, the table strongly suggests that stocks have been higher in 1948. It also shows the interesting fact that the long rise in the advances, which had more than doubled them within two years, halted between May and August. This supports the tentative conclusion indicated by the retail trade statistics that the process of stock re-building has ceased since the relaxations on purchasing were made, leaving effective demand and incoming supplies roughly in balance; needless to say, this rough balance could easily be upset from either side.

## Savings and Expenditure

A further rough test of the consumer's ability to use his money as he chooses may be obtained from the figures of small savings and the pattern of consumer expenditure. One of the symptoms of excess demand was that the public's inability to get what it wanted forced it into additional expenditure on things which were available, or into saving. A decline in savings, therefore, or in expenditure on the "safety valve" items, is a symptom of reduced disequilibrium; so is a marked rise in expenditure on those categories where demand had been most forcibly restrained.

So far as savings go, the information available, though far from a perfect guide, does suggest strongly that there has been little new saving as a result of people being unable to buy what they wanted. The National Savings figures show a net dissaving for the period April-September, 1948, of some $£ 4 \mathrm{Mn}$., and in addition $£ 49 \mathrm{Mn}$. of $3 \%$ Defence Bonds were repaid at maturity and some $£ 17 \mathrm{Mn}$. (net) was withdrawn from the special accounts issued as war gratuities. If supplies had been better there might, of course, been still greater dissaving, and some people may well have been making positive savings because
they could not find what they personally wanted but the general picture is not one of frustrated attempts to spend.

The consumer expenditure figures are not easy to use for this purpose, and do not tell a very clear tale. The official estimates are only available up to the end of the second quarter, and the seasonal movement is so large and uncertain that one can do little beyond comparing them with a year earlier ; over a period as long as a year, however, the further complication of price changes is serious. The first quarter comparison with 1947 is of little value because of the fuel crisis.

The second quarter total shows a rise of nearly $10 \%$ compared with a year earlier, which probably implies a small rise in volume. One can see a clear sign of a movement towards the desired pattern in the rise of over $20 \%$ for clothing, for which the retail trade figures show a considerably bigger percentage increase in July-August ; the virtual stability of the entertainment figure also suggests that consumers are finding it easier to spend their money in the ways they would choose. The food figures, however, only show a rise in value equal to the average, implying little or no change in volume, and this is clearly one of the repressed sectors; the enforced reduction in motoring expenditure is hidden in the omnibus item for other goods and services, which shows no rise at all, even in value.

An indicator which may be of some significance, and which can be brought more nearly up to date, is the passenger traffics on the railways. For the twelve weeks to September 5th, which cover the bulk of the holiday period, the total (including L.P.T.B. railways) shows a rise in value of $6 \%$, implying a fall in volume of at least $10 \%$; extending the period somewhat in either direction leaves the figures virtually unchanged. The train services have been improved this year, and there can be no doubt that progress in re-establishing hotels, etc., has increased the available supply of holiday facilities. Despite this the reduced traffics are confirmed by numerous reports of poorer business at the resorts, and it seems clear that the public have reduced their holiday-making because of a change in the balance between their purchasing power and the supply of other things.

## Prices and Clearance Sales

Finally, we should make some reference to price movements as an indicator of the balance between supply and demand, although these lose much of their significance when so many prices
are not allowed to rise above a level which is broadly in line with costs, however great the excess of demand.

We have little usable information about those goods to which this difficulty does not apply, but in several cases (e.g., second-hand furniture) qualitative reports suggest some fall in prices. In the more controlled sector there are two main lines of procedure : we can try to gauge the extent of price-cutting (either continuous or at clearance sales) induced by difficulty in selling at the permitted prices; and we can try to assess the strength of producers' efforts to keep down their costs as a means of keeping down their prices and so meeting the market. The second approach covers the employers' attitude towards wagerates as well as efforts to increase efficiency, and as a special case we can include their agitation for reduced taxation on their goods.

The available information suggests that clearance sales and the like have become more common, but are far from being on the pre-war scale ; they largely relate to definitely out-dated clothing, or to goods purchased at high prices in times of scarcity. There is nothing in this to suggest a real excess of supply, except in a few lines, but it is no longer possible to "sell anything."

Difficulty in selling does not seem to have stimulated much of an effort to keep down costs, except by agitating against the purchase tax. Wage increases are still being granted, and a suggestion of trying to impose a wage-cut in any industry would still be regarded as a sign of lunacy; the bare state of the labour market does not suggest a vigorous rationalisation of methods or pruning of staffs. It is inevitable, however, that information about efforts to increase efficiency should be scanty, so that little reliance can be placed on this test.

## Conclusions from the Evidence

It seems reasonable to sum up the above discussion by saying that the evidence, though scattered and incomplete, all indicates a substantial movement towards a balance between supply and (unfettered) demand in the market for consumers' goods and services. In so far as it is possible to distinguish a " global " problem of reconciling aggregate supply and demand from that of particular shortfalls, the position, indeed, no longer gives much cause for serious concern. Few people have been forced into involuntary new saving through failure to find enough things they were prepared to buy. Indeed, large numbers of people have found it only too easy to over-spend
their incomes and draw on their savings ; inability to spend as much on meat or motoring as they would choose has led to "excess" spending on second or third choices, not to frustrated demand. Probably the amount of dissaving would have been greater if certain goods (e.g., motor cars) had been available, but even allowing for this the "global" disequilibrium between aggregate supply and aggregate demand at current prices does not appear a very serious matter.

It is not, however, sufficient to study the "global" balance. From the point of view of the consumer it may be more important for him to be able to spend an increased proportion of his income in the way he would prefer than for the supply of second (or perhaps fiftieth) choices to become adequate to absorb his whole income. We must not forget that in the very important food sector most people are unable to obtain as much of many lines as they would choose to buy at ruling prices* ; petrol, motor-cars and now cigarettes provide other examples of " particular" shortages which cause much loss of satisfaction.

From the sellers' point of view also it is necessary to consider sectional disequilibria as well as the over-all picture. Clearly, if the potential aggregate supply is almost balanced with the aggregate demand from consumers, sellers of any articles for which supplies are markedly in excess of their " natural" share of consumers' demand at current prices will encounter selling difficulties; they may gain something from the purchasing-power diverted by shortfalls in the supply of food and motor-cars, but this will not cover major disproportions when the aggregates are roughly balanced. $\dagger$

## The Underlying Causes

We may now attempt a very summary review of the underlying causes ; it may be possible to elaborate the points in a subsequent article. The main elements in the over-all picture are :-
(a) The level of personal incomes, after payment of direct taxes.
(b) The desire of some people to supplement

[^50]these by drafts on their savings, less the desire of others to add to their savings.
(c) The volume of supplies available for sale.
(d) The level of market prices (including the effects of indirect taxes and subsidies.)
If increases in the last two more than offset increases in the first two, then the value of the things available to be bought is rising more than the amount of money which people are seeking to spend, and there is a movement away from a sellers' market towards a buyers' one. For purposes of exposition we will concentrate mainly on a comparison between the second quarters of 1947 and 1948 ; this avoids most seasonal problems, and the second quarter of 1948 seems to have been a crucial one.

So far as personal incomes go, both the wage bill (including the Forces) and distributed profits and interest seem to have risen by something of the order of $5 \%$. Direct tax rates, as actually applied to personal incomes, were slightly reduced.*

The actual (net) movements in savings are partly a reflection of the supply-demand position for the relevant goods rather than a guide to consumers' wishes. One particular indicator does, however, seem to be relevant. In 1947 very substantial net withdrawals were being made from service release benefit accounts (some $£_{1} 27 \mathrm{Mn}$. in the second quarter) whilst this year they have been much smaller (about $£ 9 \mathrm{Mn}$.), presumably because the more loosely held balances have been spent. This source of supplementary demand has largely disappeared.

The easiest way to get a line on $(c)$ and $(d)$ is first to take them together, and use the official estimates of the value of consumers' expenditure to give a measure of the value of what was actually bought. These show a rise of $£ 177 \mathrm{Mn}$., or rather under $10 \%$. The interim index of retail prices, if continued backwards from June, 1947, would probably show a rise of very similar size, but for deflating aggregate expenditure this is probably a little too big. $\dagger$ Thus there appears to have been a very slight rise in the volume of purchases, whilst prices rose rather more than disposable incomes.

This picture is reasonably consistent with the

[^51]other evidence. The " gap" has been narrowed a little from both sides-slightly more goods, slightly reduced purchasing power from incomes (allowing for the rise of prices)-and this has permitted people to use their savings more as they wanted.

Nevertheless, these small marginal amounts hardly seem sufficient to account for the changed tone of many markets, and the relaxation of restrictions which has been possible. The main factors which cannot be shown in these records of actual purchases, etc., but which are very important to the supply-demand situation, seem to be:-
(a) The ability to dis-save had moderated with the exhaustion of some war gratuities, and perhaps the wish to do so with the completion of some deferred purchases.
(b) The level of stocks was higher ; the mere presence of these goods, even if their volume was not on balance reduced during the period to supplement incoming supplies, gave consumers more choice and made selling more competitive for the retailers.
(c) The higher stocks reduced the retailers' incentive to place large orders, and so weakened the sellers' market for manufacturers. This point was strongly reinforced in some sectors by the working of the purchase tax. Higher tax rates increase the capital needed by the retailer to carry the same volume of stocks, and he may have difficulty in securing it ; they also make him reluctant to carry too much stock on which he will lose the tax if it is reduced. For these reasons Dr. Dalton's final budget was far more effective in killing the sellers' market at the wholesale level than in restraining the consumer.
(d) The very fact that aggregate supply and demand were more nearly in balance meant that some services were not bought which were available : trains, hotels and theatres were not so well filled. Available supply is what determines the tone of the market and the consumer's choice, and it had risen more than the actual purchases. The fact that some of it was "wasted " should not worry us, any more than the sight of some generating plants standing idle in the summer : demand is bound to be irregular in these fields, and a reasonable margin of excess capacity most of the time is preferable to recurrent frustration.

# THE BALANCE OF PAYMENTS 

By R. C. Tress

A comparison between the actual balance of payments of the United Kingdom for the first half of 1948 and the forecast of the Economic Survey for 1948 (Cmd. 7344 ) was made, in advance of the official figures, by Messrs. D. J. Morgan and F. W. Paish in the August issue of this Bulletin. The Treasury figures since published (Cmd.7520) largely confirm the comparisons then made, and figures for the third quarter of the year support the conclusions then expressed regarding the likely future.

Expenditure on purchases from all areas was higher than anticipated and the rise exceeded the rise in export receipts, making the adverse balance of visible trade for the first half of the year a good deal larger than had been provided in the Survey (see Table 1). Hopes of a reduction in the adverse balance of trade with the Western Hemisphere, however, were entirely fulfilled ; for though expenditure on tobacco and manufactures was quite surprisingly larger, money expenditure on raw materials and petroleum was actually less ; and the proportion of our exports going to that area rose, which was not expected.

Correction of previous views is necessary in one respect. In the August article, the same adjustment was assumed to be applicable to our balance of payments as to our balance of visible trade. And since the net loss of gold and dollars was known to have been little more than forecast, reconciliation of dollar movements with the balance of payments estimate was ascribed to an
unexpectedly low rate of capital drain. This was not so. The net capital movement, in fact, was larger than allowed in the Survey: the large change was in the current invisibles. As will be seen from Table 2, there has been a general upward revision of the figures for 1947 compared with the Survey as well as divergences from the forecast for 1948 . The receipts side of the account has been most affected by these changes, though the departure from forecast of the " negative payment " in respect of war disposals and settlements (a terminal item) is to be noted for 1948. The largest, and the most disconcerting changes, are in the net item of miscellaneous receipts and payments. These, we are told, are " the overseas transactions of British oil companies, insurance, expenses on the upkeep of British enterprises abroad, commissions, royalties and private remittances," and revision in their estimates, along with that for receipts from tourists, provides a statistical change of $£ 42 \mathrm{Mn}$. for 1947 and of $£ 64 \mathrm{Mn}$., compared with the forecast, for the first half of 1948. The Chancellor of the Exchequer has specially mentioned (without giving details) an increase in receipts from "the overseas operations of our oil industry " and this may explain most of the improvement in 1948. But it does not explain the revision of the figures for 1947, which brings to light a serious element of uncertainty, suggesting that a substantial margin of error must be attached to any future estimates of the current adverse balance.

TABLE 1.
BALANCE OF PAYMENTS ON CURRENT ACCOUNT FOR THE FIRST HALF OF 1948. (£ Mn.)

|  | ECONOMIC SURVEY FORECAST |  |  |  | OUT.TURN |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Total | Western Hemisphere | Sterling Area | Other Countries | Total | Western Hemisphere | Sterling Area | Other Countries |
| Payments for Imports (f.o.b.) - Food and Feeding-Stuffs | 390 | 123 | 179 | 88 | 427 | 140 | 197 | 90 |
| Raw Materials ... | 280 | 91 | 113 | 76 | 309 | 85 | 118 | 106 |
| Petroleum (Civil) | 47 | 27 | 12 | 8 | 59 | 24 | 6 <br> 3 | 29 |
| Tobacco .......... |  | 26 | 9 | 40 \{ | 14 78 | 11 34 | $\begin{aligned} & 3 \\ & 9 \end{aligned}$ | 35 |
| Total Payments for Imports (f.o.b.) | 792 | 267 | 313 | 212 | 887 | 294 | 333 | 260 |
| Receipts for Exports and Re-exports | 705 | 105 | 355 | 245 | 731 | 117 | 357 | 257 |
| Surplus ( + ) or Deficit ( - ) on Visible Trade | -87 $-\quad 49$ | -162 | $+\quad 42$ $+\quad 28$ | a | 156 $+\quad 16$ | -177 $-\quad 18$ | + 24 $+\quad 46$ | 1 $-\quad 3$ $-\quad 12$ |
| Invisibles (net) ... ... ... | - 49 | - 21 | + 28 | - 56 | + 16 | - 18 | +46 | $-12$ |
| Total Surplus ( + ) or Deficit ( - ) ... | -136 | $-183$ | +70 | $-23$ | $-140$ | -195 | +70 | $-15$ |

[^52]TABLE 2
INVISIBLE RECEIPTS AND PAYMENTS, 1947-1948 (£Mn.)

|  | 1947 |  | 1948, First Half |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Survey | Revised | Survey Forecast | Provisional Out-turn |
| Government Overseas <br> Expenditure |  |  |  |  |
|  |  |  |  |  |
| Military... ... | 211 | 198 | 76 | 76 |
| Less War Disposals and Settloments | -131 | -121 | -27 | $-56$ |
| Relief and Rehabilitation | 62 | 60 | 2 | 9 |
| Germany ... .... |  |  |  |  |
| Administrative, Diplomatic, etc.... | \} -10 f | 36 -46 | 12 | 21 -5 |
| Total Government | 211 | 207 | 70 | 57 |
| Shipping <br> Interest, Profits, Dividends | 163 | 171 | 79 | 84 |
|  | 94 | 102 | 45 | 59 |
| Films (net) | 13 | 14 | 4 | 7 |
| Travel ... | 50 | 73 | 12 | 24 |
| Total Payments | 531 | 567 | 210 | 231 |
| Receipts | 180 | 201 | 99 | 117 |
| Shipping ... |  |  |  |  |
| Interest, Profits, Dividends... | 145 | 152 | 73 | 77 |
| Travel ...Other (net) | -20 | 19 |  | 14 |
|  | -20 | 3 |  | 39 |
| Total Receipts | 305 | 375 | 161 | 247 |
| Net Surplus ( + ) or Deficit ( - ) | -226 | -192 | -49 | $+16$ |

The capital drain continues, therefore, despite inconvertibility, and in the first half of 1948 was larger by $£ 28 \mathrm{Mn}$. than the Survey had provided: $£ 114 \mathrm{Mn}$. instead of $£ 86 \mathrm{Mn}$. As Table 3 shows, it is the product of a number of partially offsetting movements. In 1947, apart from the subscriptions to the International Bank and Monetary Fund, the capital drain to the non-Sterling Area was very small. The main losses of gold and dollars were due to reductions in the sterling balances of, and other capital transfers to, other members of the Sterling Area. In the first half of 1948 (cf. Table 4), the dollar requirements of these members were very much reduced and fresh sterling balances were accumulated. The advantage which this brought to our reserves, however, was more than offset by reductions in the sterling balances of non-Sterling Area countries. The agreement with Argentina provides only a temporary easement and meanwhile a flow of funds (which includes funds taken abroad by emigrants) continues to other parts of the Sterling Area at a greater annual rate than in 1947. Information regarding this item-and hence the possibility of estimating its future magnitude-is very limited; moreover, as the " balancing item" in the capital
account it accommodates all the errors and oversights in the other figures. Exports and re-exports for the third quarter of this year ( $£ 223 \mathrm{Mn}$.) exceeded those of the second quarter by $£ 17 \mathrm{Mn}$., while imports ( $£ 476 \mathrm{Mn}$. f.o.b.) were $£ 8 \mathrm{Mn}$. less. The adverse balance on visible trade for the third quarter (measuring imports f.o.b.), therefore, is reduced to $£ 54 \mathrm{Mn}$., leaving a margin of only $£ 22 \mathrm{Mn}$. for all other movements contributing to the $£ 76 \mathrm{Mn}$. officially estimated as the amount of the quarter's gold and dollar drain. But since current invisibles may yield a surplus, and there will be the Argentine and other capital transactions to provide alternative and offsetting sources of finance, the gold and dollar drain on account of the " miscellaneous" capital movements may still be very large.

TABLE 3
THE GOLD AND DOLLAR DRAIN, 1947-MID-1948 (£Mn.)

|  | $1947$Year | 1948, First Half |  |
| :---: | :---: | :---: | :---: |
|  |  | Survey Forecast | Pro- visional Out-turı |
| Current Items |  |  |  |
| Deficit on Visible Trade | 438 | 87 | 156 |
| Deficit on Invisible Trade | 192 | 49 | -16 |
| Total Current Deficit | 630 | 136 | 140 |
| Capital Items <br> Non-Sterling Area- <br> Gold and Dollar Subscriptions to International Fund and Bank |  |  |  |
|  |  |  |  |  |
|  |  |  |  |  |
| Repayment of U.S. and Canadian Loans.. | 36 |  | 17 |
| Sales and Redemptions of U.S. and Canadian Securities (net) | -21 |  | 4 |
| Transactions under Andes Agreement (net) | -1 |  | -79 |
| Reduction in Sterling Balances Other Capital Transactions... | -2 | 86 | 142 1 |
| Sterling Area- |  |  |  |
| Australian and New Zealand Gifts |  |  |  |
| Reduction in Sterling Balances Other Capital Transactions.. | 147 213 |  | $\begin{array}{r}116 \\ -145 \\ \hline\end{array}$ |
|  |  |  |  |
| Gold and Dollar Drain | 1.024 | 222 | 254 |

Table 4 shows, in the first place, the effect on our gold and dollar reserves of these transactions. At the end of June, 1948, our reserves had been reduced to $£ 473 \mathrm{Mn}$. Since then there has been a further decline of $\{36 \mathrm{Mn}$. for the third quarter. But there is reckoned in the capital account for any date, not the full offset to the E.R.P. purchases made so far, but only the amount for which reimbursements have been received. Thus, at the end of the third quarter, $£ 183 \mathrm{Mn}$. had been

TABLE 4
CHANGES IN GOLD AND DOLLAR RESERVES, 1947 TO MID. 1949 (£Mn.)

${ }^{(1)}$ Net of purchases of new gold from Sterling Area.
${ }^{2}$ ) Cmd. 7520. In Cmd. 7545 , U.K. expenditure has been revised to $£ 585 \mathrm{Mn}$. and the total of other withdrawals is raised to $£ 439 \mathrm{Mn}$., but the details of this latter total are not provided.
authorised and spent, but only $£ 63 \mathrm{Mn}$. had been received ( $£ 22 \mathrm{Mn}$. in the second quarter and $£ 41 \mathrm{Mn}$. in the third).

The latest official statements on the balance of payments are contained in a memorandum to O.E.E.C. and E.C.A. (Cmd. 7547), providing a "revised programme " for the period July, 1948, to June, 1949. Here is laid down, as a principle of Government policy, the intention " to maintain
the reserves throughout the period at their level at the beginning of the period, i.e., limiting dollar outgoings to dollar income plus external aid." The last column of Table 4 shows how this undertaking is expected to work out. The Marshall Aid due to the United Kingdom for the twelve months is $£ 313 \mathrm{Mn}$., and dollar import programmes have been drawn up which, unless the Canadian credit is re-opened, exports are higher than forecast or other dollar drainings are lower, will just absorb that amount. The amount of aid outstanding as a result of the lag between expenditure and reimbursement is thus assumed to be the same at the end of the period as at the beginning-including both loan and grant, some $£ 74 \mathrm{Mn}$. The lag was, in fact, greater than this ( $£ 120 \mathrm{Mn}$.) at the end of September, but whatever the amount, it will eventually accrue to our reserves, and if the present programme is the final interpretation of the principle, our reserves should eventually rise to $£ 547 \mathrm{Mn}$.

The " revised programme" provides for the maintenance of the recent rate of total exports ( $137 \%$ of 1938 by volume) as an average for the period ahead. A higher figure than 137 is hoped for and a substantially higher export " target " has been set; but, wisely, import and dollar policies do not rely on its being hit. The programme requires a further expansion in exports to the Western Hemisphere of more than $6 \%$ above what, on the Government's own evidence, was a surprising achievement for the first half of this year, and it is on success at this point that the achievement of a dollar balance will mostly turn. But it should also be noted that the provision for other gold and dollar transactions in the twelve months, presumably after allowing for the $£ 22 \mathrm{Mn}$. of Marshall Aid to Eire and Iceland-the only other countries in the Sterling Area directly benefitingis only $£_{3} 39 \mathrm{Mn}$., whereas the loss on these accounts in the first half of this year was at three and a half times that rate.
E.R.P. makes mastery over the dollar drain possible for the immediate period ahead ; it does not make it easy. And the longer term prospect, as was suggested in the last Bulletin, provides at best for an uneasy optimism.

## A CHECK TO THE PRICE RISE?

By R. G. D. Allen

Index numbers of wholesale prices agree in showing a slight fall from a high point reached in June. If allowance is made for seasonal factors, indicators of prices of domestic agricultural produce and of retail prices have remained approximately constant for some months. Even the index of import prices, which rose sharply in the first and second quarters, has changed little since June. This looks very much like the long-awaited sign that a halt has been called in the persistent upward movement of prices since 1945. The questions are whether the index numbers can be trusted, whether the halt (if verified) is temporary or whether it will be followed by a fall in prices. These are important questions, and, clearly we must be careful, indeed cautious, in reaching conclusions.

First let us look at the evidence. And here we must bear in mind that most of the available index numbers are not of recent construction. The passage of time alone makes us more than a little suspicious of them. Further, the present price structure is so abnormal-so rigged with subsidies, taxes and controls-that an index designed for pre-war conditions is no longer likely to be a quick and reliable indicator of a change in trend.

The general index numbers are set out in Table 1. The impression they give is that prices are no longer rising; even the agricultural price index shows no more than the seasonal rise (mainly due to milk prices). In particular,
there is some sign that the unfavourable trend in the terms of trade has been halted. ${ }^{1}$ )

A more detailed analysis of prices changes is needed and many different groupings suggest themselves. A quick and preliminary analysis is offered here as a convenient way of bringing out some of the problems.

Table 2 relates to prices of foodstuffs, with which tobacco is often (and drink sometimes) included. We see, first, clear signs of a halt in the price rise. Import prices have scarcely changed since June. Among prices received by farmers, a rise in grain prices offsets a fall in livestock prices. In any case, no great change is to be expected as agricultural prices tend to be agreed at yearly intervals. Prices at wholesale and at retail have certainly not risen and there may be a more than seasonal fall. (The June figure for retail prices should be ignored as it was raised by the early introduction of the price of new potatoes.)
${ }^{(1)}$ The index numbers selected for imports, exports and the terms of trade are those of average values, not of prices. They are intended to show changes in what we pay for imports and in what we get for exports, taking full account of the varying direction of trade. They are not intended to show changes in the world prices of particular commodities. For example, even if all prices overseas remain unchanged, the elimination of many of the imports from the relatively dear U.S. market, which occurred late in 1947, has the effect of reducing the import index. This is the correct approach, not only to the terms of trade, but also to the problems of our domestic price structure; what matters is the price of the imports we actually bring in, not of the imports we might have continued to take. On the other hand, there is the risk that the index numbers may be unduly influenced by quality changes.

|  | Average |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 1946 | 1947 | Jan. | Feb. | Mar. | Apr. | May | June | July | Aug. | Sept. |
| *Average Values of- Ald |  |  |  |  |  |  |  |  |  |  |  |  |
| Exports ... |  | 196 | 222 | 280 | 286 | 288 239 | 294 242 | 298 242 | 302 | 304 242 | 304 246 | 301 249 |
| $\dagger$ Terms of Trade | ... | 108 | 116 | 119 | 120 | 120 | 121 | 123 | 124 | 126 | 124 | 121 |
| $\ddagger$ Agricultural Prices |  | 204 | 224 | 270 | 268 | 259 | 239 | 221 | 221 | 222 | 236 |  |
| §Wholesale Prices: |  |  |  |  |  |  |  |  | - |  |  |  |
| Statist Index |  | 205 | 247 | 277 | 280 | 283 | 283 | 287 | 292 | 288 | 287 | 285 |
| Economist Index |  | 176 | 204 | 218 | 220 | 224 | 223 | 226 | 228 | 226 | 225 | 227 |
| B. Trade Index... |  | 173 | 189 | 209 | 214 | 214 | 216 | 217 | 219 | 219 | 218 | 217 |
| \||Retail Prices |  | 149 | 160 | 168 | 171 | 172 | 174 | 174 | 177 | 174 | 174 | 174 |

Notes:

* Index numbers of average values (Board of Trade), calculated from annual figures of trade in 1946 and 1947 and extrapolated into 1948 , by use of index numbers of import and export prices.
$\dagger$ Ratio of index numbers of import average values to export average values, representing the volume of exports needed to pay for a given volume of imports.
$\ddagger$ Monthly index numbers (Ministry of Agriculture), based on quotations which are controlled prices or from returns by market reporters, as far as possible at point of first sale by producers in Enlgand and Wales. Full account is taken of government payments (including acreage payments on wheat and potatoes), i.e., index is based on what is received by farmers and not what is paid by distributors.
§ Statist index (end of month prices) comprises a narrow range of items concentrating on basic food and raw materials. Board of Trade index (average monthly prices) comprises a wider range of items, based on quotations after subsidies to the stage in question, i.e., lower (subsidised) prices as paid by domestic manufacturers and distributors. Economist index (end of month prices) is rather less wide in scope than Board of Trade index. See p. 143.

Secondly, we can see the broad effects of subsidies on the price rise since 1938. Average values (c.i.f.) of imported food, drink and tobacco at September 1948 were nearly three times the 1938 level ; the figure would be even higher if drink and tobacco were excluded. The corresponding multiple for prices paid to domestic farmers (apart from seasonal changes) is about $2 \frac{1}{2}$ times. For wholesale prices of food and tobacco, as recorded by the Board of Trade with allowance for many of the subsidies, the figure is under double. Finally, prices at retail (market prices including the full effect of subsidies and indirect taxes) are $1 \frac{3}{4}$ times 1938 for food and tobacco and $1 \frac{1}{2}$ times for food alone. Some part of their difference is due to the fact that a price rise generally diminishes between the import and retail stage. But, in the main, they arise because of subsidies.

There are, however, certain important differences between groups of foodstuffs. Imported grain and flour prices are more than three times the 1938 level, imported meat only $2 \frac{1}{4}$ times. $\left(^{2}\right)$ There is a similar (but smaller) difference between the rises in prices paid to farmers for grain and for livestock. Subsidies have served to eliminate these differences and the wholesale prices of both cereals and meat stand at only $60 \%$ above 1938. The subsidies on flour, bread and feeding-stuffs amount to nearly $£ 170 \mathrm{Mn}$. per year and on meat and bacon to about $£ 75 \mathrm{Mn}$.
$\left.{ }^{( }{ }^{2}\right)$ In the second quarter of 1948, average values of imports $(1938=100)$ were: Grain and flour 316; Meat 224; Dairy Produce 270; Other foods 311 ; Tobacco 231.
per year (Hansard, September 24th, col. 209). Other imported foods, particularly sugar, show large price rises over 1938, moderated by subsidies at the wholesale and retail stages. $\left({ }^{3}\right)$

Table 3 relates similarly to materials and fuel. Again there are indications that the long price rise is coming to an end, but less evidence of any general decline in prospect. There have been, in fact, conflicting movements in recent months; some prices (e.g. textiles) have been reduced, others (e.g. metals) have risen. Coal prices have been raised twice this year, in January and July.

Except for iron and steel, subsidies are not much used in this sector. The dominating factor is price control. Consequently, changes in price of particular items can be large but infrequent. One result is that different index numbers of wholesale prices can show very different movements month by month, according to what items are included or excluded. The Statist and Board of Trade index numbers have first diverged and then converged again since 1946. At July 1946, they agreed at $208 \%$ of the 1938 level. The Statist index then shot ahead of the Board of Trade because of the heavy weight given to price rises in October, 1946 in cotton,

[^53] TABLE 2 -FOOD PRICES
(Average $1938=100$ )


TABLE 3.-MATERIALS AND FUEL PRICES
(Average $1938=100$ )

| Average |  |  |  |  |  |  | $\begin{aligned} & 1948 \\ & \text { May } \end{aligned}$ | June | July | Aug. | Sept. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Jan. | Feb. | Mar. | Apr. |  |  |  |  |  |
| Average Values of Imports of Raw Materials | 221 | 278 | 318 | 322 | 324 | 341 | 347 | 353 | 358 | 359 | 349 |
| Wholesale Prices : |  |  | 332 |  |  |  |  |  |  | 342 |  |
| Materials (Statist) Basic Materials, ex fuel (B. of T T ) | 231 206 | 291 246 | 332 312 | $\begin{aligned} & 334 \\ & 316 \end{aligned}$ | $\begin{aligned} & 337 \\ & 316 \end{aligned}$ | $\begin{aligned} & 338 \\ & 320 \end{aligned}$ | $\begin{aligned} & 344 \\ & 325 \end{aligned}$ | $329$ | $329$ | 324 | $322$ |
| Coal, Domestic and Export (B. of Trade) | 198 | 204 | 238 | 238 | 238 | 238 | 238 | 238 | 241 | 245 | 245 |
| Retail Prices : <br> Fuel and Light | 142 | 147 | 159 | 160 | 160 | 159 | 160 | 160 | 161 | 161 | 162 |

hemp and jute and in olive oil and linseed. Subsequently, in July 1947 and January 1948, the Board of Trade index increased sharply in its turn because of the heavy weighting of price rises in paper-making materials, hides and skins. Neither index is, therefore, satisfactory. On the whole, the Board of Trade index is to be preferred, being confined to basic materials and making use of more quotations. It would be lower, however, if paper-making materials were given less weight and non-ferrous metals greater weight, as would seem appropriate.

It can be concluded that, at September 1948, prices of imported basic materials were $3 \frac{1}{2}$ times, and wholesale prices rather more than 3 times, the 1938 level. Prices of textile raw materials have risen more and prices of metals less, though recent changes have reduced the disparity. Coal prices now show considerable differentiation. Export prices are over 3 times 1938, prices for coal in the coast-wise trade and for industrial coal about $2 \frac{1}{2}$ times and prices of domestic coal about double. The retail coal price is about $75 \%$ above 1938 ( $60 \%$ above 1938 for fuel and light as a group).

Prices of manufactures, shown in Table 4, are less well represented in available index numbers. ${ }^{4}$ ) One comparison can be made, though very roughly indeed, between wholesale prices of manufactures and retail prices of clothing, household and miscellaneous goods. They are not inconsistent, each being now nearly double the 1938 level. The comparison is rough, however, since the wholesale prices are generally recorded far from the final stage of manufacture and since retail prices
${ }^{(4)}$ The Board of Trade index of wholesale prices has two groups called intermediate products and manufactures. The latter title is deceptive; it includes virtually no finished products, either capital or consumer goods. Paper, leather and their products are not included at all. Neither are machinery, vehicles, electrical goods and furniture, though iron and steel products and timber are included. The intermediate index generally represents items at an early stage (pig iron, cotton yarn, timber). The manufactures index is dominated by iron and steel products and chemicals. Between them they are perhaps a better index of prices of capital goods than consumer goods.
include purchase tax. Tax changes probably account for the higher price rise at retail in 1946-47.

A more interesting comparison is between wholesale and export prices of manufactures. Since manufactures in the sense of the Trade Returns include practically everything except basic materials, the wholesale index to use is the combination of intermediate products and manufactures. This wholesale index is now steady at rather more than double the 1938 level; the export price index is $2 \frac{1}{2}$ times 1938. Prices of machinery, vehicles, etc., have risen more than those of iron and steel products ; the former, well represented in exports, are not included in the wholesale price index. But the difference is more largely due to the fact that the wholesale index is composed almost entirely of domestic prices which are controlled and (in the case of iron and steel) subsidised. Export prices are not subject to the same control and, indeed, something is gained on the swings here to compensate for the loss on the roundabouts of home prices.

The evidence, therefore, supports the contention that the rise in most prices was halted in the middle of the year. This is clear for prices of agricultural products in the broad sense, including (e.g.) textiles as well as foodstuffs. Indeed, there is some indication of a fall in these prices. On the other hand, the prices of other materials, particularly metals and coal, have recently risen and may continue to rise. It should be noted that there are great disparities between the price rises (since 1938) in various commodities. Agricultural prices have generally increased more than prices of metals and their products. Amongst the former, prices of grains and textiles have risen more than those of livestock, meat and dairy produce. There has recently been some re-alignment and the signs are for a continued decrease in the gap between agricultural and metals prices. This is to be expected, in view of the improved world harvests and the demands of re-armament, particularly in the U.S.

It would be easy to exaggerate the effect of any

TABLE 4.-PRICES OF MANUFACTURES (Average $1938=100$ )

| Wholesale Prices (B. of Trade) : |  | Average |  |  | Feb. | Mar. | Apr. | $\begin{aligned} & 1948 \\ & \text { May } \end{aligned}$ | June | July | Aug. | Sept. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 1946 | 1947 | Jan. |  |  |  |  |  |  |  |  |
| Intermediate Products |  | 187 | 214 | 229 | 234 | 236 | 236 | 238 | 240 | 240 | 239 | 239 |
| Manufactures |  | 155 | 168 | 184 | 185 | 187 | 190 | 190 | 191 | 190 | 190 | 191 |
| Combined Index Retail Prices : |  | 168 | 187 | 202 | 205 | 206 | 209 | 210 | 211 | 210 | $\underline{190}$ | 210 |
| Clothing ... ... |  | 171 | 175 | 180 | 181 | 184 |  |  |  |  |  |  |
| Household Durables |  | 205 | 219 | 231 | 231 | 232 | 185 | 188 | 190 231 | 192 232 | 196 232 | 198 |
| Miscellaneous Goods |  | 141 | 148 | 161 | 161 | 161 | 157 | 158 | 158 | 158 | 158 | 158 |
| Average Values of Exports | of | 175 | 182 | 191 | 192 | 193 | 192 | 194 | 195 | 196 | 198 | 200 |
| Manufactures ... ... | ... | 193 | 222 | 235 | 238 | 239 | 242 | 242 | 243 | 242 | 246 | 249 |

break which may occur in world prices for agricultural products. Because of existing longrun contracts, U.K. import prices would fall less sharply and less quickly. As the fall spreads through the internal price structure, it would be further cushioned. On subsidised foodstuffs, the cost of the subsidies may be reduced or prices at wholesale and retail may fall. But to the extent that subsidies are reduced, prices will not fall. On non-subsidised items, a quicker translation into lower wholesale and retail prices would be expected, particularly for textiles on which subsidies have recently been removed
with a reduction in demand relative to supply.
The effect on the terms of trade, which already show signs of improvement, must also be qualified. Export prices may hold or increase for some time, so that any fall in import prices is reflected in improved terms of trade. In the longer run, however, the improvement may not be maintained. A falling-off in the demand for British exports, particularly by agricultural countries, would necessitate lower export prices, even of metal products, and the terms of trade would worsen again or the expansion in the volume of exports could not continue.

# THE INDEX OF INDUSTRIAL PRODUCTION 

By C. F. Carter and W. T. Osborn

(on behalf of the Group of the Department of Applied Economics, Cambridge, responsible for the Index.)

The most striking feature of the latest figures for the London and Cambridge Economic Service index of production is the fall caused by holidays in the summer quarter, with August naturally showing the lowest figure 107. As presented in the table, the index is a measure of the weekly rate of production, and from the outset its most obvious fluctuations (apart from the fuel crisis) have been those caused by the fall in the average weekly rates for the months when holidays are taken. But another concept worth measuring is the rate of production per actual working day. Our index in the table is so constructed that it does not show a fall in any month merely because it has a large number of Saturdays and Sundays; this new concept of the rate of production would also be adjusted for the number of days lost through summer holidays, bank holidays, and so on. It would fluctuate with seasonal influences other than holidays (such as the effect of bad weather on building, or the varying incidence of sickness), but it would show, more clearly than our present index, the underlying trend of production.

## Production per Working Day

To obtain an index of production per working day we ought strictly to correct each separate constituent series appropriately. Gas production, for instance, is continuous, and needs no correction for holidays; but the production of steel fell $22 \%$ between June and July, and this was mostly due to holidays. We ought to take notice, too, of the dates of Lancashire wakes, of Newcastle race week, of the miners' rallies, and all the other factors
which cause the timing of holidays to vary from one industry to another. But the recalculation of the entire index in this way would be a very large task, and we have tried to approximate to the result by applying a single correction to the final ' A' index.

We started by setting against each month an estimate of the number of days' holiday it contained. We did not attempt any great refinement in these estimates, but simply followed these rules :-

| Easter... $\quad \ldots$ |  |
| :--- | :--- |
| Whitsun $\ldots$ |  |
| V-Day (1946).... |  |
| Christmas |  |
| Summer holidays- |  |
| June $\quad \ldots$ |  |
| July | $\ldots$ |
| August | $\ldots$ |
| September $\ldots$ |  |

[^54]ummer holidays-
July
September

We did not try to allow for any variation in the pattern of summer holidays from year to year, despite certain indications in the rail traffic figures.

Having obtained estimates for holidays, we first multiplied the index by the ratio of " normal" working days (Monday to Friday and Saturday morning) to actual working days. This produced an index which showed humps in most of the places where our present index shows troughsin other words, we had apparently overcorrected for holidays. There are two reasons for this. One is the existence of industries (like gas) which do not stop production; by applying a single factor to the whole index, we had corrected a part which did not need correcting. The other reason is that some workers
work harder or do overtime just before or after holidays (e.g., to earn money for Christmas, or to " catch up with their work ") ; others work harder while their comrades are away. In strict logic this source of variation ought to be left in the figures. However, it obscures the basic trends, and we have (after inspecting the figures) removed both these causes of " overcorrection" by scaling down all our correcting factors by one-third. The adjoining table therefore shows an approximate index of production " per actual working day undisturbed by the nearness of holidays." As the adjustments are all upwards the 1946 average is now 103. The usual " A " index is shown for comparison, in italics.

The series of " Production per working day" is very much smoother than the present index. January still emerges as a bad month for produc-

PRODUCTION PER WORKING DAY AND PER WEEK.
(Base : Average weekly rate of production in $1946=100$.)

|  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Jan. | 89 | 89 | 107 | 107 | 117 | 117 |
| Feb, | 95 | 95 | 85 | 85 | 123 | 123 |
| March | 96 | 96 | 102 | 102 | 124 | 115 |
| April | 99 | 93 | 112 | 104 | 123 | 123 |
| May | 102 | 102 | 113 | 108 | 121 | 116 |
| June | 103 | 97 | 117 | 115 | 125 | 123 |
| July | 103 | 97 | 111 | 105 | 119 | 112 |
| Aug. | 105 | 93 | 115 | 101 | 121 | 107 |
| Sept. | 110 | 107 | 117 | 114 | 123 | 120 |
| Oct. | 112 | 112 | 121 | 121 |  |  |
| Nov. | 113 | 113 | 122 | 122 |  |  |
| Dec. | 113 | 107 | 122 | 114 |  |  |
| Year (av.) | 103 | 100 | 112 | 108 |  |  |

## INDEX OF INDUSTRIAL PRODUCTION (Excluding Finished Munitions)

## 1946 average $=100$

| Period | Total Index |  |  |  |  |  |  |  |  |  |  | Building, Building Materials <br> \& Furniture |  | $\begin{aligned} & \text { 믕 } \\ & 0 \\ & 0 \\ & 0 \\ & 0 \end{aligned}$ | $\begin{aligned} & \text { du } \\ & \text { and } \\ & \text { on } \\ & \text { in } \end{aligned}$ |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | A | B |  |  |  |  |  |  |  |  |  | A | B |  |  |  |
| Weight | 1000 | 1011 | 77 | 51 | 62 | 27 | 31 | 116 | 118 | 120 | 59 | 105 | 116 | 144 | 51 | 39 |
| Av. 1935* | 99 | 98 | 142 | (123) | 75 | 47 | 108 | (74) | (84) | 94 | (76) | (153) | (138) | 87 | (127) | 100 |
|  | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 |  |  |  |  |  |  |  |
| $\begin{gathered} \text { Av. } 1947 \\ 1946 \end{gathered}$ | 108 | 107 | 105 | 107 | 101 | 96 | 119 | 123 | 107 | 100 | 100 | 1100 | 100 109 | $\begin{aligned} & 100 \\ & 103 \end{aligned}$ | 100 | 100 |
| 1 lst Qr. | 93 | 94 | 97 | 94 | 98 |  | 73 |  |  |  |  |  |  |  |  |  |
| 2ND Qr. | 97 | 98 | 98 | 99 | 101 | 102 | 98 | 98 | 96 | 100 | 99 | 91 | 95 | 104 97 | 93 | 91 97 |
| 3Rd Qr. 4 TH Qr. | 99 111 | 98 110 | 99 106 | 101 106 | 96 105 | 102 99 | 101 | 97 | 101 | -97 | 99 99 | 111 | 109 | 97 97 | 98 | 97 101 101 |
| $\begin{gathered} 4 \mathrm{TH} \mathrm{Qr} . \\ 1947 \end{gathered}$ | 111 | 110 | 106 | 106 | 105 |  | 129 | 115 | 112 | 104 | 103 | 124 | 114 | 107 | 115 | 111 |
| JAN. <br> FEB | 107 | 106 | 103 | 115 | 104 |  | 117 | 109 |  |  | 96 |  |  |  |  |  |
| FEB. ${ }^{\text {MAR. }}$. ${ }^{\text {a }}$ | 85 102 | 85 102 | 72 100 | 77 94 | 83 83 93 | 96 | 60 | 100 | 75 | 81 | 80 | 112 79 | 103 | 1109 | 109 91 | 108 83 |
| APR. . . . | 102 | 102 | 100 102 | $\begin{array}{r}94 \\ 103 \\ \hline\end{array}$ | 93 102 |  | 100 | 112 | 107 | 97 | 95 | 98 | 91 | 109 | 101 | 114 |
| MAY. | 108 | 108 | 109 | 108 | 103 | 88 | 142 | 115 | 104 | 98 | 95 | 111 | 105 | 100 | 106 | 105 |
| JUNE. | 115 | 113 | 110 | 120 | 109 |  | 128 | 131 | 115 | 104 | 105 | 119 129 | 111 | $\begin{aligned} & 99 \\ & 98 \end{aligned}$ | 114 | 113 |
| JULY <br> AUG. | 105 | 104 | 104 | 112 | 94 |  | 127 | 114 | 105 |  |  |  |  |  |  |  |
| AUG. <br> SEPT | 101 | 100 113 | 104 | 103 | 95 | 92 | 108 | 112 | ${ }^{105}$ | 102 98 | $\stackrel{99}{95}$ | 117 | 1109 | 88 | 98 104 | 110 106 |
| OCT. ... | 121 | 119 | 118 | 117 | 108 |  | 133 | 128 | 116 | 105 | 106 | 130 | 119 | 99 | 110 | 127 |
| NOV. ... | 122 | 121 | 121 | 115 | 1112 |  | 1 | 145 | 121 | 108 | 112 | 137 | 124 | 108 | 110 | 128 |
| DEC. 1948 | 114 | 111 | 110 | 101 | 103 | 109 | 118 | 154 | 122 | 106 96 | 114 | 141 131 | 1126 | 115 | 109 99 | 135 |
|  |  | 116 |  |  |  |  | 136 | 144 | 117 | 96 | 105 | 131 | 114 |  | 99 | 121 |
| FEB. | 123 | 120 | 124 | 122 | 117 | 81 | 136 128 | 139 | 117 | 97 | 113 | 128 | 113 | 117 | 109 | 134 |
| MAR. . | 115 | 112 | 116 | 99 | 114 | 81 | 125 | 154 | 118 | ${ }_{95}^{96}$ | 118 | 138 | 121 | 117 | 108 | 143 |
| APR. | 123 | 121 | 126 | 113 | 117 |  | 132 | 155 | 109 | 98 | 118 | 135 | 116 | 109 | 101 | 135 |
|  | 116 | 114 | 118 | 98 | 111 | 105 | 134 | 149 | 101 | 101 | 113 | 143 | 123 | 105 | 105 | 159 <br> 124 |
|  | 123 | 121 | 124 | 111 | 116 |  | 144 | 159 | 105 | 105 | 114 | 147 | 128 | 110 | 110 | 150 |
| JULY AUG. SEPT. | $\begin{gathered} 112 \\ 107 \\ 1120 \end{gathered}$ | $\begin{array}{r} 109 \\ 105 \\ \hline 178 \end{array}$ | $\begin{aligned} & 113 \\ & 111 \end{aligned}$ | 96 94 | $\begin{array}{r}96 \\ 100 \\ \hline\end{array}$ | 90 | 139 100 | 141 135 | 96 91 | 100 98 | 110 109 | 143 129 | 125 | 97 97 | 111 | 123 |
|  |  | (118) |  |  | - |  | 139 |  |  | 102 | 116 | 147 |  |  |  |  |

[^55]tion (and this can hardly be due to the Scots!), and the autumn spurt (between September and October) is still appreciable. But the trends stand out more clearly. In 1946 production was increasing by nearly $2 \%$ per month. The fuel crisis lost us five months, from December 1946 to May 1947, and the advance was then resumed for a further six months at $1 \frac{1}{2} \%$ per month. If the same rate of increase had continued, the index would by this autumn have been between 135 and 140 ; but it is still sticking at 123, only about the level of last November. We have evidently entered upon a new and stubborn phase, in which no easy increases of production are to be won by reconversion and demobilisation. But, as we reported last quarter, the proportion of goods exported is still rising. The implication is that we have lost one of the best deflationary forces-a rising flow of goods to the home market.
The Comparison with 1935
The British Iron and Steel Federation have published, in their Bulletin for August, an index of steel output from 1938 to the present, which enables us to improve the 1935 comparison for this industry, previously based on the output of steel ingots and castings and on imports of ingot and semi-finished steel. The 1935 figure for the Metal Production group has, however, only been reduced by 1. The 1935 figure for the Chemicals group is being examined further, in consultation with the trade, and must be regarded as tentative only. Figures of productivity in this trade based on our index, and published in The Economist of August 14th, 1948, used an earlier estimate of the 1935-1946 movement, which we have since withdrawn.

In the August issue of the Monthly Digest of Statistics the Central Statistical Office published a comparison of industrial production in 1935-38 and 1946. The figures are stated to be " very approximate and liable to subsequent revision." The four subdivisions given do not correspond to any of our groups. The C.S.O.'s "Total-all industries " includes changes in work in progress, and may therefore be set alongside our "B" index, as follows :-

|  | C.S.O. <br> Index | L.C.E.S. <br> B |  | C.S.O. <br> Index | L.C.E.S. <br> Index |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  | Index |  |

The figures have not re-appeared in the September Digest, but we are glad to note that a full description of both the 1935 comparison and the monthly Interim Index is to be published. With this before us, we may be able to comment on the reasons for the divergence between the two indices. One obvious reason is that our index excludes finished munitions, while the C.S.O. index, at least nominally, includes them.

A full description of our own index, with a discussion of the methods used and some historical comparisons, is being published by the Cambridge University Press under the title of "The Measurement of Production Movements " -(Monograph No. 1 of the Department of Applied Economics, Cambridge : 12/6d.). Table 1 in this monograph gives a cruder version of the " production per working day " index shown above. The revision of the steel figures, however, has taken place since the monograph went to press.

## FINANCE

By F. W. Paish

Government Finance.-For the second quarter of the $1948 / 9$ financial year Ordinary Revenue totalled $£ 831 \mathrm{Mn}$., and Ordinary Expenditure $£_{0} 751 \mathrm{Mn}$., giving a conventional surplus of $£ 80 \mathrm{Mn}$., as compared with a deficit of $£_{£ 1 \mathrm{Mn} \text {. in the corresponding quarter of last }}$ year. Revenue for the quarter was, however, swelled during August by $£ 45 \mathrm{Mn}$. of Miscellaneous Receipts, derived from the sale of British Government stores and installations in India against the cancellation of a corresponding amount of Indian sterling balances. If we deduct from Revenue not only Miscellaneous Receipts,
but also such other exceptional items as the proceeds of Sales of Surplus War Stores, Surplus Receipts from Trading and the yield of the Special Contribution, we find a deficit for the quarter of $£ 40 \mathrm{Mn}$., as compared with a deficit of £ 104 Mn . in the second quarter of $1947 / 8$. On the same basis, the first half of the financial year showed a surplus of $£ 102 \mathrm{Mn}$. as against a deficit of $£ 78 \mathrm{Mn}$. in the first half of $1947 / 8$, or a net improvement of $£ 180 \mathrm{Mn}$. This is equivalent to about $47 \%$ of the estimated improvement, on the same basis, for the whole financial year. It would therefore seem that, whatever may happen
in the future, the expectations of improvement implied in the 1948/9 Budget have so far been approximately fulfilled.

TABLE 1.
ORDINARY REVENUE AND EXPENDITURE.
Weekly Average, $1 \mathrm{£Mn}$.

|  |  | Ordinary Revenue Total | Expenditure |  | Surplus $(+)$ or Deficit (-) |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Supply Services | Total |  |
| 1938/9* |  |  | 17.8 | $15 \cdot 8$ | $20 \cdot 2$ | $-2.4$ |
| $\begin{aligned} & 1945 / 6 \\ & 1946 / 7 \\ & 1947 / 8 \end{aligned}$ |  | $62 \cdot 9$ | $95 \cdot 7$ | $104 \cdot 9$ | $-42.0$ |
|  |  | $64 \cdot 0$ | $63 \cdot 9$ | $74 \cdot 9$ | $-10.9$ |
|  |  | 73.5 | $50 \cdot 7$ | $59 \cdot 9$ | $+12 \cdot 6$ |
| 1938/9* Apr.-June July-Sept. Oct.-Dec. <br> Jan.-Mar. |  | $10 \cdot 1$ | $12 \cdot 0$ | 18.0 | $-7 \cdot 9$ |
|  |  | $13 \cdot 3$ | $15 \cdot 3$ | $18 \cdot 1$ | -4.8 |
|  |  | $14 \cdot 0$ | $15 \cdot 7$ | 21.6 | $-7 \cdot 6$ |
|  |  | $34 \cdot 0$ | $20 \cdot 2$ | 23.2 | $+10.8$ |
| 1946/7 | Apr.-June | $48 \cdot 4$ | $61 \cdot 3$ | $69 \cdot 4$ | $-21.0$ |
|  | July-Sept. | $54 \cdot 2$ | $54 \cdot 2$ | $69 \cdot 9$ | $-15 \cdot 7$ |
|  | Oot.-Dec. | $56 \cdot 2$ | $58 \cdot 1$ | $65 \cdot 5$ | $-9.3$ |
|  | Jan.-Mar. | $98 \cdot 1$ | $83 \cdot 3$ | $95 \cdot 6$ | $+2.5$ |
| 1947/8 | April-June | 64-6 | $38 \cdot 6$ | $47 \cdot 7$ | +16.9 |
|  | July-Sept. | $61 \cdot 4$ | $50 \cdot 0$ | 61.5 | $-0.1$ |
|  | Oot.-Dec. | 57.9 | $47 \cdot 3$ | 56.0 | $+1.9$ |
|  | Jan.-Mar. | $110 \cdot 4$ | $67 \cdot 1$ | $78 \cdot 7$ | $+31 \cdot 7$ |
| 1948/9 | Apr.-June | $61 \cdot 1$ | 38.5 | $47 \cdot 2$ | $+13 \cdot 9$ |
|  | July-Sept. | $63 \cdot 2$ | $46 \cdot 2$ | $57 \cdot 1$ | $+6 \cdot 1$ |
|  | July 1-31 | $59 \cdot 6$ | $45 \cdot 1$ | $50 \cdot 2$ | $+9.4$ |
|  | Aug. 1-28 <br> Aug. 29- | $74 \cdot 6$ | $40 \cdot 2$ | $57 \cdot 7$ | $+16.9$ |
|  | Sept. 30 | $57 \cdot 0$ | $52 \cdot 5$ | $63 \cdot 2$ | $-6 \cdot 2$ |
|  | Oct. 1-30 | 56.7 | $46 \cdot 3$ | $59 \cdot 0$ | $-2 \cdot 3$ |

* Including expenditure under the Defence Loans Acts, 1937 and 1939

Extra-budgetary payments continued their fall from the peak of $£ 266 \mathrm{Mn}$. reached in the quarter ending last December, and at $£ 95 \mathrm{Mn}$. were $£ 52 \mathrm{Mn}$. lower than in the previous quarter. The chief reductions were in the costs of housing and coal nationalisation, while cotton-buying yielded a surplus instead of a deficit.

| TABLE 2. |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| EXTRA-BUDGETARY |  | AYMENT | , 1948. | £Mn. |
|  | July (31 days) | Aug. (28 days) | Sept. (33 days) | $\begin{gathered} \text { Total } \\ \text { (92 days) } \end{gathered}$ |
| Net E.P.T. Refunds . | 0.7 1.9 | 0.6 | 0.7 1.3 | $2 \cdot 0$ |
| Net War Damage Payt |  |  |  | 4.5 |
| W.D.C. | 11.0 | $8 \cdot 0$ | $9 \cdot 0$ | 28.0 |
| Board of Trade | $1 \cdot 0$ | 1.0 | 0.5 | 2.5 |
| Housing | 19.9 | 17.4 | $14 \cdot 3$ | 51. |
| Coal Nationalisation. | - | $5 \cdot 0$ | - | $5 \cdot 0$ |
| Cotton Buying | $1 \cdot 6$ | $-5.0$ | $-5 \cdot 5$ | -8.9 |
| Overseas Development | $4 \cdot 5$ | - | 1.2 | $5 \cdot 7$ |
| Civil Contingencies | $5 \cdot 0$ | - |  | $5 \cdot 0$ |
| Other (net) ... | 1.4 | $1 \cdot 6$ | $-3 \cdot 4$ | $-0.4$ |
|  | $47 \cdot 0$ | $29 \cdot 9$ | $18 \cdot 1$ | $95 \cdot 0$ |

The revenue surplus of $£ 80 \mathrm{Mn}$. was not quite sufficient to cover the extra-budgetary payments and, after providing $£ 6 \mathrm{Mn}$. for sinking funds, the Government debt increased by $£ 21$ Mn . The individual items of debt were considerably affected by three exceptional
transactions which took place during the quarter -the sale of assets in India, referred to above, the transfer to the British Government of responsibility for certain pensions, in exchange for the cancellation of an equivalent amount of Indian sterling balances, and the setting up and gradual expansion of a Special Account at the Bank of England as a kind of memorandum of the grants received under the European Recovery Programme. The first of these transactions involved a credit of $£ 45 \mathrm{Mn}$. to Miscellaneous Receipts, and the second and third gross increases of $£ 176 \mathrm{Mn}$. and $£ 54 \mathrm{Mn}$. respectively in "Other Debt-Internal." The counterpart to the first two transactions was a fall in tap Treasury Bills held by the Indian authorities. The setting up of the special account at the Bank of England accompanied the transfer of E.R.P. dollars to the Exchange Equalisation Account, in exchange for the cancellation of tap Treasury bills or Ways and Means Advances.

Net receipts from Tax Reserve Certificates were more than enough to cover repayments of long-term debt, and part of the receipts under E.R.P. (or, more strictly, of the sterling proceeds of the sales of the gold and dollars of which the E.R.P. receipts were a re-imbursement) was available for the repayment of Treasury Deposit Receipts, which fell by $£ 18 \mathrm{Mn}$. during the quarter, while issues of Treasury Bills by tender were unchanged.

| TABLE 3 |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| GOVERNMENT | I BORROWING, |  | 1948. £Mn |  |
|  | July | August | September | Total |
|  | (31 days) | (28 days) | (33 days) | (92 days) |
| Nat. Savings Certs. | $-5 \cdot 4$ | $-1 \cdot 3$ | $2 \cdot 2$ | $-4 \cdot 5$ |
| $2 \frac{1}{2} \%$ Def. Bonds ... | $2 \cdot 0$ | $0 \cdot 9$ | $1 \cdot 5$ | $4 \cdot 4$ |
| Other Debt-Internal | $-0.9$ | 208.5 | $16 \cdot 1$ | $223 \cdot 7$ |
| External | $-0.3$ | -0.8 | $-1.0$ | $-2 \cdot 1$ |
| Repayments | $-15 \cdot 4$ | -11.8 |  | $-33 \cdot 3$ |


| Total Long and Medium-term Borrowing | $-20.0$ | $195 \cdot 6$ | 12.7 | $188 \cdot 2$ |
| :---: | :---: | :---: | :---: | :---: |
| Tax Reserve Certs. ... | $21 \cdot 6$ | $4 \cdot 6$ | $19 \cdot 1$ | $45 \cdot 3$ |
| Treas. Dept. Rects. ... | $-38.5$ | 11.5 | $8 \cdot 5$ | $-18.5$ |
| Treas. Bills-Tap ... | 13.0 | $-234 \cdot 3$ | $41 \cdot 3$ | $-180.0$ |
| W. \& M. Advances- <br> Govt. Depts. <br> Bank of England | 30-7 | $-14 \cdot 4$ | $-30 \cdot 3$ | $-14 \cdot 0$ |
| Short-term Borrowing | 26.8 | $-232 \cdot 6$ | $38 \cdot 6$ | $-167 \cdot 2$ |
| Total Borrowing | 6.8 | $-37 \cdot 1$ | $51 \cdot 3$ | $21 \cdot 1$ |

In the first week of October $£ 50.1 \mathrm{Mn}$. was released from the Special Account at the Bank of England and devoted to the cancellation of the " Other Debt-Internal " which had been created in making the deposit. This transaction had no economic significance. The addition to the Government's cash resources at home had occurred weeks or months earlier, when the Exchange Equalisation Account sold foreign
exchange to British importers or Government Departments sold imports to the British public.

Other Finance.-The effect of the modest net repayment of Treasury Deposit Receipts during the quarter is seen in a small fall in gross

TABLE 4
NINE CLEARING BANKS (£Mn.)

|  |  | Gross Deposits | Balances with other Banks \& Items in transit | Net Deposits | Increase in Net Deposits in Preceding 12 months |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1945 | March | 4,241 | 137 | 4,104 |  |
|  | June | 4,517 | 174 | 4,343 | 622 |
|  | September | 4,654 | 135 | 4,519 | 599 |
|  | December | 4,609 | 195 | 4,414 | 283 |
| 1946 | March | 4,513 | 158 | 4,355 | 251 |
|  | June ... | 4,797 | 187 | 4,610 | 267 |
|  | September | 5,040 | 155 | 4,885 | 366 |
|  | December | 5,407 | 251 | 5,156 | 742 |
| 1947 | March ... | 5,285 | 168 | 5,117 | 762 |
|  | June ... | 5,382 | 215 | 5,167 | 557 |
|  | September | 5,344 | 159 | 5,185 | 300 |
|  | December | 5,651 | 256 | 5,395 | 239 |
| 1948 | March | 5,524 | 186 | 5,338 | 221 |
|  | April ... | 5,588 | 188 | 5,400 | 262 |
|  | May ... | 5,594 | 227 | 5,367 | 253 |
|  | June . | 5,672 | 223 | 5,449 | 282 |
|  | July . . . | 5,629 | 179 | 5,450 | 281 |
|  | August ... | 5,624 | 172 | 5,452 5,489 | 252 304 |
|  | September | 5,667 5,750 | 178 186 | 5,489 5,564 | 304 328 |
|  | October... | 5,750 | 186 | 5,564 | 328 |

bank deposits and a less than seasonal rise in net bank deposits, though as the check to the upward trend was less pronounced than during the third quarter of 1947, the twelve months' increase in net deposits in September was larger than in June.

The only classes of assets to show appreciable
increases were Discounts, which recovered during the quarter from the low figure recorded in June, and Money at Call and Short Notice. The rise in Advances was trifling, and was more than offset by a small fall in Investments.

The Lloyds Bank seasonally-adjusted index of the gross deposits of eleven clearing banks fell from $261.5 \%$ of 1938 in June to $260.4 \%$ in September. The falling level of the Government's extra-budgetary expenditure gives some ground for hoping, in the absence of a very sharp increase in expenditure on defence, that the Treasury will continue to be able to abstain from borrowing from the banks and that the check to the rise in bank deposits will be maintained.

The strength of the budgetary position, which implies a high level of genuine Government saving, has also been reflected in the persistent strength of fixed interest securities, for which our mid-month index of prices has risen steadily from 135.2 in July to 137.7 in October. Despite the publication of some less favourable company reports, prices of industrial securities have recovered a large part of their June fall, and our mid-month index has risen from 161 in July to 172 in October, perhaps partly on expectations concerning the possible direct and indirect effects of re-armament. The Midland Bank's figures of new capital issues are, however, again below those of the corresponding quarter of 1947.

## WAGES

By A. L. Bowley

The award of a flat increase of 5 s. per week to the national bonus for all adult male workers in the engineering industry, with an equal increase for shipbuilders, raised our indexnumber by rather more than $1 \%$ from July to October. Since last December, in spite of the pressure for stationariness in wage-rates, there have been increases in every industry included except agriculture and dock labour, as will be seen in the Table below. Many of the changes have been small, and the weighted average increased between 4 and $5 \%$ only, but in cotton and in the group of women's industries (boots to
shirts in the Table) the increase was over $10 \%$.
Recent information about wages and earnings in coal-mines has resulted in amendments of the index-numbers for coal and the general averages from May 1947. In that month a bonus of about $17 \%$ was arranged for miners who completed five shifts in a week. On reconsideration it is decided to include this as an increase in the alternative index for coal, since this is intended to show the changes in a full week's work without change of occupation. In November 1947 minimum weekly wages were raised with other adjustments, and such data as are available suggest an average

CHANGES IN WEEKLY WAGE RATES.

| Percentage of August, 1939 |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 1945 | 1946 | 1947 | 1947 | 1948 | 1948 |
|  | July | July | July | Dec. | July | Oct* |
| Bricklayers | 133 | 153 | 153 | 166 | 170 | 170 |
| ,. Labourers | 141 | 163 | 163 | 179 | 183 | 183 |
| Printers' Compositors.. | 125 | 137 | 150 | 150 | 163 | 163 |
| Dook Labourers | 123 | 145 | 145 | 145 | 145 | 145 |
| Engineers' Fitters | 141 | 150 | 150 | 150 | 150 | 158 |
| ," Labourers. | $154 \frac{1}{2}$ | 166 | 166 | 166 | 166 | 176 |
| Shipbuilders . | 156 | 167 | 167 | 167 | 167 | 180 |
| Railwaymen | $141 \frac{1}{2}$ | 154 | 165 | 165 | 170 | 170 |
| Cotton ... | 172 | 183 | 183 | 183 | 204 | 204 |
| Wool | 146 | 158 | 169 | 169 | 176 | 176 |
| Local Authorities | 143 | 156 | 165 | 165 | 175 | 175 |
| Trams | 139 | 151 | 151 | 151 | 163 | 163 |
| Lorry Drivers | 135 | 144 | 144 | 144 | $155 \frac{1}{2}$ | $155 \frac{1}{2}$ |
| Boots ... | 137 | 163 | 163 | 163 | 189 | 205 |
| Confectionery | 159 | 169 | 193 | 193 | 214 | 214 |
| Tailoring | 153 | 183 | 183 | 183 | 208 | 208 |
| Shirts .. | 153 | 183 | 183 | 183 | 208 | 208 |
| Tobacco | 132 | 131 | 132 | 132 | 137 | 137 |
| Coal | 204 | 208 | $247 \dagger$ | $272 \dagger$ | $274 \dagger$ | 274 |
| Agriculture | 201 | 230 | 230 | 259 | 259 | 259 |
| Weighted Average | 1531 | 167 | $174 \dagger$ | $180 \dagger$ | $186 \dagger$ | 188 |
| Alternative : Coal ... | 192 | 192 | $219 \dagger$ | $234 \dagger$ | $234 \dagger$ | 234 |
| Weighted Average | 152 | 165 | $171 \dagger$ | $175 \dagger$ | $181 \dagger$ | 184 |
| Excluding Coal | 148 | 162 | 165 | 169 | $175 \frac{1}{2}$ | 178 |

increase for unchanged work of about $7 \%$.* As a result of these two general changes and other causes the average earnings per shift, on which the index in the main part of the Table is based, increased $25 \%$ in 1947. As this entry. is out of character with the general purpose of the Index,

[^56]a second alternative is given in which coal is excluded altogether.

In the following Table comparison is made between the Bulletin Index and that of the Ministry of Labour, with an additional column in which coal is excluded. It is seen that the Bulletin Index shows a greater rise in November,

|  | Wage-rate Index Numbers End of Month |  |  | Retail <br> Prices Index Mid-Month |
| :---: | :---: | :---: | :---: | :---: |
|  | Bulletin |  | Ministry of Labour |  |
|  | General | Excluding Coal |  |  |
| 1947 |  |  |  |  |
| June | 100 | 100 | 100 | 100 |
| July ... | $100 \cdot 6$ | $100 \cdot 8$ | 100 | 101 |
| August ... | $100 \cdot 6$ | $100 \cdot 8$ | 101 | 100 |
| September | 101.4 | 101.7 | 101 | 101 |
| October... | 101.5 | 101.7 | 102 | 101 |
| November | 104.2 | $102 \cdot 9$ | 103 | 103 |
| December | $104 \cdot 2$ | $102 \cdot 9$ | 103 | 104 |
| $1948$ |  |  |  |  |
| January... | 105.0 | $104 \cdot 1$ | 104 | 104 |
| February | 106.1 | $105 \cdot 4$ | 104 | 106 |
| March ... | 106.7 | 106-2 | 105 | 106 |
| April ... | 107-1 | 106.4 | 105 | 108 |
| May ... | 107.1 | 106.4 | 105 | 108 |
| June ... | $107 \cdot 3$ | 106.6 | 106 | 110 |
| July ... | $107 \cdot 6$ | 107.0 | 106 | 108 |
| August ... | 107.6 | 107.0 | 106 | 108 |
| September | $107 \cdot 7$ | 107.2 | 106 | 108 |
| October... | $108 \cdot 9$ | $108 \cdot 6$ | - | - |

1947, than does the Ministry, when the coalminers' minimum was raised; and there is a similar difference in February, 1948, when wages of compositors, railwaymen, lorry-drivers and cotton operatives were increased.

Between June, 1947, and October, 1948, in ten of the twenty industries included in the Bulletin index wages rose more than $10 \%$. The average has throughout the period kept closely in step with the Retail Prices Index.

## CAPITAL FORMATION

## I. THE BUILDING AND CIVIL ENGINEERING INDUSTRIES

By Ian Bowen

In the table below, estimates are given for the value of output of the building and civil engineering industries for the second quarter of 1948, and figures for previous quarters are also shown for comparison. The basis of the estimates shown has been discussed in previous articles on this subject. The output of the industries in the second quarter of 1948 is estimated at $£ 180.8 \mathrm{Mn}$., an increase of $£ 10.3 \mathrm{Mn}$. on the preceding quarter. Over the second quarter of 1947 there was an increase of $£ 21.0 \mathrm{Mn}$. As
compared with the fourth quarter of 1947, during which cuts in the capital programme for 1948 were officially announced, the output of the industries showed a slight increase of less than $£ 1 \mathrm{Mn}$. This increase was caused by slight rises in materials' costs, and in the average numbers employed; the latter averaged one million male operatives in the last quarter of 1947, fell to an average of 986,000 in the first quarter of 1948, but rose again to over one million in the second quarter.

There was not much increase in the value of new housing work done in the second quarter of 1948 ( $£ 56.9 \mathrm{Mn}$.) in comparison with the first ( $£ 56.4 \mathrm{Mn}$.). This may seem surprising in view of the considerable increase in the numbers of new permanent houses completed during the second quarter. The explanation lies partly in the continued running down of the temporary housing programme, and partly in the considerable reduction in work done on newly commenced permanent houses; the "tap" of newly started houses was turned down low in the fourth quarter of 1947 and the first quarter of 1948. As compared with 55,500 houses begun in the third quarter of 1947 there were only 41,500 begun in the fourth, and 29,400 in the succeeding quarter. There was an increase in the numbers begun in the second quarter of 1948 to 37,700 . But this recovery to 12,600 houses begun per month could do little to offset the previous reduction in the rate of starting, which naturally had an effect on the amount of work being done on houses in the earlier stages of construction, despite the arrears of work represented by the large stock of houses under construction. For these reasons the increase of about 7,000 in the numbers of houses finished was not accompanied by any large increase in the total value of housing work being done each quarter.

The following table summarises the position in this respect:-
NUMBERS OF NEW PERMANENT HOUSES BEGUN AND COMPLETED IN GREAT BRITAIN


The reduction in the numbers of permanent houses started in each quarter below the level of the third quarter of 1947 suggests that the value of the housing output of the country will not rise, and may even fall, over the remaining quarters of 1948.

The second quarter of 1948 saw little change in the value of the output of other items except for industrial and agricultural building, and repairs and maintenance of houses. Value of work done (both new work and maintenance) on industrial building, etc., was estimated at nearly $£ 35 \mathrm{Mn}$., as compared with $£ 28 \mathrm{Mn}$. in the first quarter of the year. The capital " cuts" had thus resulted in a transference of building effort from housing to industrial and agricultural building, and to ordinary repairs and maintenance of houses, which went up by $£ 2.2 \mathrm{Mn}$. in the quarter.

In view of the changes in licensing, which occurred too late to have a full effect on the second quarter's output, it may be surmised that the increase in repairs and maintenance of houses, and of industrial building, may very likely continue in the third quarter of the year. This increase represents a shift from new building (especially housing) to mainly smallscale work, with substantial deflationary effects on the demand for heavy materials and for transport, despite the fact that the total value of work done has not yet begun to show a decline.

It may be remarked that the relatively low level of the rate of starting permanent new houses for three successive quarters cannot be continued much longer consistently with the policy of maintaining a steady output of 200,000 houses a year, i.e., in a balanced programme 16,700 per month begun and finished.

Source : Monthly Digest of Statistics, September, 1948, Table 78. ESTIMATED GROSS OUTPUT OF THE BUILDING AND CIVIL ENGINEERING INDUSTRIES IN GREAT BRITAIN (£Mn.)

|  | HOUSING |  |  |  | WORK <br> OTHER THAN HOUSING |  |  | TOTAL |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | New houses | Conversions and adaptations | War damage repairs for houses | Repairs and maintenance for houses | Other war damage repairs | Industry and agriculture | Other |  |
| $\begin{array}{cr}1946 & \text { Qr. } \\ \text { ", } & \text { II } \\ \text { ", } & \text { III } \\ \text { ", } & \text { IV }\end{array}$ |  |  |  | 11.0 | $3 \cdot 6$ | $12 \cdot 3$ | $19 \cdot 0$ | $107 \cdot 5$ |
|  | $30 \cdot 3$ $42 \cdot 5$ | $5 \cdot 6$ $5 \cdot 8$ | $25 \cdot 7$ $23 \cdot 6$ | 13.0 | $3 \cdot 9$ | $16 \cdot 8$ | $22 \cdot 5$ | $128 \cdot 1$ |
|  | $42 \cdot 5$ 48.6 | $5 \cdot 4$ | 19.6 | 13.9 | $3 \cdot 5$ | $19 \cdot 9$ | 21.6 | 132.5 |
|  | $62 \cdot 1$ | $6 \cdot 1$ | $20 \cdot 1$ | $16 \cdot 2$ | $4 \cdot 1$ | 4.3 | 25 |  |
| Total | 183.5 | $22 \cdot 9$ | $89 \cdot 0$ | $54 \cdot 1$ | $15 \cdot 1$ | $73 \cdot 3$ | 88.7 | $526 \cdot 6$ |
| $\begin{array}{cc} 1947 & \text { Qr. } \\ \text { II } \\ \text { ", } & \text { III } \\ \text { ", } & \text { IV } \end{array}$ |  |  |  | 13.4 | $3 \cdot 1$ | $16 \cdot 9$ | $21 \cdot 4$ | $115 \cdot 2$ |
|  | $42 \cdot 1$ $51 \cdot 1$ | $4 \cdot 8$ $6 \cdot 6$ | 13.5 17.4 | $19 \cdot 3$ | $4 \cdot 3$ | $26 \cdot 4$ | $34 \cdot 7$ | $159 \cdot 8$ |
|  | $51 \cdot 1$ $49 \cdot 5$ | $5 \cdot 7$ | $14 \cdot 6$ | $18 \cdot 1$ | $4 \cdot 1$ | 26.9 | $34 \cdot 2$ | 153.1 180.2 |
|  | 60.0 | 6.2 | $15 \cdot 4$ | $22 \cdot 6$ | $4 \cdot 4$ | $31 \cdot 1$ |  |  |
| Total | $202 \cdot 7$ | $23 \cdot 3$ | $60 \cdot 9$ | $73 \cdot 4$ | 15.9 | $101 \cdot 3$ | $130 \cdot 8$ | $608 \cdot 3$ |
|  |  | 6.0 | 13.4 | $22 \cdot 3$ | $4 \cdot 3$ | $27 \cdot 8$ | $40 \cdot 3$ | $170 \cdot 5$ |
| 1948 Qr. II | 56.9 | $6 \cdot 3$ | 13.5 | $24 \cdot 5$ | $4 \cdot 6$ | $34 \cdot 8$ | $40 \cdot 3$ | 180.8 |

# II. PRODUCERS' EQUIPMENT 

By T. Barna

Data now available enable estimates to be extended to the second quarter of 1948. Table 1 shows the supply of certain kinds of machinery, both home-produced and imported, thought to be included in gross capital formation. The description of the data was given in the previous Bulletin (p. 96). It is still true to say that the delay in publishing some series is as much as six months, and it is therefore not practicable to

TABLE 1.
SUPPLY OF CERTAIN Kinds OF MACHINERY U.K., £ Mn.
$\begin{array}{llll}1935 & 1946 & 1947 & 1948\end{array}$
1st Qr.2ndQr.
Annual rate
Agricultural machinery
Machine tools-metalworking wood working
Prime movers and boiler plant $\dagger$
Textile machinery
Printing machinery
Tobacco machinery
Office machinery
Rotating Electrical Machines
Refrigerating machinery
Water treatment plant
Industrial furnaces
Total A
Total B
Notes : Total A excludes the at manufacturers' prices, or imports, c.i.f., excluding duty. Domestic refrigerating machines are excluded.

Sources: Census of Production, 1935, Monthly Digest of Statistics, Trade Accounts.

* Rate of last half-year.
$\dagger$ With valves and pumps.
include these series. Recently, additional series relating to equipment were started and these will be included as soon as comparable figures for several quarters become available.

The second quarter has seen some further improvement in the supply of machinery. Allowing for only a slight rise in prices, as seen from export statistics, the rise in volume was about $5 \%$ on the quarter, and the flow of machinery must have reached new record levels. There were increases all round with the exception of printing and bookbinding, and tobacco machinery; in these industries the flow of machinery supplies is still below the 1935 level (allowing for changes in prices).

The supply of road vehicles is given in Table 2. Though only slight increases are shown, it must be remembered that a year ago it was planned actually to cut these figures.


TABLE 2.

Notes: Imports include non-agricultural tractors. Values
Sources: Monthly Digest of Statistics. Trade Accounts.

# WORLD COMMODITY SURVEY 

By C. F. Carter

## Wheat and Maize

The great Northern Hemisphere harvest has been gathered in ; and it is possible to estimate (with a large measure of uncertainty, because of our lack of knowledge of crops in Russia and the East) that the 1948 wheat harvest will amount to some $6,150-6,250 \mathrm{Mn}$. bushels, $3-5 \%$ above the pre-war average. This is not yet, of course, enough to provide the pre-war consumption per head. It cannot really be described as a bumper harvest ; it derives its significance from the peculiar limited trading relations of the present time. The harvest in Europe outside the U.S.S.R. seems likely to be at least $1,400 \mathrm{Mn}$.
bushels, $40 \%$ more than the previous year, but still almost 200 Mn . bushels less than pre-war. The weather at last refrained from adding to the difficulties caused by the ravages of man. The result should be a fall in import requirements, even if consumption is allowed to rise by $10 \%$ or more, and a substantial lessening of the drain on E.C.A. dollars.

At the same time, the North American harvest is only slightly lower than last year, being about 50 Mn . bushels down at $1,675 \mathrm{Mn}$. bushels, which is still some $55 \%$ above pre-war. Since the crop of feed grains is excellent, there is no danger of a large diversion of wheat to the
feeding of cattle. The United States ought to add a substantial amount, say 120 Mn . bushels, to her carry-over stock, which is now too low to provide an adequate reserve against a harvest failure. Even so, the exportable surplus from North America will be quite adequate to meet the reduced calls of the importers.

The price has consequently declined, and the world's attention has been directed to the technicalities of the American farm price supports. For the present season, these are obtained by multiplying the average price of the commodity concerned for the period from August, 1909, to July, 1914, by the index of prices paid by farmers (including interest and taxes) on base 1910-14. This calculation gives the 'parity price,' and the support level is still $90 \%$ of this price. The level for wheat is therefore around $\$ 2$. This is the price at which the Commodity Credit Corporation is prepared to accept wheat pledged as security for loans made to farmers at harvest time. The price is free to rise above this level, for farmers will then sell their wheat in the open market and repay loans with cash. The price can also fall below this level, for farmers may not have enough approved storage accommodation to hold the crop on the farm, or they may fear that the new Congress will lower price supports. But, this fear apart, the price cannot fall below the support level by more than the cost of providing new store-bins. In practice this means that wheat at the farm may conceivably fall to $\$ 1.80$, but is not likely to be much below $\$ 2$ later in the season, for Congress is not very likely to alter support levels in the current crop year. This is some comfort to Britain, which is committed to pay Canada $\$ 2$ for most of her wheat requirements. Present Chicago spot prices are around $\$ 2.30$ (late-October).

The United States maize crop is an all-time record, at $3,530 \mathrm{Mn}$. bushels; and the supply of feed grains and by-products per animal unit will be the largest on record, 1.02 tons against 0.88 last year. This not only means that the American consumer can begin to count the months till meat prices drop; it also promises a substantial quantity of feeding stuffs for export. The abrupt change from a very poor to a very good maize crop should cause a heavy fall in price. Thus, in 1935 there was a $25 \%$ increase in U.S. maize supply per animal compared with the previous year, and the price fell $36 \%$ between July and December. In 1937 the corresponding figures were $61 \%$ and $59 \%$. This year maize supply is up by $30 \%$. The July price was slightly over $\$ 2.00$; at the time of writing December futures
are about $\$ 1.40$, the support price being $\$ 1.45$. The importing countries will hope that other feeding-stuffs prices (especially in the Argentine) will not be slow to adjust themselves to this lower level.

## Cocoa

Production in the season just ended is estimated by the U.S. Department of Agriculture at 585,000 tons, some $8 \%$ less than the preceding year, and 120,000 tons less than before the war. African production was, overall, much the same as the preceding year ; the decrease was mainly accounted for by a heavy fall in the Brazilian crop. The movement between the two years can be explained by unfavourable weather, but the basic causes of decline remain. Figures published by the United Africa Company show that the number of trees infected by the 'swollen shoot' disease in the Gold Coast is increasing at an accelerating rate. It appears, indeed, to increase as the square of the number of years since 1935 (the year before the disease was first recognised), and at this rate Gold Coast cocoa, which is still more than a third of the world's supply, would disappear by 1967. At the same time the resistance of the farmers to the only known preventive measures, the early and ruthless cutting out of the diseased trees, is increasing. The price at the buying stations was increased in September from $50 /$ - to $65 /-$ per load of 60 lb ., a price which is likely to induce even the more far-sighted Africans to go for the quick profits of continuing to work a diseased farm, rather than rely on Government compensation to bridge the gap of five years while new trees are being grown. New compensation rates were announced on October 1st, but they are probably still too low. Further scientific investigations are now to be made in the Gold Coast. Unless these bring to light some new method of controlling the virus, it seems essential to offer compensation for cutting-out on a scale which is unmistakeably generous. But the objective in doing so should not be to restore cocoa to its full predominance in the colony's trade. Agricultural experts are very generally concerned that we should not plan the dependence of a whole area on a single cash crop ; and in this connection various hints of plans for cocoa production in other tropical countries may be significant. The financial inducement is offered by a New York price of 40 c . per lb., almost six times the 1935-9 average.

## Cotton

Writing last January for the February issue of this Bulletin, I suggested that cotton prices were hardly likely to rise. This was a serious

## WORLD COMMODITY SURVEY




[^57]misjudgment of the factors operating in the Egyptian market. The most important and unpredictable of these is the immense pressure of demand for high quality textiles. The price of Karnak Good has followed the pattern, not of other cotton prices, but of 64's and 70's woola tremendous surge upwards at the beginning of the year, a minor decline in the spring, and a renewed rise in the summer. This movement may have been helped by a shortage of credit, shifting an undue proportion of the marketing into the early part of the season. Some countries will have found it easier to buy in Egypt than in Brazil or the United States. The dealings of the Egyptian Government are an uncertain factor. But the basic fact is that the willingness of the world to pay for quality is far greater than we had assumed. Occasionally the market drops as the attention of buyers turns to second-best alternatives; then the rise is resumed. The new crop year begins with the prospect of a larger Egyptian crop, and a higher proportion of longstaple cotton, but with Egyptian stocks down by 470,000 bales on the previous year. At present prices are sagging, but I shall not attempt to predict when the final collapse will come.

In contrast, American cotton prices have followed a pedestrian course rather similar to that of cross-bred wool. The May price of Middling $\frac{15}{16}{ }^{\prime \prime}$ (ten-market average) was 37.55 c . per lb . ; by September it was around 32 c ., with December futures below 31 c . About 2 c . have to be subtracted to give the price received by farmers, and the loan rate for the current season is 30.74 c . per $\mathrm{lb} ., 92 \frac{1}{2} \%$ of the parity price. Cotton is therefore now reported to be selling somewhat below the loan rate, a phenomenon which must be attributed to fears of Congressional action to end price support of a commodity in surplus supply. For the American farmer has paradoxically responded to a price markedly less favourable than for other farm products by expanding the planted acreage to 23.2 Mn ., $30 \%$ above the low point in 1945. This acreage is still less than pre-war, but yield per acre this season is a record, 313 lb . against 185 in 1935 and 270 in 1937. Consequently the United States is expecting a bumper crop of 15.2 Mn . bales, which is $15 \%$ more than the 1935-9 average.

The carry-over in the U.S. on August 1st, 1947, was 2.5 Mn . bales; domestic consumption was 9.3 Mn . bales, lower than the previous year, and exports, at 2 Mn . bales, were the lowest since 1871-2. Consequently the carry-over this August was rather over 3 Mn . bales, still a
low level. But even with the stimulus of E.C.A. and re-armament, consumption and exports can hardly reach 13 Mn . bales, so that stocks should rise during this season to over 5 Mn . bales-not an excessive level, but the rise may well be held to justify a lower support price.

The provisional world crop figure for last season is 25.3 Mn . bales ( 480 lb . net), $17 \%$ above the previous season but $20 \%$ below the 1935-9 average. The increase over the previous season was mainly caused by the United States crop, the other major producers showing only minor changes. Stocks fell by $3 \frac{1}{2} \mathrm{Mn}$. bales over the season, and are now below the level of 1935-9, though all the years from 1922 to 1930 show a lower carry-over. The principal producers are shown in the following table :-


## Wool

At the time of writing, the market is undergoing one of its periodical revulsions against the high prices of the best grades ; super merino combings were $5 \%$ cheaper in the September London sales, compared with July, while short inferior merino combings were up to $10 \%$ more expensive. But in general the market remains firm. All qualities from 70's to 50's are a little below the June peak, 64's (for instance) having declined from 106d. (London clean cost) to $95 \mathrm{~d} .:$ but this is $30 \%$ more than a year before, and $370 \%$ of the 1934-8 average.

During the 1947-8 season, world production of apparel wool was about $2,910 \mathrm{Mn}$. lb ., the lowest point of a four-year decline. Consumption is believed to have been above $3,600 \mathrm{Mn} . \mathrm{lb}$., and stocks declined to $3,550 \mathrm{Mn} . \mathrm{lb}$. (greasy basis), of which the Joint Organisation held $1,030 \mathrm{Mn} . \mathrm{lb}$. These stocks are still considerably higher than pre-war, but the Joint Organisation stocks are unbalanced (having only $6 \%$ of free and light burry Australian merino combing), so that the overall figure fails to convey the shortage of particular types. Stocks in trade hands are not excessive by pre-war standards ; in the case of merino combing wools they are probably rather low.

An interesting situation is therefore developing. At the end of the war, the Joint

Organisation Stocks were three times as high as at present, and the problem was one of orderly marketing without causing a collapse in the market. With such large stocks, we could view the decline in production with comparative equanimity. But now the end of the stocks is in sight: 1948-9 production of apparel wool is expected to be a little higher, at $2,980 \mathrm{Mn} . \mathrm{lb}$., but consumption will certainly be larger than this. Is the world approaching a time of even higher wool prices, caused by a major deficiency of supply? Or will the present exceptional demand
decline, and production slowly increase, so that a balance can be reached ?

At present, world consumption of Dominions merino wool is far above production ( $50 \%$ more for the last two years), and no stocks can bridge this gap for long. Commonwealth wool production is expected to show a modest rise in 1948-9, but a speedy increase or change of type is out of the question. It would seem, therefore, that the world will be forced by the high price of fine wools to make a fuller use of cross-bred types.

ERRATA. Bulletin III. Vol. XXVII-
Page 86, col. 2, line 5, for "No. 1 Accounts" read "No. 2 Accounts"
„ „ footnote 8, for Cmd. 7136 read 7163
" " " 13, for Cmd. 6908 read 6988
Page 88, footnote 30, for Cmd. 7348 read 7438

| U．K．］ |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Ks |  |  |  | money＊ |  | $\substack{\text { CAPW } \\ \text { CISTUES } \\ \text { ISSUES }}$ |  | Other banking． |  |  |  |  |  |  |  |  |  | TREASURY BILLS． |  |  |
|  | Industrials |  | FixedInterest |  |  |  |  |  | Bank of |  |  | $\begin{gathered} \text { Nine Clearing } \\ \text { Banks } \end{gathered}$ |  |  |  |  |  |  |  |  | £Mn |
| Monthly or |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Months． | ${ }^{62 \cdot 5}$ |  | 138 | ${ }^{72.5}$ |  | $4 \cdot 38$ | 3．7 | 20.2 |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  | 15.7 | 19.8 |  |  | 411 |  |  |  |  |  |  |  |  |  | 949 |
| ${ }_{1920} 19$ | 106 106 |  | 91 79 | 127 |  | $6 \cdot 36$ | ${ }_{27.6}^{17.6}$ | 32.0 18.0 |  |  | 449 435 |  |  |  |  |  |  |  |  |  | 11064 |
| 1921 Av． | 72 | ＝ | ${ }_{96}^{81}$ | ${ }_{1205}^{124}$ | ${ }_{2.0}^{4.3}$ | （ ${ }_{2 \cdot 62}$－20 | 8．3 | 18.0 19.6 |  |  | 435 399 | ${ }_{1727}^{1768}$ | ${ }_{335}^{361}$ |  | ${ }_{732}$ | ${ }_{372}$ |  |  | 581 | 234 | ${ }_{815}^{143}$ |
| 1922 Av ． | $\begin{array}{r}82 \\ 101 \\ \hline 1\end{array}$ |  | 96 102 102 | ${ }_{98}^{105}$ | ${ }_{2.0}^{2.0}$ | 2.78 | ${ }_{5 \cdot 6}$ | 17.0 |  |  | 385 | 1631 | ${ }_{24}^{271}$ |  | 744 | 338 |  |  | 482 | ${ }_{152}^{152}$ | 634 |
| 1924 | 100 |  | 100 | 100 | $2 \cdot 4$ | 3.45 | ${ }^{7.4}$ | 11.2 |  |  | 390 383 |  | ${ }_{22}^{242}$ |  | ${ }_{839}^{791}$ | 270 | ${ }_{11.9}^{11.7}$ | 51.7 | 442 460 | 159 150 | ${ }_{610}^{601}$ |
| 1925 A | 100 |  | ${ }_{96}^{98}$ | 101－8 | 3.5 4.0 | ${ }_{4}^{4.15}$ | ${ }_{11.7}^{11.0}$ | 7.3 9.4 | ${ }_{69} 6$ | ${ }_{55}^{55}$ | 374 | 1626 | 214 |  | 876 | 249 | 11.8 | 53.8 | 490 | 130 | ${ }_{620} 6$ |
| 1926 A | 115 |  | ${ }_{96.9}^{96 \cdot 4}$ | $103 \cdot 2$ | 3.7 | ${ }_{4 \cdot 24}$ | 14.7 | 10.7 | 66 | ${ }^{53}$ | 37 | ${ }_{1}^{1675}$ | ${ }_{2}^{216}$ |  | ${ }_{938} 8$ | ${ }_{239}^{238}$ | ${ }_{11.1}^{11.6}$ | 54．5 | 506 | 114 | ${ }^{620}$ |
| ${ }^{19228 \mathrm{Av}}$（1920． | 142 |  | 99.2 | $100 \cdot 8$ | $3 \cdot 6$ | $4 \cdot 16$ | 18.3 | 18．3 | 65 | 52 | 372 |  |  |  |  |  |  |  | 496 | 117 | 613 |
|  |  |  | 96.3 | 104．0 | ${ }^{4.6}$ | 5.3 | 13.3 | 7.9 | 63 | 50 | 361 | 1762 | ${ }_{226}^{226}$ |  | 974 | 242 | 10.7 | 㖪 | 521 | 239 | 760 |
| 1930 | 112 |  | 99.4 | 100．7 | 2.4 | ${ }^{2.62}$ | 10.6 | ${ }_{9}^{9.1}$ | ${ }_{66} 6$ | ${ }_{54}^{50}$ | 354 | ${ }_{1723}$ | ${ }_{254}^{262}$ |  | ${ }_{904}^{994}$ | 285 | 10.4 | 52．5 | 462 487 | 187 | 649 629 |
| 1931 | 87 |  | 98.7 <br> 112.4 <br> 1 | ${ }_{90.3}^{1068}$ | 1.7 | ${ }_{1.94}$ | 7.0 | $2 \cdot 4$ | 81 | 51 | 360 | 1752 | 307 |  | 830 | 332 | 10.5 | 47.6 | 533 | 188 | 721 |
| ${ }_{1933} 193$ | ${ }_{103}^{84}$ |  | $124 \cdot 4$ | 80 | － | ， | 7.9 | 3.3 | 102 | 5 | 371 378 | ${ }_{1842}^{1914}$ | ${ }_{288}^{352}$ |  | ${ }_{740}^{746}$ | ${ }_{543}^{519}$ | ${ }_{11-3}^{10.9}$ | 39.0 40.2 | 582 | 327 | 909 850 |
| 1934 Av | ${ }_{13}^{125}$ |  | $132 \cdot 5$ 136.2 | ${ }_{73.6}^{75 \cdot 7}$ | ${ }^{5}$ | 57 | 13.5 | 1.7 | ${ }_{98}^{102}$ |  | 394 | 1961 | 284 |  | 755 | 598 | 10.8 | 38.5 | 473 | 393 | 866 |
|  | ${ }_{161}^{139}$ |  | 136 | $73 \cdot 2$ | ${ }_{5}^{6}$ | 61 | 15.9 | $2 \cdot 2$ | 96 | 54 | 432 | ${ }_{2104}^{2104}$ | ${ }_{276}^{312}$ |  | ${ }_{9}^{825}$ | ${ }_{607}^{598}$ | $\xrightarrow[10.3]{10.3}$ | 39.2 41.9 | 576 | ${ }_{229}^{225}$ | ${ }_{789}^{801}$ |
| 1937 Av | ${ }_{123}^{150}$ |  | ${ }_{1}^{127.7}$ | $78 \cdot 4$ 79.0 | ${ }^{-5}$ | －69 | ${ }_{7} 1.7$ | 2.1 | 97 104 | 58 56 58 | 485 | 2161 | 274 |  | 930 | 593 | $10 \cdot 6$ | 43.0 | 547 | 330 | 877 |
| 1938 A | 123 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 19 | 114 |  | 116.3 | 86.2 | ． 8 | 1.20 | 3.6 | 1.9 | 103 | 58 | 507 | ${ }_{2377} 2129$ | 246 |  | ${ }_{906}^{943}$ | ${ }_{6}^{564}$ | 10.9 | $44 \cdot 3$ <br> 38.3 <br> 1 | 488 | 82 | 1070 |
| 1940 | 析 | － | ${ }_{13123}^{123.0}$ | ${ }_{71 \cdot 6}$ | 1.0 | － | 0．3 | 0．0 | 118 | 69 | 652 | 2818 | 220 | 474 | 815 | 837 | $10 \cdot 4$ | 29.1 | ${ }_{923}$ | 1466 | 2389 |
| 1941 | ${ }_{113}^{101}$ |  | ${ }_{135}^{135}$ | ${ }_{74 \cdot 2}$ | 1.0 | 1.03 | 0.3 | 0.0 | 131 | 60 | 807 | 3104 | 223 | 614 | 758 | 1006 | 10.5 | $24 \cdot 5$ | 970 | 1700 | 2670 |
| 1943 | 135 |  | 134－1 | $74 \cdot 9$ | 1.0 | 1．03 | 0.6 | 0.1 | 148 | ${ }^{65}$ | 966 | 3484 | 173 | ${ }^{961}$ | 71 | 1072 | 10.5 |  | 1107 | 1871 | 2978 |
| 1944 | 148 |  | 133.5 | 75. | 1.0 | ＋ 1.03 | ＋1．4 | 0.1 0.3 | ${ }_{207}^{176}$ | 66 | ${ }_{1284}^{1135}$ | 4461 | 181 | 1747 | 753 | 1072 | 10.5 | 18. | 1802 | 2288 | 3485 <br> 3890 |
| 1945 | ${ }^{156}$ |  | 135.1 10.1 | ${ }_{71} 7.7$ | ${ }_{0}^{0.9}$ | 0．53 | 9.3 | ${ }_{1.6}$ | 242 | 71 | 1358 | 4846 | 443 | 1436 | 847 | 1251 | 10.3 | 17．5 | 1902 | 2534 | ${ }_{4436}$ |
| 1947 A | 178 | － | $139 \cdot 2$ | 72.1 | 0.5 | 0.53 | 9.8 | 2.8 | 295 | 102 | 1385 | 5376 | 701 | 1257 | 1056 | 1373 |  | 19.7 | 2193 | 2549 | 4742 |
| JULY | 179 |  | 140 | 71.8 | 0.5 | 0.53 | 28.8 | 2.7 | 258 | ${ }^{63}$ | 1371 | 4863 | 506 | 1331 | 838 | 1309 |  | 17.2 | 1930 | 2479 | 4409 |
| AUG． | 176 | ＋1．7 | $140 \cdot 1$ | 71.8 | 0.5 | 0.53 | 8.7 | 0.3 | 243 | 86 | ${ }_{1}^{1383}$ | 4940 | 450 | 1452 | 855 | 1295 |  | 17.3 | 1940 | 2489 | 4429 |
| SEPT | 171 | －0．6 | 140.5 140.7 | ${ }_{71}^{71.6}$ | 0.5 0.5 | 0．53 | 7.1 <br> 5.4 | 6.2 0.7 | ${ }_{260}^{247}$ | ${ }_{74}^{76}$ | ${ }_{1362}^{1366}$ | 5132 | ${ }_{457}^{392}$ | 1567 | ${ }_{896} 8$ | 1308 |  | 17.5 | 1980 | ${ }_{2535}^{2508}$ | ${ }_{4515}^{4488}$ |
| OCT． | ${ }_{176}^{164}$ | ＋5．0 | ${ }_{144}$ | $69 \cdot 4$ | 0.5 | 0.53 | 8.5 | ${ }_{0} 0.6$ | 271 | 70 | ${ }_{1366}$ | 5234 | 481 | 1566 | 912 | 1315 | $10 \cdot 4$ | 17.4 | 2050 | 2464 | 4514 |
| ${ }_{\text {DEC }}{ }^{\text {den }}$ | 184 | ＋2．5 | 144.0 | 69．7 | 0.5 | 0.53 | 13.4 | 2.0 | 266 | 71 | 1398 | 5407 | 588 | 1499 | 934 | 1330 |  | 17.3 | 2100 | 2468 | 4568 |
| JAN． | 191 | －0．5 | 1443 | 69.5 | 0.5 | 0.53 | 7.4 | 6.8 | 299 | 82 | 1386 | 5352 | 601 | 1503 | 947 | 1329 |  | 17.7 | 2150 | 2467 | 17 |
| FEB． | 179 | $-1.0$ | ${ }^{143.7}$ | ${ }_{7}^{69.8}$ | 0．5 | 0．53 | ${ }_{13}^{15.1}$ | 0.7 | ${ }_{289}^{274}$ | ${ }_{104}^{84}$ | ${ }_{1385}^{1375}$ | ${ }_{5285}^{5250}$ | ${ }_{7} 640$ | ${ }_{1265}$ | 975 | ${ }_{1355}^{1339}$ | ${ }_{8.4}^{8.4}$ | ${ }_{18.4}^{18.3}$ | ${ }_{2185}^{2155}$ | ${ }_{2628}^{2441}$ | ${ }_{4813}^{4596}$ |
| MAR | 181 <br> 181 | －${ }^{2.9}$ | ${ }_{141.7}^{141}$ | ${ }_{70.9}$ | ${ }_{0}^{0.5}$ | ${ }_{0}^{0.53}$ | ${ }_{9.5}^{13.7}$ | 0.3 | ${ }_{306}$ | 109 | 1397 | ${ }_{5312}^{525}$ | 688 | 1294 | 1009 | 1360 |  | 19.0 | 2185 | 2709 | 4894 |
| MAY | 193 | ＋8．3 | $142 \cdot 4$ | 70.5 | 0.5 | 0.53 | 6.9 | $2 \cdot 5$ | ${ }_{296}^{291}$ | 105 | ${ }_{1395}^{1390}$ | 5300 5382 | 638 | 1297 | 1043 | 1368 | ${ }_{8.2}^{8.3}$ | 19.7 | ${ }_{2180}^{2190}$ | ${ }_{2592}^{2627}$ | 4817 |
| JUNE | 191 | ＋4．9 | 141.5 | 71.0 | 0.5 | 0.53 | $10 \cdot 4$ | $3 \cdot 5$ | 296 | 101 | 1395 |  |  |  |  |  |  |  |  |  |  |
| July | 188 | －1．4 | 140.0 | 71.7 | 0.5 | 0．53 | $32 \cdot 9$ | $2 \cdot 8$ | 304 | 103 | 1406 | 5370 | 679 | 1233 | 1076 | 1386 |  |  | 2180 | 2541 | 4721 |
| AU | ${ }_{1}^{165}$ | $-11.9$ | ${ }_{133.0}^{132.5}$ | $75 \cdot 6$ | 0.5 | 0．53 |  | － 0.2 | ${ }_{29}^{295}$ | 110 | 1412 | 5359 | ${ }_{7}^{705}$ | 1199 | 1093 | 1390 | 8.5 | 20.4 | 2180 | 2428 | 4608 |
| ， | ${ }_{1}^{159}$ | － 4.9 | 133．0 | $75 \cdot 4$ 73.9 | 0.5 0.5 | ${ }_{0}^{0.53}$ | $\stackrel{1}{3.7}$ | 3．9 | ${ }_{296}^{291}$ | 103 106 | 1383 1369 |  | 736 800 | ${ }_{1105}^{1138}$ | 11120 | ${ }_{1397}^{1391}$ | 8．3 | 20．6 | ${ }_{2220}^{2190}$ | ${ }_{2562}^{2500}$ |  |
| Nov． | ${ }_{167}^{159}$ | ＋4．6 | ${ }_{137 \cdot 5}^{13}$ | ${ }_{73}{ }^{\text {P1 }}$ | ${ }_{0}^{0.5}$ | 0.53 | ${ }_{7.9}$ | 0.9 | 298 | 108 | 1360 | 5494 | 778 | 1151 | 1140 | 1397 | $8 \cdot 4$ | $20 \cdot 7$ | 2250 | ${ }_{2527}$ | 4777 |
| DEC | 176 | ＋5．0 | $136 \cdot 9$ | $73 \cdot 3$ | 0.5 | 0.53 | $5 \cdot 7$ | 1.0 | 304 | 106 | 1363 | 5651 | 768 | 1241 | 1148 | 1381 |  | $20 \cdot 8$ | 2250 | 2569 | 4819 |
| TAN． |  |  | 137－9 |  | 0.5 | 0．53 | 22.7 |  | 296 |  |  | 5498 |  | 1172 | 1165 | 1378 |  |  | 2210 | 2474 | 4684 |
| FEB． | 170 | －6．4 | 137.2 | 73.0 | 0.5 | 0.56 | $3 \cdot 3$ | 1.1 | 286 | 110 | 1247 | 5374 | 694 | 1114 | 1214 | 1384 | 8.2 | 22．6 | 2160 | 2307 | 4467 |
| MAR | ${ }_{172}^{165}$ | -0.9 +3.6 |  | ${ }_{75.2}^{73.2}$ | － 0.5 | ${ }_{0} .56$ | 1.9 | ${ }^{1.4}$ | 305 302 | ${ }_{109}^{105}$ | ${ }_{1242}^{1234}$ | ${ }_{5588}^{5524}$ | 78 | ${ }_{1196}^{1112}$ | ${ }_{1246}^{1238}$ | 1385 1382 | 8.1 | ${ }_{22 \cdot 3}^{22 \cdot 4}$ | ${ }_{2160}^{2160}$ | ${ }_{2750}^{2692}$ | ${ }_{4952}^{4892}$ |
| APR， | ${ }_{175}^{172}$ | +3.6 +1.9 | ${ }_{135.3}^{133.2}$ | 74．0． | － 0.5 | 0.56 | 199 10.9 | 2．6 | ${ }_{312}^{302}$ | ${ }_{101}^{109}$ | 124 | ${ }_{5594}^{5588}$ | ${ }_{704}$ | 1203 | 1262 | ${ }_{1377}^{1382}$ |  | ${ }_{22 \cdot 6}^{22 \cdot 3}$ | 2210 | ${ }_{2644}^{2750}$ | 4854 |
| NE | 169 | －3．9 | 135－3 | 74.0 | 0.5 | － | 1 | 1.5 | 305 | 108 | 1250 | 5672 | 639 | 1313 | 1277 | 1378 |  | 22 | 2210 | 2609 | 48 |
| LY |  | 5 | 135.2 | 74.1 |  | 0．56 |  | 1.1 | ${ }^{303}$ |  | 1272 |  |  | 1273 |  | 1378 |  |  |  | 2632 | 4842 |
| UG． | 168 | ＋1．7 |  | $3 \cdot 6$ | 0.5 0.5 | 0. | ${ }_{\substack{+30.1 \\ 15.2}}$ | ${ }_{0}^{0.5}$ | 300 308 | ${ }_{157}^{141}$ | 1278 |  |  |  |  | ${ }_{1374}^{1374}$ |  |  | ${ }_{2210}^{2210}$ | ${ }_{2}^{2356}$ | 86 |
| ост． | 172 | ＋1．1 | 137．7 | 72.8 | 0.5 | ${ }_{0.56}$ | ＋104－3 | $0 \cdot 6$ | 303 | 120 | 1236 |  |  |  | 1291 | 1375 |  |  | 2240 | 2447 | ${ }_{4687}^{4689}$ |
| ｜｜Approximate before 1924. |  |  |  | $\dagger$ Exclusive of Investments in Affiliated Banks <br> $\ddagger$ Including some issues not geographically distribute |  |  |  |  |  |  |  | ＊Minimum rates from 1933. |  |  |  |  |  |  |  |  |  |

STOCKS \＆SHARES－ Index Nos．of Prices and Yield as percentage of 1924 level；on 15 th of month．
NEW CAPITAL ISSUES－Issues during month in Gt．Britain of monthly percentage changes，for U．K．（b），for Abroad，excluding Government loans，etc．－As published
BANK OF ENGLAND－
PRINCIPAL BANKS－

TREASURY BILLS－
Deposits．11th－ 17 th of month．
Bank Notes and Currency Notes in circulation 11th－17th of month．Issues amalgamated，November 22nd， 1928. ＇Current Deposit and other accounts，＂etc．Before September，1939，averages for the month of 9 clearing banks （i．e．－excluding the National Bank，Ltd．，and the District Bank），afterwards，data for last making up day of the month．
From June，1940，to May，1946，end of month；otherwise 11th－ 17 th of month
issued by tender．Total of Bills issued by tender during 13 weeks preceding date of Exchequer Return．
Otherwise Issued．Total of Treasury Bills in existence less those issued by tender．
Day－to－Day Rate and 3 Months＇Rate．Averages for week ending 15th of month．

| WHOLESALE. |  |  |  |  |  |  |  |  | RETAIL. |  |  | WAGES |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Monthly <br> Averages or <br> Months. | Price of Gold. <br> s. per fine oz. | Bar Silver (Cash). <br> d. per oz. | Board of Trade Index Nos. Materials, General. Food. ete. <br> Per Cent. of 1924. |  |  | Statist (Sauerbeck) <br> Index Nos. Raw <br> Food. Materials. Total. <br> Per Cent. of 1924. |  |  | Cost of Living. <br> Per | of Labour Food. ent. of 19 | Rent. 24. | Index of Average Weekly Wage-Rates. \% of Dec. 1924. |
| 1913 Av....... | 84.75 |  | 60 | 60 | 60 | 59 | 62.5 | 61 | 57 | 59 | 68 | $53 \ddagger$ |
|  | $90 \cdot 33$ | 57 | - | - | - | 142 | 152 | 148 | 123 | 129 | 71 | 110 |
| 1919 Av....... | 90.33 112.0 | 61.4 | $185 \cdot 0$ | $163 \cdot 6$ | 198.0 | 180 | 181 | 180.5 | 142 | 150 | 82 | 130 |
| 1921 Av....... | 107.0 | 369 | 118.3 | $125 \cdot 7$ | 115.5 | 121.5 | 105 | 111.5 | 129 | 135 | 101 | 143 |
| 1922 Av....... | $89 \cdot 5$ | 344 | $95 \cdot 6$ | $99 \cdot 3$ | $93 \cdot 6$ | 100 | $90 \cdot 5$ | 94 | 105 | 103 | 104 | 110 |
| 1923 Av....... | $90 \cdot 25$ | 319 | $95 \cdot 6$ | $93 \cdot 0$ | $97 \cdot 2$ | 94 | 91 | 93 | 99 | 99 | 101 | 98 |
| 1924 Av....... | $93 \cdot 62$ | 34 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 |
| 1925 Av...... | 85.5 | 321 | $95 \cdot 7$ | $100 \cdot 1$ | 83.4 | $98 \cdot 5$ 91.5 | 88.5 | 98.5 | 10188 | 96 | 101 | $100 \frac{1}{2}$ |
| 1926 Av....... | 84.83 | $28 \cdot 7$ $26 \cdot 0$ | $89 \cdot 1$ $85 \cdot 2$ | $93 \cdot 1$ 91.4 | $87 \cdot 0$ $82 \cdot 0$ | $97 \cdot 5$ | $89 \cdot 5$ 88.5 | 88 | 96 | 94 | 103 | $100 \frac{1}{2}$ |
| 1927 Av...... | " | $26 \cdot 0$ | $84 \cdot 4$ | 91.6 | $80 \cdot 7$ | 87.5 | 85 | 86 | 95 | 92 | 103 | 100 |
|  |  | $24 \cdot 4$ | $82 \cdot 1$ | $87 \cdot 4$ | $79 \cdot 4$ | $84 \cdot 5$ | $81 \cdot 5$ | 83 | 94 | $90 \cdot 5$ | 104 | 991 |
| 1929 Av...... | " | $17 \cdot 7$ | $71 \cdot 9$ | $76 \cdot 1$ | $69 \cdot 6$ | 74 | $66 \cdot 5$ | 70 | 90 | 85 | 104 | $98 \frac{1}{2}$ |
| 1930 Av....... | 92.5 | $14 \cdot 6$ | $62 \cdot 9$ | $67 \cdot 4$ | $60 \cdot 8$ | 64 | 56 | 59.5 | $84 \cdot 5$ | 77 | 105 | 97 |
| 1932 Av....... | 118 | $17 \cdot 8$ | $61 \cdot 3$ | $66 \cdot 7$ | $58 \cdot 9$ | 61 | $55 \cdot 5$ | $57 \cdot 5$ | $82 \cdot 5$ | 74 | 105 | $95 \frac{1}{2}$ |
| 1933 Av....... | 124-9 | $18 \cdot 1$ | $61 \cdot 4$ | $63 \cdot 1$ | $60 \cdot 7$ | 57 | 57 | 57 | $79 \cdot 5$ $80 \cdot 5$ | 72 | 106 | 94 |
| 1934 Av....... | $137 \cdot 65$ | 21.2 | 63 | $64 \cdot 8$ $66 \cdot 0$ | 62.7 | 59 | 61.5 | 61 | 81.5 | 73.5 | 107 | 95 |
| 1935 Av. | 142 | $20 \cdot 2$ | $67 \cdot 6$ | $69 \cdot 9$ | $66 \cdot 7$ | 62 | 65 | 64 | 84 | $76 \cdot 5$ | 108 | 971 |
| 1936 Avv. | 140.76 | $20 \cdot 1$ | $77 \cdot 9$ | $77 \cdot 8$ | $78 \cdot 0$ | 71.5 | 75 | $73 \cdot 5$ | 88.5 | 82 | 108 | $100 \frac{3}{4}$ |
| 1938 Av....... | $142 \cdot 5$ | $19 \cdot 5$ | $72 \cdot 6$ | $74 \cdot 1$ | $72 \cdot 1$ | 65 | 66 | $65 \cdot 5$ | 89 | 82 | 109 | 104 |
| 1939 Av | 154 | $20 \cdot 5$ | $73 \cdot 6$ | $74 \cdot 1$ | $73 \cdot 4$ | 65 | 72 | 69 | 91 | 83.5 | 110 | 1059 |
| 1939 Av....... | 168 | $22 \cdot 2$ | $97 \cdot 8$ | $101 \cdot 0$ | $96 \cdot 3$ | 86 | $96 \cdot 5$ | 93 | 100.5 | 97 | 111 | 117 |
| 1941 Av....... | 168 | $23 \cdot 4$ | $109 \cdot 3$ | $111 \cdot 1$ | 108.4 | $96 \cdot 5$ | 106 | $102 \cdot 5$ | 113.5 | 98.5 | 112 | 127 |
| 1942 Av... | 168 | $23 \cdot 5$ | $114 \cdot 2$ | $119 \cdot 8$ | $111 \cdot 4$ | $108 \cdot 5$ | $109 \cdot 5$ | $109 \cdot 5$ | 114.5 | 97.5 | 112 | 144 |
| 1943 Av...... | 168 | $23 \cdot 5$ | 116.6 | 121.6 | $114 \cdot 1$ | $106 \cdot 5$ | 113.5 | 114 | 115 | 99 | 112 | $152 \frac{1}{2}$ |
| 1944 Av....... | 168 | $23 \cdot 5$ | 1 | $120 \cdot 1$ | 1181.4 | 107 | 124 | 117 | 116 | $99 \cdot 5$ | 112.5 | $160{ }^{3}$ |
| 1945 Av....... | $170 \cdot 5$ $172 \cdot 25$ | $30 \cdot 1$ $48 \cdot 8$ | $125 \cdot 5$ | $120 \cdot 3$ | $128 \cdot 2$ | $107 \cdot 5$ | $140 \cdot 5$ | 128 | 116 | 99 | 116 | 1741 ${ }^{2}$ |
| 1946 Av........ | 172.25 | $64 \cdot 5$ | $137 \cdot 3$ | $125 \cdot 2$ | $144 \cdot 1$ | 116.5 | 190 | $160 \cdot 5$ | 116/102§ | $95 \cdot 5 / 101 \S$ | 116/100§ | 183 |
| 1946 |  | 44 | 126.4 | $122 \cdot 4$ | $128 \cdot 6$ | 109 | $135 \cdot 5$ | $125 \cdot 5$ | 117 | $100 \cdot 5$ | 114 | $176 \frac{1}{2}$ |
| JULY ......... | $172 \cdot 25$ 172.25 | 55.5* | 126.6 | 121.1 | $129 \cdot 6$ | 107 | 138 | $126 \cdot 5$ | 116 | 98.5 | 114 | $176 \frac{1}{2}$ |
| AUGPT. | 172.25 | $55 \cdot 5$ | $127 \cdot 0$ | $120 \cdot 4$ | $130 \cdot 7$ | $107 \cdot 5$ | 144 | 130 | 116 | 98.5 | 114 | 1761 |
| OCT. | $172 \cdot 25$ | $55 \cdot 5$ | $127 \cdot 2$ | $119 \cdot 6$ | $131 \cdot 4$ | 108 | 162.5 | 141 | 116 | 98.5 | 114 | 178 |
| NOV. | $172 \cdot 25$ | $55 \cdot 5$ | $128 \cdot 2$ | 119.2 | $133 \cdot 1$ | 107 | $165 \cdot 5$ | 144 144 | 116.5 | 98.5 | 114 | $178 \frac{1}{4}$ |
| DEC. | $172 \cdot 25$ | $55 \cdot 5$ | $128 \cdot 9$ | $118 \cdot 9$ | $134 \cdot 3$ | 108 | 167.5 | 144 |  |  |  |  |
| 1947 |  | $55 \cdot 5$ | $130 \cdot 1$ | $119 \cdot 2$ | $136 \cdot 2$ | 109 | 174 | $148 \cdot 5$ | 116 | $98 \cdot 5$ | 114 | $178{ }^{\frac{3}{4}} \mathrm{R}$ |
| JAN. | 172.25 | 44** | $131 \cdot 2$ | $120 \cdot 3$ | $137 \cdot 2$ | 109 | 177.5 | 151 | 116.5 116 | 99 98.5 | 114 | 179 179 |
| MAR. | $172 \cdot 25$ | 46 | $131 \cdot 5$ | $120 \cdot 5$ | 137.5 139.3 | 109 110 | 184.5 | 155.5 | 116 | 95 | 118 | 179 |
| APR. | 172.25 | 46 $44 \cdot 25$ | $134 \cdot 0$ $135 \cdot 5$ | $124 \cdot 3$ $125 \cdot 3$ | 141.0 | 109.5 | 185.5 | 156 | 116 | 94.5 | 119 | $181 \frac{3}{4}$ |
| MAY | $172 \cdot 25$ 172.25 | $44 \cdot 25$ 43 | 135.0 | $126 \cdot 1$ | 141.4 | 114.5 | 184 | 157 | $116 \dagger$ | $94 \cdot 5 \dagger$ | $119 \dagger$ | 182 |
| JUN |  |  |  |  |  |  |  | $160 \cdot 5$ | 101 | 101 | 100 | 183 $\frac{1}{2}$ |
| JULY | 172.25 | $39 \cdot 75$ | 138.5 | $127 \cdot 8$ | 144.3 | 117.5 119.5 | 190 | 162.5 | 100 | 99 | 100 | $183 \frac{1}{2}$ |
| AUG. | $172 \cdot 25$ | $39 \cdot 75$ | 138.9 139.8 | $127 \cdot 0$ $125 \cdot 2$ | $145 \cdot 5$ | $119 \cdot 5$ 119.5 | 194 | 164.5 | 101 | 100 | 100 | 184 |
| SEPT | $172 \cdot 25$ | $42 \cdot 75$ | $139 \cdot 8$ | $125 \cdot 2$ | 1481.6 | 121 | 201 | 170 | 101 | 101 | 100 | 185 |
| OCT. | $172 \cdot 25$ | $43 \cdot 25$ | $145 \cdot 8$ | $129 \cdot 8$ | 153.9 | 123 | $205 \cdot 5$ | 173 | 103 | 103 | 100 | $189{ }^{3}$ |
| NOV. ........ | $172 \cdot 25$ | 45 | $145 \cdot 8$ | $130 \cdot 6$ | $154 \cdot 2$ | $123 \cdot 5$ | 212 | $177 \cdot 5$ | 104 | 103 | 100 | 189 |
| $\begin{aligned} & \text { DEC. } \\ & 1948 \end{aligned}$ | $172 \cdot 25$ | 45 | 145 | 132.3 |  | 125 | 216 | 180 | 104 | 104 | 100 | $191 \ddagger$ |
| JAN. ......... | 172.25 | 45 | $151 \cdot 9$ $155 \cdot 1$ | $132 \cdot 3$ $137 \cdot 6$ | $163 \cdot 2$ $165 \cdot 2$ | 127.5 | $217 \cdot 5$ | 182.5 | 106 | 108 | 100 | $193 \frac{1}{2}$ |
| FEB. ....... | $172 \cdot 25$ | 45 | $155 \cdot 1$ | $137 \cdot 4$ | 166.0 | 130 | 219 | 184 | 106 | 109 | 100 | $194 \frac{1}{2}$ |
| MAR. | $172 \cdot 25$ 172.25 | 45 | 157.2 | 138.5 | $167 \cdot 7$ | 129 | 220 | 184.5 | 108 | 109 | 99 | 195 |
| MPR | $172 \cdot 25$ | 45 | $157 \cdot 9$ | $138 \cdot 6$ | 169.0 | 129 | ${ }_{225}^{225}$ | 187 190 | 110 | 113.5 | 99 | 1951 ${ }^{\frac{1}{2}}$ |
| JUNE......... | . 172.25 | 45 | $159 \cdot 1$ | $140 \cdot 2$ | $170 \cdot 0$ | 134 | 225.5 | 190 |  |  |  |  |
|  |  |  |  | $139 \cdot 8$ | $169 \cdot 9$ | 131 | $223 \cdot 5$ | 187.5 | 108 | 108 | 99 | 196 P |
| JULY......... |   <br> . 172.25 |  | 158.9 158.4 | 139.1 | $169 \cdot 5$ | 132 | 222.5 | 187 | 108 | $107 \cdot 5$ | 99 | 196 |
| AUG. .......... | . .172 .25 | 46 | 157.7 | $137 \cdot 6$ | $169 \cdot 3$ | 131.5 | $220 \cdot 5$ | 185.5 | 108 | 107.5 | 99 | 1988 ${ }^{\frac{1}{2}}$ |
| OCT. ......... | $172 \cdot 25$ | 47 |  |  |  |  |  |  |  |  |  |  |

PRICE OF GOLD-
PRICE OF SILVER-
BOARD OF TRADE INDEX -
STATIST (SAUERBECK) हOST OF LIVING INDEX-

Annual averages of London dally rates. From Sept. 1939, Bank of England official rate.
Average (cash) price of bar silver; (average for month) of 200 commodities as percentage of 1924 average; Grior to 1930 only 150 commodities.-BOARD OF TRADE JOURNAL.
Wholesale prices of 19 foodstuffs and 26 raw materials on 1 ast day of month.-STATIST.
Ministry prise tabour's index showing movement since 1924 in cost of maintaining unchanged the standard of Iving prevalent in working-class households before Aug., 1914. For 1st of month, but placed against prevlous month prevale As above for food only and for rent and rates
For description see Sp. Memo No. 28 and Bulletin for Jan., 1944 pp. 6-8.

U．K．］

|  | TOTAL IMPORTS． <br> （Declared Values） |  |  |  | $\begin{gathered} \text { Re-exports. } \\ \text { Total. } \end{gathered}$ |  | EXPORTS OF U．K．GOODS． <br> （Declared Values） |  |  |  | OUTPUT． |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Monthly <br> Averages or <br> Months： | 品 <br>  $£ \mathrm{Mn}$ ． | Materials． 给 <br> £ Mn． | $£ \mathrm{Mn} .$ |  |  |  |  | Materials． $\begin{aligned} & \text { B } \\ & \text { ~ू } \end{aligned}$ <br> $£ \mathrm{Mn}$ ． | £ Mn. | $£ \mathrm{Mn}$ |  |  |  | Mn． Units |  |
| 1913 Av． | $24 \cdot 2$ | 23.5 | 16.1 | $64 \cdot 1$ | $9 \cdot 4$ | 54．7 | 2.7 | $5 \cdot 8$ | $34 \cdot 3$ | 43.8 | 5510 | 197 | 147 |  |  |
| 1919 Av． | $\left\{\begin{array}{l}58.9 \\ 59.9\end{array}\right.$ | 53.9 50.6 | $\left.\begin{array}{l}22.2 \\ 24.7\end{array}\right\}$ | $\ddagger 135 \cdot 6$ | 13.7 | 121.9 | $\left\{\begin{array}{l}2.8 \\ 2.8\end{array}\right.$ | $10 \cdot 1$ $9 \cdot 3$ | $\left.\begin{array}{l}52.7 \\ 53.5\end{array}\right\}$ | $\ddagger 66.6$ | 4401 | 142 | 151 |  |  |
| 1920 Av． | 63．8 | $59 \cdot 2$ | $37 \cdot 8$ | 161.2 | 19.0 | $142 \cdot 2$ | $4 \cdot 2$ | $12 \cdot 1$ | 93.4 | 111.2 58.6 | 4386 | 154 50 | 173 71 |  |  |
| 1921 Av． | $47 \cdot 3$ | $22 \cdot 6$ | $20 \cdot 4$ | 90.5 | 8.9 | $81 \cdot 6$ | 3－1 | $5 \cdot 3$ | $49 \cdot 1$ | $58 \cdot 6$ $60 \cdot 0$ | 3127 | 50 | 71 113 |  |  |
| 1922 Av． | $39 \cdot 3$ | $24 \cdot 9$ | $19 \cdot 1$ | 83.6 | $8 \cdot 6$ | $75 \cdot 0$ | $3 \cdot 0$ | 8.5 10.9 | $47 \cdot 4$ | $60 \cdot 0$ $64 \cdot 0$ | 4787 5293 | 94 143 | 113 |  |  |
| 1923 Av． | $42 \cdot 4$ | $27 \cdot 1$ | 21.4 | 91.4 106.4 | 9.9 11.7 | 81.5 94.7 | 3.7 4.7 | 10.9 8.9 | $48 \cdot 3$ 51.7 | $64 \cdot 0$ $66 \cdot 8$ | 5293 5110 | 143 | 163 | 508 |  |
| 1924 Av． | $47 \cdot 6$ | 33．4 | 24.9 26.6 | $106 \cdot 4$ $110 \cdot 1$ | 11.7 12.8 | $91 \cdot 7$ $97 \cdot 3$ | $4 \cdot 7$ $4 \cdot 5$ | 8.9 7.0 | $51 \cdot 7$ 51.5 | $66 \cdot 8$ $64 \cdot 5$ | 51660 | 140 | 142 | 555 |  |
| 1925 Av ． | $47 \cdot 5$ $44 \cdot 2$ | $35 \cdot 5$ $32 \cdot 8$ | 26.6 26.2 | $103 \cdot 4$ | 10.5 | 92.9 | $4 \cdot 1$ | 3.9 | $45 \cdot 0$ | 54.4 | 2420 | 47 | 69 | 587 | $2 \cdot 2$ |
| 1927 Av ． | $44 \cdot 9$ | 29.4 | 26.8 | $101 \cdot 5$ | $10 \cdot 3$ | 91.2 | $4 \cdot 3$ | 6.4 | $47 \cdot 1$ | $59 \cdot 1$ | 4813 | 140 | 174 | 686 | $3 \cdot 3$ |
| 1928 Av． | $44 \cdot 25$ | 28.0 | 26.4 | 99－7 | 10.0 | 89.7 | $4 \cdot 4$ | $5 \cdot 85$ | $48 \cdot 3$ | $60 \cdot 3$ | 4540 | 126 | 163 | 756 | $4 \cdot 4$ |
| 1929 Av． | $44 \cdot 6$ | 28.4 | $27 \cdot 8$ | 101.8 | $9 \cdot 1$ | $92 \cdot 7$ | $4 \cdot 6$ | $6 \cdot 6$ | $47 \cdot 9$ | $60 \cdot 8$ | 4944 | 145 | 185 | 858 | $4 \cdot 7$ |
| 1930 Av ． | $39 \cdot 6$ | $20 \cdot 9$ | $25 \cdot 6$ | 87.0 | $7 \cdot 2$ | $79 \cdot 8$ | $3 \cdot 9$ | $5 \cdot 3$ | $36 \cdot 8$ | $47 \cdot 6$ | 4677 | 119 | 141 | 909 | $4 \cdot 0$ |
| 1931 Av． | $34 \cdot 7$ | 14.5 | 21.8 | 71.8 | $5 \cdot 3$ | 66.5 | $2 \cdot 9$ | $3 \cdot 9$ | $24 \cdot 4$ | $32 \cdot 6$ | 4207 | 72 | 100 | 951 | $4 \cdot 6$ |
| 1932 Av ． | $31 \cdot 1$ | 13.8 | $13 \cdot 1$ | 58.5 | $4 \cdot 3$ | $54 \cdot 2$ | $2 \cdot 6$ | $3 \cdot 6$ | $23 \cdot 0$ | $30 \cdot 4$ | 3990 | 68 | 101 | 1020 | 6.0 |
| 1933 Av． | 28.3 | $15 \cdot 1$ | 12.5 | 56.3 | $4 \cdot 1$ | $52 \cdot 2$ | $2 \cdot 3$ | $3 \cdot 8$ | $23 \cdot 5$ | $30 \cdot 7$ | 3970 | 79 | 135 | 1130 | $7 \cdot 1$ |
| 1934 Av． | 28.9 | $17 \cdot 5$ | $14 \cdot 2$ | $61 \cdot 0$ | $4 \cdot 3$ | 56.7 | $2 \cdot 5$ | $4 \cdot 0$ | $25 \cdot 4$ | $33 \cdot 0$ | 4230 | 114 | 170 | 1289 | $7 \cdot 7$ |
| 1935 Av． | $29 \cdot 6$ | $17 \cdot 7$ | $15 \cdot 4$ | $63 \cdot 0$ | $4 \cdot 6$ | 58.4 | $2 \cdot 6$ | $4 \cdot 4$ | $27 \cdot 4$ | $35 \cdot 5$ | 4262 | 123 | 189 | 1464 | 9.9 |
| 1936 Av ． | 31.8 | $20 \cdot 7$ | $17 \cdot 7$ | $70 \cdot 7$ | $5 \cdot 1$ | $65 \cdot 6$ | $3 \cdot 0$ | $4 \cdot 3$ | $28 \cdot 4$ | $36 \cdot 7$ | 4369 | 148 | 225 | 1685 | $11 \cdot 6$ |
| 1937 Av ． | $35 \cdot 9$ | $26 \cdot 3$ | $22 \cdot 9$ | $85 \cdot 7$ | $6 \cdot 3$ | $79 \cdot 4$ | $3 \cdot 2$ | $5 \cdot 4$ | $33 \cdot 7$ | $43 \cdot 5$ | 4610 | 163 | 249 | 1909 | $12 \cdot 4$ |
| 1938 Av． | $35 \cdot 8$ | $20 \cdot 7$ | 19.5 | 76.6 | $5 \cdot 1$ | 71.5 | $3 \cdot 0$ | $4 \cdot 7$ | $30 \cdot 4$ | $39 \cdot 2$ | 4353 | 130 | 199 | 2031 | 11.2 |
| 1939 Av． | $33 \cdot 2$ | $20 \cdot 1$ | 19.9 | $73 \cdot 8$ | $3 \cdot 8$ | $70 \cdot 0$ | $3 \cdot 0$ | $4 \cdot 5$ | $28 \cdot 2$ | $36 \cdot 6$ | 4437 | 153 | 253 | 2201 | $14 \cdot 2$ |
| 1940 Av． | $35 \cdot 0$ | $28 \cdot 2$ | 26.5 | $90 \cdot 2$ | $2 \cdot 2$ | 88.0 | $2 \cdot 8$ | $2 \cdot 0$ | $26 \cdot 3$ | $32 \cdot 7$ | 4290 | 157 | 248 | 2398 | $14 \cdot 1$ |
| 1941 Av． | $35 \cdot 2$ | $18 \cdot 9$ | 27.4 | $82 \cdot 2$ | 0.7 | 81.5 | $2 \cdot 6$ | 1.3 | $22 \cdot 9$ | $27 \cdot 0$ | 3957 | 142 | 236 | 2697 | 11.4 |
| 1942 Av ． | $36 \cdot 3$ | 18.7 | 26.0 | 83.0 | 0.4 | $82 \cdot 6$ | 1.5 | 0.8 | $19 \cdot 7$ | $22 \cdot 6$ | 3930 | 146 | 244 | 2971 | $10 \cdot 1$ |
| 1943 Av． | $42 \cdot 8$ | 21.9 | $36 \cdot 8$ | $102 \cdot 8$ | 0.5 | $102 \cdot 3$ | $1 \cdot 6$ | 0.8 | 16.7 | $19 \cdot 4$ | 3815 | 138 | 251 | 3079 | $10 \cdot 2$ |
| 1944 Av ． | $43 \cdot 3$ | $23 \cdot 3$ | $39 \cdot 8$ | 108.9 | $1 \cdot 3$ | 107.6 | $1 \cdot 9$ | 0.7 | $19 \cdot 0$ | $22 \cdot 1$ | 3688 | 130 | 234 | 3196 | $10 \cdot 9$ |
| 1945 Av． | $40 \cdot 8$ | $24 \cdot 5$ | $25 \cdot 1$ | 92.0 | $4 \cdot 2$ | 87.8 | $4 \cdot 6$ | $1 \cdot 3$ | $25 \cdot 6$ | $33 \cdot 3$ | 3506 | 137 | 227 | 3107 | 11.5 |
| 1946 Av ． | $53 \cdot 1$ | $32 \cdot 5$ | $20 \cdot 4$ | 108.4 | $4 \cdot 2$ | 104．2 | 5．3 | $2 \cdot 7$ | $65 \cdot 5$ | $76 \cdot 2$ | 3646 | 149 | 244 | 3437 | $14 \cdot 9$ |
| $\begin{gathered} 1947 \mathrm{Av} . \\ 1946 \end{gathered}$ | $67 \cdot 1$ | $46 \cdot 7$ | $33 \cdot 3$ | $149 \cdot 0$ | $4 \cdot 9$ | 146．1 | $5 \cdot 4$ | $2 \cdot 9$ | $83 \cdot 2$ | $94 \cdot 8$ | 3782 | 147 | 240 | 3548 | $16 \cdot 9$ |
| JULY | $46 \cdot 6$ | $31 \cdot 2$ | 21.6 | $101 \cdot 4$ | $4 \cdot 4$ | 97．0 | $7 \cdot 1$ | $2 \cdot 9$ | $78 \cdot 6$ | 90.8 | 3491 | 147 | 226 | 2765 | $15 \cdot 6$ |
| AUG． | 64.0 | $32 \cdot 8$ | 22.0 | $121 \cdot 1$ | $4 \cdot 9$ | 116.1 | $5 \cdot 0$ | $2 \cdot 6$ | $67 \cdot 7$ | $77 \cdot 4$ | 3065 | 145 | 226 | 2847 | $12 \cdot 9$ |
| SEPT． | 51.3 | $30 \cdot 3$ | 22.2 | 106.2 | $3 \cdot 8$ | 102.4 | 4.3 | $2 \cdot 0$ | $62 \cdot 8$ | $71 \cdot 3$ | 3759 | 147 | 239 | 3105 | $15 \cdot 5$ |
| OCT． | $62 \cdot 4$ | $38 \cdot 8$ | $24 \cdot 1$ | $127 \cdot 5$ | $4 \cdot 0$ | 123.5 | $5 \cdot 4$ | 3.1 | $80 \cdot 8$ | $91 \cdot 4$ | 3891 | 156 | 254 | 3733 | $17 \cdot 4$ |
| NOV．． | $57 \cdot 3$ | $40 \cdot 5$ | $24 \cdot 3$ | 124.4 | $4 \cdot 8$ | 119.6 | $4 \cdot 7$ | $3 \cdot 4$ | $80 \cdot 6$ | 91.8 | 3896 | 154 | 264 | 3938 | 16.5 |
| $\begin{aligned} & \text { DEC. } \ldots \\ & 1947 \end{aligned}$ | $57 \cdot 0$ | $32 \cdot 5$ | 25.4 | $117 \cdot 0$ | $5 \cdot 2$ | 111.8 | $3 \cdot 9$ | $2 \cdot 5$ | $74 \cdot 2$ | $83 \cdot 6$ | 3629 | 153 | 236 | 4372 | $15 \cdot 3$ |
| JAN． | $61 \cdot 6$ | $35 \cdot 1$ | $22 \cdot 3$ | 121.5 | $5 \cdot 1$ | 116.4 | $4 \cdot 7$ | $3 \cdot 6$ | $80 \cdot 1$ | 91－2 | 3707 | 150 | 240 | 4671 | $17 \cdot 6$ |
| FEB． | $59 \cdot 2$ | $29 \cdot 5$ | 22.2 | 112.8 | $6 \cdot 6$ | 106．2 | 3.7 | $3 \cdot 1$ | $66 \cdot 8$ | 76.0 | 3777 | 126 | 206 | 3681 | $12 \cdot 8$ |
| MAR． | $65 \cdot 1$ | $38 \cdot 0$ | 25.0 | 129.9 | $6 \cdot 4$ | 123.5 | $4 \cdot 5$ | $3 \cdot 3$ | 71.5 | $82 \cdot 6$ | 3844 | 123 | 196 | 3984 | $15 \cdot 9$ |
| APRIL | 71.0 | 46.7 | $27 \cdot 7$ | 146.8 | $6 \cdot 7$ | $140 \cdot 2$ | $4 \cdot 5$ | $2 \cdot 9$ | 71.8 | $82 \cdot 4$ | 3672 | 139 | 236 | 3387 | $15 \cdot 2$ |
| MAY | $74 \cdot 9$ $70 \cdot 5$ | $43 \cdot 9$ | $32 \cdot 4$ $34 \cdot 8$ | $152 \cdot 6$ | $7 \cdot 1$ | $145 \cdot 6$ | $4 \cdot 4$ | $3 \cdot 3$ | $79 \cdot 3$ | $89 \cdot 7$ | 3794 | 142 | 244 | 3092 | 16.6 |
| JUNE | $70 \cdot 5$ | $46 \cdot 1$ | $34 \cdot 8$ | $154 \cdot 2$ | $4 \cdot 1$ | $150 \cdot 1$ | $5 \cdot 9$ | $2 \cdot 9$ | $81 \cdot 2$ | $93 \cdot 0$ | 3851 | 144 | 254 | 2842 | 16.8 |
| JULY | $82 \cdot 0$ | 56.4 | $39 \cdot 2$ | $179 \cdot 5$ | $4 \cdot 3$ | 175．2 | 6．2 | $3 \cdot 0$ | 96.9 | $110 \cdot 1$ | 3332 | 143 | 212 | 2866 | $18 \cdot 2$ |
| AUG．． | $75 \cdot 6$ | $56 \cdot 6$ | $38 \cdot 3$ | 172.9 | $3 \cdot 6$ | 169.3 | $6 \cdot 1$ | $2 \cdot 9$ | $82 \cdot 2$ | 93.7 | 3344 | 147 | 234 | 2767 | 12.9 |
| SEPT．． | 71.5 | $48 \cdot 2$ | $39 \cdot 0$ | 161.0 | $3 \cdot 4$ | 157.6 | $5 \cdot 4$ | $2 \cdot 0$ | 89.2 | $99 \cdot 2$ | 3779 | 150 | 266 | 3150 | 18.7 |
| OCT． | 68．5 | $48 \cdot 9$ | 41.8 | $161 \cdot 4$ | $4 \cdot 0$ | $157 \cdot 4$ | $5 \cdot 9$ | $2 \cdot 2$ | 96.8 | $108 \cdot 2$ | 4021 | 161 | 275 | 3725 | $20 \cdot 1$ |
| NOV．．． | 51.7 | $46 \cdot 2$ | 38.5 | 138.2 | $4 \cdot 0$ | $134 \cdot 2$ | $6 \cdot 6$ | $2 \cdot 4$ | 89.8 | $102 \cdot 3$ | 4254 | 166 | 273 | 3983 | $18 \cdot 3$ |
| DEC． $1948$ | $62 \cdot 3$ | 50.5 | $39 \cdot 0$ | $153 \cdot 4$ | $4 \cdot 0$ | $149 \cdot 4$ | 6.8 | $2 \cdot 7$ | $94 \cdot 7$ | $110 \cdot 2$ | 3790 | 165 | 243 | 4432 | $19 \cdot 2$ |
| JAN． | 68.7 | 51.7 | 39.2 | $161 \cdot 8$ | $5 \cdot 4$ | 156.4 | $8 \cdot 2$ | $3 \cdot 5$ | 104－2 | 119.5 | 4110 | 168 | 281 | 4541 | $19 \cdot 6$ |
| FEB． | 57.8 | 51.8 | 35.9 | $148 \cdot 1$ | $3 \cdot 9$ | $144 \cdot 2$ | $7 \cdot 1$ | $4 \cdot 2$ | 97.7 | 112.9 | 4100 | 176 | 289 | 4227 | 18.8 |
| MAR. | $80 \cdot 9$ | $53 \cdot 2$ | 41.9 | $178 \cdot 2$ | $6 \cdot 1$ | $172 \cdot 1$ | $7 \cdot 6$ | $3 \cdot 9$ | $105 \cdot 8$ | 121.0 | 3908 | 179 | 291 | 3959 | $19 \cdot 7$ |
| APR. MAY | 75.5 73.9 | $63 \cdot 6$ 58.9 | $44 \cdot 2$ | $184 \cdot 9$ | $5 \cdot 3$ | $179 \cdot 6$ | $8 \cdot 3$ | $5 \cdot 0$ | 109.7 | 126.4 | 4247 | 181 | 294 | 3744 | $19 \cdot 6$ |
| MAY | 73.9 71.8 | $58 \cdot 9$ $60 \cdot 7$ | $40 \cdot 7$ $42 \cdot 6$ | $176 \cdot 0$ | $5 \cdot 6$ $4 \cdot 8$ | $170 \cdot 4$ | $8 \cdot 1$ | $6 \cdot 1$ | 112.5 | $129 \cdot 9$ | 3927 | 184 | 293 | 3482 | $18 \cdot 3$ |
| JUNE | 71.8 | $60 \cdot 7$ | $42 \cdot 6$ | $177 \cdot 1$ | $4 \cdot 8$ | $172 \cdot 3$ | $8 \cdot 3$ | 6．7 | $115 \cdot 2$ | $134 \cdot 0$ | 4195 | 181 | 297 | 3379 | 20.0 |
| JULY | $80 \cdot 4$ | 54.9 | $48 \cdot 4$ | 185.6 | $6 \cdot 3$ | 179.3 | $7 \cdot 7$ | $7 \cdot 2$ | $127 \cdot 4$ | $145 \cdot 6$ | 3526 | 171 | 232 | 3242 | 19－1 |
|  | 73.7 66.7 | $58 \cdot 2$ 56.3 | $40 \cdot 1$ | $173 \cdot 8$ | $4 \cdot 2$ | $169 \cdot 6$ | $6 \cdot 8$ | $6 \cdot 8$ | $115 \cdot 2$ | $130 \cdot 5$ | 3513 | 174 | 271 | 3294 | $16 \cdot 2$ |
| OCT．．．． | 66.7 | 56.3 | $42 \cdot 5$ | $169 \cdot 4$ $174 \cdot 4$ | $5 \cdot 3$ $5 \cdot 4$ | $164 \cdot 1$ $169 \cdot 0$ | $7 \cdot 2$ | $7 \cdot 2$ | 115.0 | 131.0 140.1 | $\begin{aligned} & 4074 \\ & 4224 \end{aligned}$ | 181 | 297 | 3561 | $20 \cdot 9$ |
| $\ddagger$ Change in classification in 1919．Italies as in 1913. |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |

[^58]

RETAIL SALES. - Index of value of sales in Departmental Stores, Co-operatives, multiple and independent shops, Each index is based on average dauly sales during the whole of 1942 for the category to which it relates. Index numbing are derived from the percentage movements of the daily sales for anly . For discussion see Board of Trade month of the previous year until 1945 when series relates

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## CANADA

## Information communicated by Professor D. C. MacGregor of the University of Toronto

9th October, 1948.

THE abrupt decline in Canada's reserve of gold and U.S. dollars ceased early this year. In the middle of December, 1947, a month after the imposition of " austerity" restrictions mentioned in the letter of last April, the reserve had reached a minimum of $\$ 461 \mathrm{Mn}$. In the next six months it rose by roughly $\$ 140 \mathrm{Mn}$. The latter sum does not include proceeds of government borrowing in the United States.

Since May the largest single factor in the improvement has been the purchase of Canadian products for the European Recovery Programme, some $\$ 200 \mathrm{Mn}$. of U.S. funds having been spent in Canada in the four months up to August 16th. As to ordinary commodity trade with the United States, the reduction in the negative trade balance was roughly $\$ 260 \mathrm{Mn}$. in the six months ending June. Of this improvement, some $\$ 160 \mathrm{Mn}$. is from increased value of exports. The increase arises mainly from such changes as higher prices, especially for newsprint, diversion to the U.S. of goods formerly shipped elsewhere (e.g. lumber), larger production for the U.S. market, as in the case of aluminium, and the higher volume and price of goods now able to enter the American market owing to tariff reductions (e.g. fish, copper, dairy cattle, etc.).

As for imports from U.S., those subject to special restrictions since November last have been considerably reduced, the reduction being greater in consumers' than in producers' goods. The combined saving in both types of goods has been some $\$ 150 \mathrm{Mn}$. Offsetting this saving was an increase of some $\$ 50 \mathrm{Mn}$. in the outlay for non-restricted items such as coal and oil, so that the net reduction in total imports from the U.S. is $\$ 100 \mathrm{Mn}$.*

On August 1st the special $25 \%$ excise on both domestic and imported durable goods was removed, restoring the situation which existed prior to November 18th, 1947. The need for this levy was reduced by the appearance of excessive inventories of certain durable goods such as small radio sets. The levy had, moreover, been subject to severe criticism

[^59]because it applied to domestic as well as imported wares. To some extent it is being replaced by the quotas on imports.

In the week of August 16th the embargo on exports of beef cattle to the United States was removed. (Hitherto only exports of dairy cattle and breeding stock had been allowed.) Cattle prices moved up toward the considerably higher American levels but marketings have been very large and prices are not yet as high as Chicago quotations would justify. Considerable export sales have naturally been made. The proceeds will go far to offset the effects of removing the $25 \%$ excise.

The $\$ 300 \mathrm{Mn}$. loan from the U.S. ExportImport Bank, which was only partly used, has been repaid with the proceeds of a fifteen year loan of $\$ 150 \mathrm{Mn}$. at $3 \%$, sold in the usual manner in New York during August.

The Budget, introduced on May 18th, was designed to check the inflationary drift by maintaining existing levels of taxation. In view of the demands for tax reduction it was an act of courage, politically speaking, and consistent with the government's desire to meet the American dollar problem and give further aid to Europe if possible. Tax reductions were mainly in the field of wider exemptions, which were applied to processed foods hitherto subject to the $8 \%$ manufacturers' sales tax, to income tax on persons over 65 years of age and to succession duties on small and medium sized estates. To provide for exploration expenses for mines and oil wells, allowances and tax credits are extended for another year. These changes are expected to lower anticipated revenues of $\$ 2,724 \mathrm{Mn}$. by a little over $2 \%$ or $\$ 60 \mathrm{Mn}$. Anticipated expenditures are $\$ 2,175 \mathrm{Mn}$. which would leave a surplus of $\$ 489 \mathrm{Mn}$. Additional sources and requirements are not budgeted for.

Last year's surplus was $\$ 670 \mathrm{Mn}$. but on a cash basis it was greater than this by $\$ 511 \mathrm{Mn}$. or $\$ 1,181 \mathrm{Mn}$. in all. The additional $\$ 511 \mathrm{Mn}$. came mainly from repayment of government advances by the Foreign Exchange Control Board, as it sold its holdings of American dollars.

In addition to using the total cash surplus of $\$ 1,181 \mathrm{Mn}$., the government reduced its large wartime bank balances by some $\$ 450 \mathrm{Mn}$., the total from all these sources reaching some
$\$ 1,600 \mathrm{Mn}$. It should be noted that about one half of this total was from non-recurring sources of funds. Of the $\$ 1,600 \mathrm{Mn}$. roughly $\$ 1,000 \mathrm{Mn}$. was used for internal debt redemption, $\$ 500 \mathrm{Mn}$. for loans to overseas governments, and $\$ 100 \mathrm{Mn}$. for internal lending to war veterans and various government agencies.

Money and Banking.-Bank deposits (col. 5) have reached new maxima, mainly owing to further increases in security holdings of the chartered banks.

The unprecedented rise of the banks' commercial loans during the second half of 1946 and throughout 1947 came to an end last November. In the next four months the total fell some $7 \frac{1}{2} \%$, or almost as rapidly as it had risen, since when a slight increase has occurred. That the Bank of Canada had urged caution upon the chartered banks from time to time since the middle of 1947 was made clear by the Bank's Governor in testimony before the House of Commons Special Committee on Prices on May 27th-28th last.

In addition to extending more commercial loans, largely for inventories, the banks expanded their portfolios of non-governmental securities $\dagger$ from $\$ 118 \mathrm{Mn}$. on December 31st, 1945, to $\$ 207 \mathrm{Mn}$. on December 31st, 1946, and \$353 Mn. on December 31st, 1947, or about threefold. Most of the increase arose from purchase of new issues of Canadian industrial bonds. In view of the falling interest rates on government securities this was a logical change, though financing of long-term capital needs was a marked departure from Canadian banking practice. In February last the Central Bank urged the commercial banks to refrain from this type of financing. Further increases have incurred throughout the present year, however, the total of "Other securities" on July 31st reaching $\$ 412 \mathrm{Mn}$. Prior to 1940 , the total averaged about $\$ 125 \mathrm{Mn}$., and purchases do not appear to have been closely related to new issues.

Interest Rates on long-term government bonds (col. 2), which the Central Bank allowed to rise from a low of $2.55 \%$ in November to $2.79 \%$ in January and $2.98 \%$ in February, fell in April but have since been rising again. The figures suggest that the latest rise would have been greater had the Central and Commercial Banks not added further to their holdings of government securities. In short, the rate of interest is still being kept down by credit expansion.

Velocity of the money supply has begun to

[^60]rise from the very low point of 1946, as the following table of exchange velocity shows :


* $9 / 8 \times$ published figures.
$\dagger$ Average month.
$\ddagger$ Approx. 13.8 on 12 months' basis.
A similar upward trend since 1946 appears in circular or income velocity in the following table :-

* National Accounts, Income and Expenditure, 1926-47 (Ottawa, D.B.S.), 1948, p. 4.
$\dagger$ Includes savings deposits.
$\ddagger$ Labour income only. Canadian Statistical Review (Ottawa, D.B.S.), Aug., 1948, p. v.

The last two lines of the second table suggest that from 1947 to 1948 income has increased between four and five times as much as money supply, indicating a circular velocity for 1948 of of at least 1.6. Comparison with the years 1911-30 $\ddagger$ suggests that velocity may reach as high as 2 per annum without a marked change from habitual methods of payment. It is of course debatable how far such a rise of velocity would go unless prices continue advancing in the United States and the United Kingdom. The very high level of investment suggests that the inflationary forces whose immediate origin is within Canada are to some extent sheltered from outside influence, but this could not continue for long if external prices began to fall, except to the extent that the rise of prices in Canada had not yet overtaken the rise elsewhere.

Prices.-A public enquiry into the causes of higher prices was begun in the spring by a

[^61]Select Committee of the House of Commons and is now being continued by a Royal Commission. The Committee's inquiry was successful mainly in delaying discussion of the subject on the floor of the House, and in diverting attention from the importance of budgetary policy. A large part of the inquiry has been devoted to investigation of business firms, the suggestion arising repeatedly that higher profits are a main cause of higher prices, although this interpretation was not given much weight in the Committee's report. The proceedings contain useful information on the experience of firms during a period of rising costs and high demand, and supplement that gathered by the Royal Commision on Price Spreads under the opposite conditions of 1932-33.

The advance of prices was less rapid in the first four months of the year than in 1947, particularly at the wholesale level, but since April the upturn of both wholesale and retail prices has been exceedingly swift and further advances are almost certain to occur in view of such recent events as higher steel prices, higher wages and higher freight rates for rail and road transport. While prices of animal products have risen the most, the increases have been well distributed over all groups at the wholesale level. Since April, advances in retail prices have been confined mainly to foodstuffs and fuel. The retail index reached 158.9 on September 1st, the increase since August 1st, 1939, having been $57.7 \%$. Flour is again being subsidized in connection with control of bread prices.

Informed opinion in private enterprise and in government still holds that increased production is the best method of preventing further increases of prices. The term, disinflation, has not yet begun to be used.

Production.-The seasonally corrected index of industrial production exceeded the previous year by an average of $2.8 \%$ over the first seven months. The increase was greatest in mining, especially of nickel, while the increases in both the durable and non-durable goods groups were some $2 \%$. Certain industries such as radios, shoes, and felt hats show declines. Production of hydro-electric power for Quebec and Ontario is again reduced seriously owing to a prolonged period of low rainfall and insufficient storage facilities in the hinterland. Revenue freight carried by the railways (in tons) increased by a little over $1 \%$ in the first six months.

Agricultural production is considerably higher than last year, the increase in the out-turn of oats being some $20 \%$ and of wheat $10 \%$. Though
they compare favourably in size with the poor results of 1947, most of this year's grain crops are below the ten-year average.

Fodder crops and potatoes are better than average. An acute mid-winter shortage of butter is anticipated and imports have commenced aided by federal subsidies.

The Investment Programme discussed in the previous letter has thus far gone forward with less curtailment than the writer anticipated. According to a sampling survey conducted by the Department of Reconstruction in May, it was found that investment plans of private firms had been revised upward by some $7 \%$ since the survey of last autumn, but this increase reflects mainly increased costs of construction. Postponement of new undertakings is not easy to secure information about, but it is clear that two very large and urgent public undertakings in Ontario have been delayed, namely a big programme of paving work on provincial highways and the construction of an underground railway (i.e. subway) in Toronto. With regard to imports of capital goods, it appears that government restrictions have not yet greatly reduced the spending in this direction. As some of the importations arise from direct investment of American capital, they do not call for restriction.

More houses are being built than a year ago, and are being finished more quickly. In this field shortages of materials and labour have been less serious than last year.

Employment has exceeded the comparable levels of 1947 by from 3 to $4 \%$, according to the index. The advance extended to all major groups except logging, where the accomplishment of more work in the winter enabled an earlier curtailment of staffs, who were then available for other out door work. The Department of Labour states that the demand for labour was filled more adequately than in any recent year and that labour turnover among older workers was lower. The quarterly sample of the labour force shows 82,000 unemployed at the beginning of June against 91,000 for 1947 and 126,000 for 1946. The total number employed was 127,000 greater than a year before, the over-all increase being less than half that shown by the index. Immigration has now become large enough to ease the labour shortage, especially in outdoor industries and certain services. In the five months ending May the number of immigrants of all ages was 33,000 , one fourth of whom were Displaced Persons.

Wage rates have been rising in most industries

§Revised from 1945 to include extra payments by Can. Wheat Bd. on wheat \& flax. đNew base, \% of 1935-9. *Provisional. Cols. 13, 14, 16-seasonally adjusted. DATES of SERIES: Cols. 4, 5, 17-19, end of month; 1-2, 6-8, averages; 9, beginning of month. Sourde : Dominion Bureau of Statistics. Notes on Series

Col. 1.-"Investor's Index." Index of current market valuation of shareholders' equity in 100 companies. (\% of 1935-39.)
" 2.-Based on the calculated yield of a bond having a constant 15 -year maturity period. (\% of 1935-39.)
3.-From 33 banking centres, comprising about $85 \%$ of total debits. Excludes debits to accounts of central bank since its founding in April, 1935. Largely influenced by financial transactions.
4 - Refers to operations in Canada only. Includes loans to provincial and municipal governments.
5.-Includes governmental deposits. Excludes all deposits with provincial, postal and Quebec savings banks, and with trust companies.
,, 6-8.-Col. 6 comprises 70 items ; col. 7, 296 items; col. 8, 508 items.
", 9.-Comprises separate groups for food, fuel, lighting, rent, clothing,
11 home furnishing, sundries (mcluatary serd non-monetary gold since
" 11.-Excludes all exports of both monetary and non-monetiped as dust, 1937; includes gold in small quants.
Col. 12.-Comprises agricultural (vegetable) products and animal products
groups, includes partly and fully manufactured products, in some cases made from imported raw materials, e.g., rubber
13.-Adjusted for seasonal variation. New index includes more industries and products than formerly ( 170 series), but excludes building; base 1935-9: weighted by the net values for that period.
, 14.-Based on value of contracts awarded, deflated annually for changes in union rates of wages, and monthly for changes in prices of building materials.
15.-Revenue freight only ; excludes cars received from U.S. connections 16.-Revised back to January, 1938. Index of value, comprising urban department, variety and independent stores ; also country general stores. Adjusted for number of business days and seasonal variation. Base $1035=100$. From January, 1929, to December, 1937, does not include country general stores.
7 .
19.- Establishments with over 15 employees only. Includes part-time workers on same basis as full-time. Excludes farm labourers, civi servants, education, hospitals, finance and other service industries.
at about the same speed as the cost of living, recent increases being mostly from 5 cents to 12 cents per hour. An important exception was an increase of 17 cents per hour to 200,000 railway workers, the first increase since 1946. Labour relations have been more amicable, except in Great Lakes shipping, and very little time has been lost through strikes.

Retail sales have averaged $12 \%$ above those of a year ago, but it is thought that a slight fall in physical volume has occurred.

The latest annual income estimates are as follows :-


Further indications of reduced personal savings (cf. letter of last April, p.80) are a slight decline in sales of new life insurance, in contrast with the spectacular increases in sales during 1946-47, and a statement by the Governor of the Central Bank that the public is believed to be a net seller of government bonds. $\Phi$

I House of Commons Special Committee on Prices. Minutes of Proceedings and Evidence, p. 3329, (May 27th, 1948).

All in all it is surprising that the foreign exchange crisis has not produced more dislocation. Perhaps that is yet to come. The results have for the most part been widely dispersed and few foci of disturbance have come to light apart from those mentioned last April. This outcome may be attributed to the strong stock position reached by the end of 1947 in both domestic and American products, and to the limited application of restrictions on imports of capital goods (made possible by increased receipt of American dollars from exports). Also, the flow of goods available for use in Canada has been increased by larger imports from outside the dollar area; and by smaller Canadian exports of iron and steel products, consequent on reduced buying power overseas. Probably the main results of the crisis, if such it can be called, have been a swifter rise in prices of goods subject to restrictions, and a slight check on the investment boom which was rapidly becoming excessive. The second result to some extent offsets the first.

A revised index of prices of Canadian farm products appear in Column 6 of the table on p. 149, reflecting additional retroactive payments on wheat and flax announced by the Canadian Wheat Board on 14th February, 1948. The revised figures, which extend back to 1945, will be found in the April 1948 number of Prices and Price Indexes (Ottawa, D.B.S.), p. 5.

The Monthly Bulletin of Business Statistics has been superseded by the Canadian Statistical Review which presents a slightly wider range of material in less detail. A weekly supplement has been added (Ottawa, D.B.S.).


[^0]:    * Although the word "price" is used in the text for convenience, it is really the "value added" in that stage of the productive process which is the multiplier. The distinction is often very important where the price of the materials used by the industry has moved quite differently from the value added in the conversion process.

[^1]:    * This would, of course, be even less true of our current standards, since with the Spring and Autumn budgets of 1947 and with certain cuts in rations, our mode of life is already, in a number of respects, more austere than on the average for 1947.

[^2]:    $\dagger$ A surplus in the public budget is not the same thing as a surplus in the Central Government budget, as public revenue and expenditure, as we use the terms, exclude certain capital items and include the accounts of local authorities and of the extra-budgetary funds (for national insurance, etc.). In order to convert our surplus of $£ 400 \mathrm{Mn}$. on the public budget into the Central Government's budget surplus as conventionally defined, it is necessary to (i) deduct from our $£ 400 \mathrm{Mn}$. any surplus on extrabudgetary funds and local authorities' revenue accounts; and (ii) to add certain 'capital transfer' revenues (such as proceeds of the sale of surplus war stores) which are included in the revenue of the conventional Central Government Budget. If, for the end of 1948, we deducted $£ 125$ Mn . for item (i) and added $£ 50 \mathrm{Mn}$. roughly for item (ii) above, our public budget surplus would roughly correspond to a conventional Budget Surplus of $£ 325 \mathrm{Mn}$. We are not so rash as to forecast the yield of current rates of taxation, etc. (including the effects of last autumn's budget and the planned increases in national insurance contributions) ; but we believe that our illustrative budget surplus of $£ 400 \mathrm{Mn}$. is not very different from that which would result from the continuation of these rates of taxation, etc., together with the government expenditure which we have assumed.

[^3]:    $\dagger$ We have constructed these Tables on the principle of " double entry" book-keeping. Each item which appears on the one side of one Table appears also (either alone or as part of a larger aggregate) on the other side of one of the other Tables. In each Table the left hand side represents payments into, and the right-hand side, payments out of a particular account. This procedure has involved a reversal of the conventional order for our Table 1, which shows the National Income and Expenditure. From the accounting point of view the items enumerated on the left-hand side of this Table represent receipts of the national economy from the sale of goods and services for particular purposes (e.g., personal consumption, public consumption, home investment, net sales to foreigners), while the right-hand side shows how these net receipts are paid out to the various factors of production in rent, interest, salaries and wages.

[^4]:    * We have assumed that the 'terms of trade' on which we can exchange our exports for imports is much the same at end-1948 as in 1947. This is another factor which might appreciably affect the 'efficiency' of our own resources in obtaining goods and services for our own use.

[^5]:    $\star$ This does not, of course, mean that one could not concentrate such new domestic investment as does take - place upon industrial re-equipment rather than on housing, office building, etc.

[^6]:    * Businesses are in a similar position. During the war they put profits to reserve and continued to make allowances for depreciation, but were unable to spend these sums on extensions or renewals of capital equipment. They have received E.P.T. refunds and payments for war damage sustained, not all of which they have as yet been able to replace.

    The magnitude of the liquid funds overhanging the markets for consumption goods and for capital goods may be illustrated by the fact that, whereas the gross national income at market prices is estimated to have risen by some $80 \%$ between 1938 and 1947, the currency circulation in the hands of the public had, in the same period, risen by no less than $200 \%$, the deposits with the clearing banks by $150 \%$, small savings (i.e., Savings Certificates, Savings Bank Deposits and Defence Bonds) by nearly $400 \%$, and the rest of the internal debt in unofficial hands (which in present monetary conditions is fairly readily realisable) by $170 \%$. The combined total of national debt, currency, and deposits, excluding assets held by the banks and on foreign account, has risen by about $175 \%$.

[^7]:    * Other than 'Other Debt-Internal,' the increase in which represents borrowing from the I.M.F.

[^8]:    ＊The calculations in this article were carried out by Miss Margaret Jones．

[^9]:    $\dagger$ The Board of Trade index uses all information in the Monthly Trade Accounts, and the annual figures are later revised on the basis of the Annual Statement of Trade.
    $\ddagger$ That is, there is negative correlation between the price and quantity relatives.

[^10]:    $\star$ Published monthly in the Monthly Digest and Board of Trade Fournal.

[^11]:    * The proportions for quantities would be different as prices in different countries are by no means uniform.

[^12]:    NOTES.-U.S. dollar area includes U.S.A. and possessions, Philippines, Cuba, Hayti, Mexico, S. Domingo, Guatemala, Honduras, Salvador, Nicaragua, Costa Rica, Colombia, Panama and Venezuela.
    All British countries (including Burma) except Canada, Newfoundland and Anglo-Egyptian Sudan are in the sterling area.

    Rest of World includes non-British sterling countries.

[^13]:    ^ H.C. Deb., Vol. 449, No. 93, April 6, 1948, col. 37.
    $\dagger$ H.C. Deb., April 6, 1948, col. 49.
    In the Budget speech, reductions in Purchase Tax were estimated at about $£ 50 \mathrm{Mn}$. for a full year. Ibid., col. 69 .
    $\ddagger$ Since Budget day, the Chancellor has withdrawn the proposal to tax children's non-utility clothing, which would have yielded $\not f_{2} \mathrm{Mn}$. a year, but there may be other changes before the Finance Act is passed. To fix a date for the figures used in this article, it seemed best to adhere to the Financial Statement and to ignore all subsequent changes.
    Amendments can easily be made, if necessary.

[^14]:    * Financial Statement 1948-49, pp. 8-9.
    +Cf. Note 23 to Tables.
    $\ddagger$ See Cmd. 7371, p. 34, Table 19, item 88, and Cmd. 7344, p. 17, Table XI.

[^15]:    * H.C. Deb., Vol. 449, No. 93, April 6, 1948, cols. 58-9.

[^16]:    $\dagger$ The Chancellor (cf. p. 40 above) set himself the task of raising a surplus over all Government expenditure, current and capital. The above figure measures that surplus. It is, however, the contribution towards the financing of private investment, i.e., the amount of "lending" to the private sector of the economy, after Government capital expenditure has been provided for. To describe it as the contribution to total saving is an error. (Ibid. col. 77). That contribution is the surplus on current account, namely, $£ 315 \mathrm{Mn}$.

[^17]:    * Since, in this article, death duties (and the Special Contribution) are reckoned to be paid out of capital, current savings out of income are so much the larger. The corresponding figures on the definitions of the National Income White Paper are $£ 495 \mathrm{Mn}$. for 1947, and are something under $£ 55 \mathrm{Mn}$. for $1948 / 9$.

[^18]:    (1) Principal and interest, $1948 / 9=£ 14 \mathrm{Mn}$.
    ${ }^{( }{ }^{2}$ ) The Financial Statement, in the
    Alternative Classification," gives $£ 58 \mathrm{Mn}$. for $1947 / 8$, but it is impossible to deduce a higher figure than $£ 25 \mathrm{Mn}$. for 1947 from the estimates in Cmd. 7371 (cf. Table 5).
    ${ }^{(3)}$ Allowing for services to Departments not paid for and excluding capital expenditures.
    (d) Approximate figures
    (5) Cmd. 7371 gives $£ 40 \mathrm{Mn}$. for 1947.
    ${ }^{(6)}$ Civil Estimates, Class X, 7
    ${ }^{( }$) The Estimate for National Debt Interest includes cost of management (est. £3Mn.) and, usually, a contingency provision.
    ${ }^{8}$ ) Estimated from earlier published figures.
    ${ }^{(9)}$ ) Same figures as under Revenue.
    (10) Estimates. In 1946/7, stamps on transfers of property and companies' share capital duty yielded $£ 28 \mathrm{Mn}$. out of a total yield of stamp duties of $£ 38 \mathrm{Mn}$. Since then, the indirect taxes on investment have been doubled, but those on consumption are unchanged
    ${ }^{(11)}$ See Table 3,
    ${ }^{(12)}$ Approx.; same amount is deducted from expenditure. $\left.{ }^{(13}\right)$ Approximate figure for 1947 calculated from Cmd. 7371

[^19]:    Figures in later months are subject to revision. In general the index is based on the quantity of goods delivered by an industry ('A serios), the ' $B$ ' indices use additional series reflecting the changes in work in progress in house and shipbuilaing. The composition will be found in Bulletin, Feb. 1948, p. 8.

    * The 1935 figures (especially those in brackets) are subject to larger error than the rest of the index. On the same basis, the total for the average of $1935-8$ is probably abuut 109.
    $\dagger$ The compilers hope to publish next quarter, with the help of experts from the trade, an improved index of shipbuilding and repairing.

[^20]:    $\dagger$ Between 1914 and 1938 the difference between the results of the 1937 and 1914 system of weighting was much smaller, the computed increases being respectively about 62 and $57 \%$. Oxford University Institute of Statistics. Bulletin, January, 1941, p. 32.

[^21]:    $\ddagger$ See Special Memorandum No. 50 of the London and Cambridge Economic Service, p. 16.

[^22]:    (e) Calendar year data for last season relate to 1946; for current season to 1947. (f) Average 1937-38. (g) Price ratios are in terms of the currency in which quoted; the corresponding sterling ratios are added marked ( g ), where necessary. ( h ) \% of early 1939. (i) Including some secondary copper. (j) $\%$ of 1937. (k) \% of average 1934-8 for London sales. (1) Including some now used as a source of fats.

[^23]:    $\dagger$ Hitherto, these figures have appeared only month by month in the Housing Returns

[^24]:    EXTERNAL TRADE．－Excluding Munitions from 1940－5．Accounts of Trade of U．K．－Board of Trade，
    COAL．－STEEL Output of Saleable Coal，including opencast，Gt．Britain－Ministry of Fuel．
    ELECTRICITY．－
    RAYON．
    Units generated by Authorised Undertakers，Great Britain－Electricity Commission．
    waste）－Board of Trade．（excise returns）to December，1934．Subsequently delivered weight（i．e．，ex

[^25]:    * At the end of February the U.S. dollar balance had risen to $\$ 527 \mathrm{Mn}$. from a minimum of $\$ 416 \mathrm{Mn}$. at December 17 and $\$ 502 \mathrm{Mn}$. at December 31, 1947. The balance at December 31, 1946, was $\$ 1,245 \mathrm{Mn}$. (Financial Post, March 19, 1948.)

[^26]:    * See also the discussion in the letter of November, 1947, at page 135-6. Arguments similar to the Government's developed in the Bank of Nova Scotia's Monthly Review, February and March issues, 1948 ; also in Plumptre, A. F. W., Saturday Night (Toronto), March 13 and later

[^27]:    $\dagger$ Production of Basic and Building Materials in Canada: Outlook, 1948 (Ottawa, King's Printer), 1948. Also Public and Private Investment in Canada : Outlook, 1948 (Ottawa, King's Printer), 1948.

[^28]:    * Canadian Statistical Review (Ottawa, D.B.S.), February, 1948, p. vii.

[^29]:    * Canadian Retail Federation Bulletin (Toronto), Vol. 7, No. 38, September 19, 1947.
    $\dagger$ See articles by Claude Taylor in Financial Post (Toronto), March 13 and April 10, 1948.

[^30]:    ＊Other than sterling area countries，but including Japan and Philippines．

[^31]:    ${ }^{(1)}$ The author is indebted to Miss E. M. Sheen of the Economic Research Division, London School of Economics, for much of the preparatory work for this article.

[^32]:    $\left.{ }^{(2}\right)$ This division is somewhat different from that more frequently used ("Scheduled Territories," "AmericanAccount", "Transferable Account", "Bilateral", and "Other "). For the purposes of this exposition, the breakdown used here seems more realistic. For instance, in all respects, except capital transfers, the Middle Eastern countries are in a position similar to that of the Scheduled Territories, while the arrangements with Ceylon for the offsetting of capital transactions put that Dominion in a somewhat different position from that usually assumed to be involved in sterling area membership. Also the separation of Transferable Account countries from Bilateral Account countries (some of which are able to benefit from some "administrative transferability") does not seem to be entirely realistic. (cf. Bank for International Settlements, Annual Report, 1947-48, p. 97).

[^33]:    $\left.{ }^{(3}\right)$ Report : The Colonial Empire (1947-48) Cmd. 7433, p. 87
    (4) Cmd. 7422.
    ${ }^{(5)}$ Cmd. 7195, 7342.
    ${ }^{(6)}$ Cmd. 7343.
    (7) Cmd. 7201, 7269.
    ${ }^{8}$ ) Cmd. 7136, 7305.
    ${ }^{( }{ }^{9}$ Cmd. 7230.
    ${ }^{(10)}$ S.I. 1948, 285.

[^34]:    ${ }^{(12)}$ Defined as the countries benefiting under E.R.P.
    ( ${ }^{13}$ ) Belgium : Cmd. 7264; Denmark: Cmd. 6671 ; France: Cmds. 6613, 6809, 6908, 7112 ; Netherlands : Cmds. 6681, 6921; Norway: Cmd. 6697, 7162; Portugal : Cmds. 6798, 7401; Sweden: Cmds. 6604, 7529 ; Switzerland: Cmd. 6756.

[^35]:    $\left.{ }^{14}\right)$ Cmd. 6891.
    (15) Cmd. 7118.
    (16) Cmds. 6632, 6907.
    ${ }^{17}$ ) B.I.S. Op. cit. p. 96.

[^36]:    ${ }^{(18)}$ First agreement on Multilateral Monetary Compensation, Ibid, p. 167.
    ${ }^{19}$ ) p. 151-2.
    ${ }^{20}$ ) See statement of the Assistant Deputy Chief, Economic Co-operation Administration (U.S.A.), reported in Financial Times, July 10th, 1948.
    ${ }^{(21)}$ On June 1st, we had to make a short-term loan of $£ 10 \mathrm{Mn}$. to France after that country had evidently utilized the entire British credit previously extended. See also speech of President of the Board of Trade. Reported in Financial Times, July 14th.
    ${ }^{(22)}$ See article "Sterling or Gold for Europe," The Banker, July, 1948.

[^37]:    $\left.{ }^{(23}\right)$ Cmds. 6694, 7174.
    $\left.{ }^{24}\right) \mathrm{Cmd} .7166$.
    ${ }^{(25)}$ Cmds. 7148, 7352.
    ${ }^{(26)}$ Cmd. 7297.
    ${ }^{(27)} 1947$ Exports to U.S.S.R. $£ 14 \mathrm{Mn}$., Imports from U.S.S.R. $£ 7 \mathrm{Mn}$.
    $\left({ }^{28}\right)$ Trade surpluses with Eastern Europe in 1947 :U.S.S.R. $\quad \ddagger 7 \mathrm{Mn}$. $\begin{array}{lrr}\text { Poland } & \text { tr } & 9 \\ \text { Czechoslovakia } & 5 & \text { ", } \\ \text { Y } & 5 & \end{array}$

[^38]:    ${ }^{(29)}$ Cmds. 6953 and 7346.
    ${ }^{30}$ Cmd. 7348.
    ( ${ }^{31}$ ) Cmds. $7172,7340$.

[^39]:    $\left.{ }^{(32}\right)$ Comparisons made on the basis of the 1947 trade returns.
    ${ }^{(33)}$ Economist, July 3rd, 1948.

[^40]:    *To be published by the Cambridge University Press on behalf of Department of Applied Economics, Cambridge.

[^41]:    Figures in later months are subject to revision. In general the Index is based on the quantity of goods delivered by an industry ('A series) ; the ' B ' indices use additional series reflecting the changes in work in progress in house and shipbuilding,

    * The 1935 figures (and especially those in brackets) are subject to larger error than the rest of the index. On the same basis, the total or the average of $1935-8$ is probably about 108 .
    $\dagger$ Quarterly figures set against the middle months of the quarters. As a measure of the activity of the industry, more significance should be attached to comparisons based on the average of several quarters than to fluetuations from quarter to quarter. No shipbuilding A' series is published.

[^42]:    * The actual course would be best appreciated if a graph were drawn of the Bulletin Index over the three years.

[^43]:    Corrigenda-Bulletin, May 1948 p. 58. $\$ 3$ line 3, for Oct. 1947 read $A p l .1948$. Table, Principal Industries: in heading for fuveniles read All. In col. 2, for 195 read 198.

[^44]:    $\ddagger$ Including output of Local Authorities’ and other Industries' directly employed labour.

[^45]:    * Moreover, when quarterly figures are given there are not always four calendar quarters, which makes addition difficult.

[^46]:    It will be appreciated that many figures included above are rough estimates only. This applies especially to those in brackets. All tons are long tons of $2,240 \mathrm{lbs}$. n.a. = not available. (a) in hands of principa! exporters. (b) apparent supplies. (c) average 1936-9. (d) Some minor producers on other seasons. (e) incomplete.

[^47]:    $\star$ This suggestion comes from my colleague, Professor Carl Shoup.

[^48]:    *See in particular K. E. Boulding, " Price Control in a Subsequent Deflation," Review of Economics and Statistics February 1948. This is a minority view, but not to be taken lightly-particularly as at least part of the business, community feels that "what goes up must come down."

[^49]:    Back figures on cash from A. G. Hart, Money, Debt and Economic Activity (New York: Prentice-Hall, 1948), p. 539. "Cash" includes coin and paper money, demand deposits adjusted, and time deposits. See also the diagram covering 1873-1947, ibid, p. 210, and discussion, ibid, pp. 211-215.
    $\ddagger$ These figures are available in convenient form in a new publication, Economic Indicators, which is being compiled monthly by the Council of Economic Advisors and printed by the Joint Committee on the Economic Report.

[^50]:    $\star$ This would probably still be true of many people if subsidies were removed, with equivalent cuts in taxation, though the effect of increased prices in diverting demand can only be conjectural.
    $\dagger$ There are, of course, some logical difficulties in computing aggregate potential supply and aggregate demand separately. Aggregate demand is affected by the nature
    and size of the supply, because dissaving is stimulated by and size of the supply, because dissaving is stimulated by ability to buy motor cars ; and the success of the boardingso her demand letting all halysis must, therefore, only bc taken broadly.

[^51]:    * The increase in income-tax allowances made by this year's budget only became effective in July. Its size was broadly equal to the increased contributions to national insurance.
    $\dagger$ Partly because of a technical point connected with new potatoes being used in June this year, partly because the weight given to drink and tobacco is too big for this purpose, and that given to services too small.

[^52]:    Note :-The "Western Hemisphere" comprises all countries in the Western Hemisphere except British and European colonics together with the Philippines and the Dutch East Indies in respect of oil imports from U.S. companies operating therein.

    The "Dollar Area" is smaller, comprising U.S.A., Canada and Newfoundland, Caribbean and other U.S.-Account countrics and the Philippines.

[^53]:    $\left.{ }^{(3}\right)$ It can be noted that the selection of items and the grouping in the Board of Trade index of wholesale prices of food and tobacco are not suitable to present conditions. It would be better if some items were separated off (e.g. grains, tobacco) leaving prices of food, net of subsidies, at the distribution stage (e.g. flour, carcase meat, etc.) The retail price index would also be made more useful if shown for sub-groups as well as for all food.

[^54]:    $2 \frac{1}{2}$ days ( 2 days in 1946)
    $1 \frac{1}{2}$ days ( 1 day in 1946)
    $2^{\frac{1}{2} \text { day }}$ days
    days (21 $\frac{1}{2}$ days in 1947)
    $2^{\frac{1}{2}}$ day
    4 days
    1 day

[^55]:    Figures in later months are subject to revision. In general the Index is based on the quantity of goods delivered by an industry ('A'
    ${ }^{*}$ The 1935 figures (and especinlly theries reflecting the changes in work in progress in house and shipbuilding.
    for the average of 1935.8 is probably about 108 .
    Quarterly figures set probably about 108.
    should be attached to comparisons based on the months of the quarters. As a measure of the activity of the industry, more significance ' A ' series is published.

[^56]:    * Note :-In the August Bulletin, the estimate by the Ministry of Labour for the number affected by the November changes was quoted, and surprise was expressed that only about half of the workers were estimated to have received an increment. This criticism was misconceived, since the main group affected would include only those who had been receiving less than the raised minimum. This consideration has some effect on the alternative index, but none on the main index, which is based on the realised average earnings.

[^57]:    (f) Average 1934-38. (g) Price ratios are in terms of the currency in which quoted; the corresponding sterling ratios are added marked (g), where necessary. (h) \% of early 1939. (j) \% of 1937. (k) \% of average 1934-8 for London sales. (l) Including some now used as a source of fats. (n) excluding additions to up-country stocks. (o) The total world production of hard fibres may be estimated as about 450,000 tons for both 1947 and 1948.

[^58]:    EXTERNAL TRADE．－Excluding Munitions from 1940－5．Accounts of Trade of U．K．－Board of Trade．
    IRON AND STEEL．Output of Saleable Coal，including opencast，Gt．Britain－Ministry of Fuel，
    IRON AND STEEL．－Output of Pig Iron，Steel Ingots and Castings－Iron and Steel Control．
    ELECTRICITY．－Before Apr．1948，units generated by Authorised Undertakers，Great Britain－Electricity Commission．
    RAYON．－ There Apr．1948，units generated by Authorised Undertakers，Great Britain－Electricity Commission． Thereafter stations controlled by Brit．Elect．Authority and N．of Scotland Hydro－elect．Bd．－Ministry of Fuel． Monthly Totals．Gross weight（excise returns）to December，1934．Subsequently delivered weight（i，e．，ex waste）－Board of Trade．

[^59]:    * A survey of recent trade movements and the exchange position will be found in the Monthly Review of the Bank of Nova Scotia (Toronto) for August, 1948.

[^60]:    $\uparrow$ Referred to in the monthly statement as "Other securities.'

[^61]:    $\ddagger$ See tables of exchange and circular velocity presented by the writer in Can. fournal of Economics and Political Science, May, 1947, pp. 182-192. The Bank of Canada has since put out an estimate of money supply which excludes from the definition of money the minimum quarterly balances in savings deposits. See Canadian Statistical Review (Ottawa, D.B.S.), table 56 entitled Money Supply. Revised figures for the national (income) accounts back to 1926 have also been published, as noted in the table of circular velocity above.

