

1-52
137-25

The

CEYLON ECONOMIST

4

Vol. I.

A Quarterly Journal of Economics.

VOL. I. NO. 4.

JUNE 1951.

NOTES AND COMMENTS	-	-
FIRST YEAR OF THE CENTRAL BANK	-	-
INFLATION IN CEYLON	-	N. K. Sarkar
MOTOR TRAFFIC ACT 1951	-	W. Rasaputram
ECONOMICS OF FOOD SUBSIDIES	-	P. Sangarapillai
THE GAL OYA PROJECT	-	J. B. Kelegama
EXCHANGE CONTROL IN CEYLON	-	Dr. S. A. Wickremasinghe
TRADE AND BUSINESS STATISTICS	-	J. A. Leambruggen

Economic Research Association, Colombo.

Price: one Rupee and fifty cents.

Annual subscription: Rupees six, post free.

The Ceylon Economist

A Quarterly Journal of Economics.

Vol. I.

No. 4.

Editor and Business Manager:

G. H. Wadinambiaratchi, B.A., Econ., (Cey.)

Editorial Committee:

J. B. Kelegama, B.A., Econ., (Cey.)

S. S. Rajaratnam, B.A., Econ., (Cey.)

G. H. Wadinambiaratchi, B.A., Econ., (Cey.) (Editor).

Advisory Board.

B. B. Das Gupta, M. A., Ph. D. (Cal.) B.Sc. Econ. (Lond.) Director of Economic Research, Central Bank of Ceylon.

G. V. S. de Silva, B. A., Econ. (Cey.) Asst. Lecturer, University of Ceylon.

H. A. de S. Gunasekara, B. A., (Cey.) M. Sc., (Econ.) (Lond.) Lecturer, University of Ceylon.

F. R. Jayasuriya, B. A., (Lond.) B. Sc. Econ. (Lond.) Lecturer, University of Ceylon.

P. Kandiah, B. A., (Lond.) M. A. (Cantab.) Asst. Librarian, University of Ceylon.

K. P. Mukerji, M.A., B.L. (Cal.) D. Phil. (Heidelberg) Lecturer, University of Ceylon.

N. K. Sarkar, M. A., (Cal.) Lecturer, University of Ceylon.

I. vanden Driesen, B.A., Econ. (Cey.) Asst. Lecturer, University of Ceylon.

NOTE:— The views expressed in the Articles are not necessarily those held by the members of the Editorial Committee or the Advisory Board.

Communications:—

Articles for publication and books for review should be sent to the Editor, The Ceylon Economist, 42, Dutugemunu Street, Dehiwela. Communications dealing with subscriptions and advertising space should be addressed to:—The Business Manager, Ceylon Economist, 42, Dutugemunu Street, Dehiwela.

The Ceylon Economist

A Quarterly Journal of Economics.

Vol. I.

JUNE 1951.

No 4.

CONTENTS

	Page
NOTES & COMMENTS	307
THE FIRST YEAR OF THE CENTRAL BANK—N. K. Sarkar	315
INFLATION IN CEYLON—W. Rasaputram	322
MOTOR TRAFFIC ACT 1951 AND CO-ORDINATION OF TRANSPORT —P. Sangarapillai	331
ECONOMICS OF FOOD SUBSIDIES—J. B. Kelegama	350
THE GAL OYA PROJECT AND THE CRISIS OF AGRICULTURE —Dr. S. A. Wickremasinghe	358
EXCHANGE CONTROL IN CEYLON—J. A. Leembruggen	375
TRADE AND BUSINESS STATISTICS	387

Our Contributors

Sarkar, N. K. Is a lecturer in Economics in the University of Ceylon. Rasaputram, W. Is in the Department of Economic Research of the Central Bank of Ceylon. Sangarapillai, P. Is Asst. Commissioner of Motor Transport. Kelegama, J. B. Is a graduate in Economics of the University of Ceylon. Wickremasinghe, Dr. S. A., L.M.S. (Cey.), M.B.B.S. (Lond.) Is the President of the Ceylon Communist Party. Leembruggen, J. A. Is the Deputy Controller of Exchange, Central Bank of Ceylon.

Notes and Comments

Inflation and the Commodity Problem

Inflation of prices is essentially the result of an excess of demand over supply for any commodity. Broadly this could be attributed to two reasons—the commodities getting scarcer and the money supply increasing. We shall confine ourselves to a discussion of inflation due mainly to the former and in some cases due to their combined effects.

Today the world economies are expanding. Expansion is limited by manpower, capacity and materials. All the world over it is the same story. There are resources of manpower, few margins of capacity, and fewer sources of materials. In fact, it is the materials that will form the most impenetrable barrier to expansion the world over. And this when viewed against the background of the rising prices tells us a sad story.

That there has been a stupendous increase in prices no one could deny. Two of the price indices supposed to be the most sensitive in the world bring ample proof. Mody's commodity price index reveals that the percentage increase in U.S. prices in 1950 were higher than during the war. We have to compare a rise of 46.8% in 1950 as against 31.2% in 1940-41 and 40.8% in 1946. Reuters index gives the percentage increase in U.K. prices, and remarkable in the data is that the 46.1% increase from July 1949 to December 1950 is the highest ever for any comparable period. Taken together these two indices bear out that the present rise in commodity prices is greater than in any previous equal period. The gradient in the rise is steeper than in the 1915-17 period, and bears a close resemblance to the fabulous post World War I era of 1919-1920. And unless, like in the corresponding 20's the price rise flattens out or more important reacts, the period thereafter will be most painful and distressing.

Prices have so risen mainly due to the scarcity of the commodities. The causes of scarcity are threefold. Firstly natural, secondly war, and thirdly potential war. Into the first category falls wool. The scarcity of wool was pre Korean and due to a natural excess of demand over supply, which in 1949-50 was 2650 million pounds and 2257 million pounds respectively. This was, of course, emphasised by stockpiling which made the commodity scarcer and drove up prices still higher. In April 1951 the price of wool was twice that of the pre Korean period, nine times that of post World War II, and fifteen times that of pre World War II. Also in the same class are the hard fibres hemp and jute.

Commodities that became scarcer and thereby reflected higher prices as an immediate consequence to the Korean episode were the non ferrous metals, sulphur and cotton. During the period July 1950 to March 1951, aluminium registered an increase of 10%, cotton 30%, lead 50% and quicksilver 300%.

A potential threat of war has driven up the prices of commodities in areas of geographical proximity to and vulnerability from the affected areas. Consider the effect on Malayan and Indonesian rubber and tin. We in this country are well aware of the rocket progress of rubber. These two items registered the highest increases amongst the top grade raw materials of the world.

Wheat is providentially under control and agreement, and has actually registered a fall in price. But in the case of the other grains they have risen over a range of 20% in barley to 40% in rye. Meat and dairy products are up by 5% on the prices of a year ago.

The consequences of rearmament have been to drive up the prices still higher. Here, there is a double effect cutting in both ways. On the one hand, commodities for civilian consumption are made scarce and on the other the incomes accruing from the armament expenditures are increasing the demand for these. The new wage earners are driven to an artificial low consumption level. Diversion to military purposes and building up of reserve stocks can be achieved only by the most severe economies. As Prof. E. A. G. Robinson puts it: "We cannot have rearmament without tears." Only miraculous and spectacular increases in production can see a way out of this. International feelings run high, and as Wilson, the former President of the U.K. Board of Trade had said the American rearmament programme has starved the U.K. of raw materials she needs not to rearm herself but to live. Prices are highly susceptible to rearmament programmes. When, for instance, tin was taken off the U.S. list the price fell from £1557½ on 13th February to £1305 on the 30th March.

A similar situation due to a combination of excess money and scarce commodities has arisen in this country. In rupees million our exports were 1011, 1063 and 1563 in 1948, 49 and 50. The corresponding import figures were 994, 1029 and 1167. This means that an additional purchasing power of 17, 34, and 396 millions of rupees were left to chase around the limited commodities available made even scarcer by the rigours of import control. There naturally was an inflationary upsurge of prices.

How far could these effects be ironed out? An effective control of private credit should be maintained to compensate for the expanding government expenditure. The world has failed to look at it from this angle. And according to Oscar Hobson: "The reason lies mainly in the falsity or at least onesidedness of the economic doctrine which has been so assiduously propagated, in season and out, since first Keynes launched it in the early thirties, the doctrine that full employment is the categorical imperative and a high rate of interest the fountain of all economic evil." Somehow the U.S., the only country in the world which could have stopped the frightening upsurge of commodity prices, has signally failed to exercise that power. The cheap money policy designed to keep the national debt to a minimum has raged havoc with commodity prices.

The only path which could be plotted avoiding further catastrophe lies along specific commodity controls, and broader monetary controls. We mean the adequate allocation of scarce commodities to the industries proportional to their utility to the world at large, and direct controls in the nature of rationing, price fixing, etc. Also called for are the effective monetary and fiscal policies. But most important of all is that the irrational and overbearing monster of rearmament should not be permitted to distort this pattern for peaceful civilian everyday life.

These deliberations must be at the international level for it is only there that any good could be achieved. And the greater co-operation will be available only if the now-present ghost of potential war does not haunt the minds of those who plan the future of commodities and inflation for peace.

The Politics and Economics of Persian Oil

The debate over the nationalisation of the Persian oil wells is of vital interest to the East, and particularly to those countries where foreign powers hold large controlling authority over a great part of the national wealth. In Persia, besides its strategic importance as a safeguard to Britain's access to the Eastern Empire, oil is the only source of wealth. British or British-Dutch Companies control 100% of these resources. This was the result, as in most of the Asian and Far Asian countries, of the vicious combination of weak, licentious and munificent Pashas and ambitiously calculating agents of foreign powers. From the Mediterranean to the Dutch Indies the struggle for oil comes to be the dominating factor. America which had built up a world

wide supply net-work for the export of her oil, now finds it necessary "to penetrate or reach deeper into the oilfields of foreign countries." Besides the oilfields of the U.S.S.R., Mexico and Argentine, other sources of oil were exploited by foreign powers. This phenomenon has led to the triangular contest for the control of oil sources. The growing realisation among the nationals of these exploited countries and the myth of oil famine in America has made this contest more acute. Apart from this the launching of the Marshall scheme for European recovery brought about a growing demand for oil in Europe from America. Increasing exploitation of the Middle East oil would serve as a method of stockpiling for America. ".....It is vital to the interests of the United States, as well as to those of the Atlantic Pact Nations, that free Europe continue to have access at all times to the Middle East oil." To the countries of Europe, on the other hand, who were consuming 800,000 barrels of American oil daily, peering into other sources became ineluctable as a move to minimise the dollar crisis. (Oil was the largest single item of the dollar budget of European countries). This naturally led to the tightening of the grip upon the Middle East.

The attitude of the British in Persia can be attributed to the crisis which continues in Europe, and the means adopted by the U.S. of saving her oil by spending the others'. The ordering of battleships to the Persian Gulf and the despatch of paratroops to Abadan is reminiscent of the crude gun boat politics of the 19th and early 20th centuries. If it was the safety of British nationals which provoked such action, than it was bad diplomacy. For the right thing would have been the withdrawal of British personnel and the imperialist privileges from the Iranian property. Oil to Persia is of the same value or even of more value than wool is to Australia or rubber to Malaya. In these countries the dependence upon such monoculture has, while enabling easy imperialist exploitation, led to the very low standard of living. When, as in these instances the only source or the main source of economic wealth is in the control of a foreign power, there can be no opportunity of successful economic advancement. Nationalisation is thus the only way open.

In Persia, the Anglo-Iranian Oil Co., is the largest oil producer in the world. They produce 10% of the world's total; delivering 700,000 thousand barrels of oil a day. 75% of the oil used by Western Europe finds its source in Iran. All estimates of the future reserves of oil are in the nature of guess work, but it is possible to state roughly that the Middle East has over 40% of the world's reserves. In spite of this immense wealth, Persia is a country pitted with slums and crumbling hovels. The standard of living of the people is extremely low. This has been

realised by the powers who speak of aid to Persia. The problem of aid would not have arisen if it had been possible for the Persians to benefit by the natural wealth which they possess, but which is, besides the paltry 4 sh. per ton, entirely exploited for the profit of a foreign country. Our readers are already acquainted with the mockery of this "aid" which we discussed in No. 2 of Vol. I. If exploitation in the dominions and colonies is subtle and not quite superficially discernible yet in Persia it assumes an overt form. It is true that nationalisation alone will not solve the problem of Persia's poverty; but it is the *sine qua non* of any effort to better the living conditions of the Persians. The extent of the exploitation could only be realised when we see that the Iranian Government received less from the Oil Company than Britain collected by way of taxes alone from the Company.

Now what of Uncle Sam? Like the well known Metternich he does not like changes. The U.S. is spoken of in Iran as the strongest force for peace. But for the Persian, there is not much difference between a Briton and an American. Both would bring the same kind of peace. The U.S. is prepared to recognise the right of the Iranian Government to nationalise its property but if they exercise this right the Americans would do what is "right" from their point of view, refuse technical assistance to run the refinery at Abadan. Grady was not equal to the task, and would be relieved from his Ambassadorship—presumably due to old age (he is 69). It was not a happy augury for Harriman, and also for the American policy of sending "peace missions" to troubled waters, (John Foster Dulles, e.g.), when on his arrival, armoured tanks had to clear unarmed demonstrators numbering over 15,000 in Majlis Square. Eleven people were killed. Iran has so far received £60,000,000 worth of military equipment and besides this no form of economic aid has been delivered. A further 415,000,000 dollars has been reserved for Greece, Turkey and Iran. This too is for "a defensive shield against aggression." So far, there has been no signs of aggression by anyone. The armaments thus supplied has only helped in suppressing manifestations of protests against the continuation of the work of early aggression who controlled practically the whole of Iran by way of exploitative rights over 500,000 square miles.

It would be very difficult for Britain to get Persia to agree to demands at the point of a gun. Persia does not stand alone in the Middle East, and the Middle East does not stand alone in the world. The problem that beset Persia is the problem that beset most other countries. Britain's interests in the Suez Canal too are today been subjected to great strain. In the light of these difficulties, no hasty and ill considered decision could be made by Britain by way of using arms.

The Budget—A Cursory Glance

As this goes into print the House of Representatives is engaged in debating the Budget 1951-52 and it would not be possible to give a detailed analysis until fuller information is available. From what material there is, it is impossible to restrain ourselves from making certain and very important observations, which have already received the attention of the more interested members in the House. A detailed analysis of the Budget would be made by way of an article in the First Number of Volume Two of this Journal.

That there is no fundamental divergence from the Budgets of the previous years, has been admitted by the Minister of Finance himself, who stated: "The Budget follows the pattern I have sought to adopt in previous years." While the country is riding dangerously upon the crest of an inflationary wave, the Government has proudly congratulated itself for the continuation of the policy of deficit budgeting, accumulating a National Debt of nearly a thousand million rupees, while following closely behind Britain in devaluing the Rupee and sending this country higher into dizzier altitudes before the gadarine descent into an abysmal slump. It is impossible to understand why in these circumstances the Government has made no effort at all to curtail haphazard private expenditure to offset growing Governmental expenses.

"Planning", "Full Employment", "Raising of the Standard of Living" and such other economic terms would certainly lose their significance and turn into clichés to exist merely for propaganda value, if the Government persists in using these terms to describe these budgets.

The primary concern of any budgetary policy, which intends promoting what is commonly known as the Welfare State, should be the consideration of the basic requirements of any average man. The Government has as the Minister of Finance proclaimed 2,353 houses to its credit! And this while needs of Colombo alone are over 10,000. As a solution to this shortage it is proposed that the Rent Restriction Act would be amended to exempt houses built after January 1st 1951, from rent control. If one examines the ways and means adopted by the landlords to evade this act, one would be led to the conclusion that the act itself was the best incentive to the building of more and more houses!

As regards taxation we have been able to witness the spectacle of the stable being closed when the horses were well away. The imposition of an export duty, which even when it came, came too late, was in no way a solution to check the windfall profits of the boom boosted plantation industries. The marginal producer was

the loser in this case, and perhaps the middle classes of the rural and rurbine areas who supplemented their incomes by their small-holdings, stood to lose. A possible method of averting this danger would have been to adopt a profits tax—instead they clutch at the sliding scale. This no doubt is an improvement on the export duties now prevalent but does not remove the danger which the small holder faces. Both the imposition of the export duties and the lowering of the import duties on certain unimportant articles were intended to lower the cost of living index. Import duties have been lowered on articles which it is difficult to imagine would in any way enter into the cost of living index. The Government should have concentrated upon consumer goods. While it is true that certain important articles of food are subsidised, it is preposterous to compare the subsidy schemes of food producing countries such as Australia and New Zealand with that of Ceylon. Besides this, however, the Government intends abandoning to a considerable extent, its policy of import and exchange control. This would, no doubt, enable dollar goods to pour through into this country, and this at post-devaluation exchange rates. If the Government seriously considered the question of these restrictions being abandoned together with the revaluation of the Rupee, particularly at a time when the goods Ceylon produces fall into the Western European and American rearmament budgets as indispensable; then perhaps a degree of sanity and reason may have been attributed to the Cabinet brain boxes. It is, however, never too late. Revaluation though not a magic wand which would cure all ills, is an important measure, which could be expected to bring down the cost of living and at the same time improve our adverse terms of trade. The relief granted by way of lower import duties for raw materials and milk foods, bicycles and machines, scientific and surgical instruments and apparatus are certainly beneficial; but the lowering of duty on motor cars irrespective of horse power is another of those irrational proposals of the Government.

The Government's decision to increase by 300% expenditure on defence is another measure that would certainly contribute towards the inflationary trend. There could not be imagined a greater and more harmful method of expenditure than expenditure on arms and rearmament.

The export price index has no doubt been rising considerably. But this index alone does not explain anything. What must and should have been taken into consideration is the relation of this to the import price index. Our terms of trade have ever since 1939 been deteriorating, and with devaluation it became worse. There was an improvement in 1950 but this is nothing more than an ephemeral phenomena which once the boom is over would certainly turn round.

The increasing national income and the improvement in the export prices indicated nothing except that due to the dangerous explosive boom conditions we have been able to earn more. If one is to take into consideration the inflated import price index and the rise in the cost of living index and thereby devise a method by which the real national income could be determined in terms of what it means to all classes of society then it may be possible to witness the extent to which the real rise has occurred.

The impact of all these cumulative economic changes brought by economic as well as political commitments upon the incomes of the various classes in Ceylon would reveal alarming signs of an inequitable distribution of wealth which has been aggravated by the method of taxation adopted by the government. Higher taxes on income will be offset by the relief granted to investments in government sponsored institutions, as only the higher income groups can invest in them. And the tax-free interest accrued there on will be tackled on to the prices of the products of these industries procured by all. Also, import duties unlike income tax affects all purchasers and not marginal purchases. Inflation and devaluation have been the two fairy godfathers of the wealthy classes. While both these have reduced considerably the real incomes of the lower earning groups it has inflated the real earnings of the other upper classes. There has been an 11% decline in the real incomes of the employees. According to statistics of the Finance Minister himself, nett relief is greater for bigger income groups than for smaller income groups. As an Hon. Member pointed out those with an income between Rs. 625 and Rs. 1060 a month get a nett relief of Rs. 90 or Rs. 7.50 a month while those with an income of Rs. 1250 to Rs. 2500 a month get a relief of Rs. 190 or Rs. 16 per month.

An Apology and an Explanation

We tender our sincere apologies to our readers for the delay of this issue due to many unavoidable circumstances.

Also, due to the very high costs of printing and printing materials we have been reluctantly compelled to increase the price of our Journal to Rs. 1.50.

And, commencing this issue, our quarterly publications will be in March, June, September, and December, each year. Volume Two, Number One, is due in September.

The First Year of the Central Bank

N. K. SARKAR

The Central Bank's *Annual Report for the Year 1950* is an impressive document. The analysis of the economic situation in the country presented in the Report is penetrating. The marshalling and collection of statistics and their presentation is admirable and gripping. The sifting of the relevant facts from the mass of irrelevant facts is done with the dextrous hand of a skilled craftsman. The reviewer can only draw attention to the relevant features of the report, throwing in a few comments here and there.

Inflationary Pressure

The rise in the inflationary pressure has been measured in the Report, by the rise in money supply. Money supply has increased from 589.6 million rupees in January, 1949 to 881.1 million in December, 1950—a rise of 49.4 per cent. Inflationary pressure, however, is inadequately measured by money supply alone. A better measure would have been income velocity. In the absence of data to estimate income velocity, some consideration should have been given to the velocity of circulation. Statement 5, (p 44) shows that the turnover of deposits had been increasing. The ratio of average monthly bank clearing to demand deposits had been gradually rising. Between 1948 and 1950, the rise was by 7.2 per cent. It is likely that the velocity of circulation of currency was greater than the rate of turnover of bank deposits. A minimum estimate of effective money supply could have been obtained, however, on the basis of the rate of turnover of bank deposits. In any case, it is evident that the effective money supply has been much greater than what the Report shows.

The Report traces three sources of this increased money supply by (a) monetization of external balances. The external assets increased as a result of the export boom; and when these assets were brought to Ceylon and converted into Ceylon currency, the money supply of Ceylon increased. This source was responsible for 53.8 per cent of the rise in money supply. (b) Credit created by the Commercial Banks and Central Bank. 43.7 per cent. of the increased money supply was attributed to this source. (c) Government short-term deficit contributed 1.8 per cent of the increased money supply.

The rise in foreign balances and the expansion in Commercial Banks' credit were the result of the export boom. The circumstances which led to the export boom were: (a) devaluation; (b) stockpiling in U.S.A.; and (c) rearmament. Export prices rose

by 343.4 per cent in 1950 to its 1938 level. But volume of export rose by 37.9 per cent only. The share price of rubber rose by 110 per cent in a year; tea-cum-rubber rose by 63 per cent and tea by 23 per cent.

The question naturally arises what steps did the bank take to reduce the money supply and relieve the inflationary pressure? To prevent monetization of foreign balances obtained as a result of the export boom, the Central Bank merely *requested* the Commercial Banks not to bring in their foreign assets to Ceylon. "The Bank informed the Commercial Banks that it did not wish to encourage them at this time to bring their balances to Ceylon from overseas." (Page 4, para 17). The Central Bank felt satisfaction to report that "The Commercial Banks actually increased their net overseas assets during the year by Rs. 75.3 million." Could one consider this amount of accumulation of foreign assets by Commercial Banks to be sufficient to counter-balance the export boom? It is not easy to answer this question. One can, however, obtain some idea of the rate at which the foreign assets were accumulating by studying the balance of payments statement given in page 51. It shows that during the course of the year to the total goods and services account a net debit of 16.8 million rupees was converted into a net credit of 219.6 million. This gives an idea of the rate at which Ceylon was earning foreign balances. A rise in the Commercial Banks' foreign assets of 75.3 million was a poor check indeed on the monetization of the foreign assets of Ceylon. Further there is no reason to believe that this increase in foreign assets was in deference to the Central Bank's request. They might have been retained to finance increasing volume of imports whose Ceylon prices were expected to rise in future, due to inflation.

To reduce the volume of credit created by the Commercial Banks, the Central Bank took two steps: Firstly, it "specifically requested the Commercial Banks not to extend any non-essential and particularly speculative, credit in the future." (Page 4, para 18). Secondly, it raised the statutory reserve of the Commercial Banks on demand deposits from 10 per cent to 14 per cent on January 5, 1951. What effect did these two measures have on the credit creation of the Banks?

The Bank was satisfied that "the bulk of this credit has been essential in order to finance the growing volume of Ceylon's trade in recent months, particularly its exports." (Page 4, para 14). Again, "there was every indication that bankers were co-operating with the Central Bank's policy of restricting credit for non-essential purposes." (Page 14, para 19.)

The Central Bank Report does not give any statistics to show how far the Commercial Banks had checked the temptation of lending for *non-essential purposes*. Did the Bank clearly define what form of lending would be regarded as non-essential? Was there any selective discrimination imposed or even suggested to the banks? In the absence of any statistics it is difficult either to maintain or refute the assertion that the credit creation of the Commercial Banks was limited to essential uses only. A study of the change in the cash and short-time assets relative to deposits, however, make us suspect that the inflation has been considerably fed by the banks. The demand deposits increased by 28.81 per cent in December 1950 compared to December 1949; while cash and short-term assets decreased by 35.54 per cent. The actual reserves of the banks, however, showed an increase of about 27 per cent. The decline in short time assets are partly due to decline in 'cash on hand' plus balance with Central Bank, and, mostly due to a decline in the balances with other banks. Investment on treasury bills, another item in the short-term asset—shows an increase; yet this increase was not sufficient to compensate the decline in the total short-term assets. If the short-time assets showed a decline and the total assets and deposits showed a rise, where did the banks shift their assets to? Almost all other forms of their assets—investments, bills, overdrafts, loans and 'foreign currency in hand, balances with banks abroad and money on time deposit and short-notice'—show a rise. One conclusion clearly stands out, namely, the banking system was expanding credit by making their assets less liquid and thus making their own contribution to the inflationary fire.

The Central Bank, however, justifies the credit creation by the banks on the ground that they are least harmful and necessary to finance the expanding foreign trade. To quote the Report, "As the value of exports rises due to a rise in their prices and an increase in their volume, it must be expected that there will be an expansion of credit to finance them. This type of credit expansion is one of the least harmful to an economy, because it is short-term credit to enable the commercial movement of goods. If the value of exports contracts, credit will also contract. Thus the new money will disappear, if and when the time comes, just as naturally as it first appeared." (Page 4, para 18.)

One of the functions of the Central Bank is to secure internal stability of the economy of Ceylon. In a country where the entire economy is highly gyrated to foreign trade, it is difficult to understand how the internal stability can be achieved or even attempted, with a free creation or contraction of credit following the fortunes of the trade, and where such credit creation or contraction is regarded as "*essential*". Internal stability will be impossible to

attain, unless some ways are found to isolate the internal currency and credit structure from the effects of external booms and depressions. The exchange control mechanism may be called into operation to fully or partially block the internal payment of export bills and to force accumulation of foreign assets which can be utilized to absorb the shock of external booms or depressions.

One cannot help feeling that the Central Bank has underestimated the internal effects of the expansion of the credit instruments needed to finance foreign trade. The Central Bank considers the greater increase in the export and import bills and overdrafts relative to a smaller rise in loans as a healthy sign. The Central Bank has interpreted this to mean an increase of credit for essential purposes viz, to finance foreign trade and not speculation.

In studying the effect of the credit expansion on the economy of the country, it is necessary to remember that in Ceylon the foreign trade is the pivot of the economy and if there is any credit expansion it can occur primarily through credit expansion for financing foreign trade. Secondly, the effect of the credit expansion in the field of foreign trade does not remain limited to this field alone but quickly spreads into other fields.

It is very necessary, therefore to remember that internal stability in Ceylon can be attained only by isolating the economy as much as possible from the external booms and depressions.

The second step that the Central Bank adopted was to raise the statutory reserve ratio on demand deposits to 14 per cent. This step was taken as late as January 5th, 1951, when matters had gone far too ahead for such action to be effective. The statement on the reserve position of commercial banks (page 43) clearly shows that in spite of the increase in the reserve ratio the commercial banks possess far too excessive reserves to be able to carry on their credit creation without let or hindrance.

One cannot but feel that the Central Bank has failed to put any effective check on the inflationary trend that has been generated in the country following devaluation and the export boom. That the Central Bank would fail to prevent the export boom to recoil on the internal economy of the country naturally follows from the attitude that it has taken towards the relationship of credit creation to foreign trade. With this outlook the head of our monetary system could not but play the roll of a passive onlooker to the banking system of Ceylon.

Cost of Living

It is a pity that the Central Bank had to base its enquiry into the question of the rise in the cost of living on the Colombo

Working Class Index. I have shown elsewhere¹ how unreal, hypothetical and irrational this index is. No wonder the Central Bank arrives at the queer conclusion that though the import prices have a weight of 47 per cent, the domestic group a weight of 46 per cent—and they have recorded a small rise in one case and an actual fall in the other—yet the export prices with a weight of 7 per cent caused a rise in the index from 263 in January 1949, to 273 in December 1950. To record a rise in the cost of living index by 1 per cent it is necessary for the export-group to rise in price from 100 to 114, the other two groups remaining constant,² a performance which should be regarded as extremely difficult, if not impossible.

1. Ceylon University Review, October 1949 and January 1950.

2. We assume that the price of the import and domestic groups remain constant and the export group alone rises. To produce a rise from 100 to 101 in the cost of living index, how much rise in export prices would be necessary?

Let X_0 , Y_0 , Z_0 be the prices in period '0' of the three groups import prices, domestic prices and the export group respectively. The prices in the period '1' are X_0 , Y_0 , Z_1 , since X_0 and Y_0 remain constant. Let W_1 , W_2 , and W_3 be their weights respectively.

Then the index for the period '0' is:

$$\frac{W_1 \frac{X_0}{X_0} + W_2 \frac{Y_0}{Y_0} + W_3 \frac{Z_0}{Z_0}}{W_1 + W_2 + W_3} \times 100 = 100 \quad (1)$$

The index for the period '1' is:

$$\frac{W_1 \frac{X_0}{X_0} + W_2 \frac{Y_0}{Y_0} + W_3 \frac{Z_1}{Z_0}}{W_1 + W_2 + W_3} \times 100 = 101 \quad (2)$$

Cross multiplying and subtracting (1) from (2) we get:

$$100 W_3 \frac{Z_1 - Z_0}{Z_0} = (W_1 + W_2 + W_3) \\ \text{or} \quad \frac{Z_1 - Z_0}{Z_0} = \frac{W_1 + W_2 + W_3}{100 W_3}$$

Now W_1 , W_2 and W_3 are given to be 47, 46 and 7 respectively, hence

$$\frac{Z_1 - Z_0}{Z_0} = \frac{1 \cdot 00}{7} = 1 \cdot 429 \\ \text{or} \quad Z_1 = 1 \cdot 429 Z_0$$

Thus to raise the cost of living index by one per cent, the price of the export-group would have to be raised by 14.29 per cent. Hence to raise the cost of living index from 263 to 273 a rise of 3.8 per cent, the export prices would have to be raised by 54.30 per cent. It is queer also that while money supply had shown an increase of 49.4 per cent during this period, the cost of living index showed a rise of 8 per cent only during the period January 1949, to September 1950. Our cost of living index has indeed, the constancy of the gods.

The Report adduces cogent reasons for preferring a flexible wage policy to subsidy to keep the cost of living down. Practical difficulty in subsidising consumption, the theoretical objections to it and the social injustice that it involves are well known. The Report should have given some consideration, however, to the inflationary pressure that is generated by wage increase following an increase in the cost of living. If the government can check the wage-induced inflation generated by wage-increase by adopting suitable measures, such a policy is to be preferred to the policy of subsidy.

Fiscal Policy and Monetary Policy

The Report admirably analyses the revenue and expenditure of the government and clearly demonstrates the cross-purposes at which the Central Bank and the fiscal policy of the state were working. The fiscal policy of the government had been nullifying, instead of strengthening, whatever feeble effort the Central Bank was making to control the inflation. While the country was faced with the inflation generated by the export boom and a favourable balance of payments, the government has been busy adding fuel to the inflationary fire by incurring a deficit.

The fact, however, is that the government never had and still do not have any long term fiscal policy. All that the government have are a number of jealous ministries, which compete with each other in exhibitionistic spending, and the co-ordinating body—the cabinet—does not possess an outlook which can rise above petty bureaucratic departmental narrowness and think in terms of the country and the people as a whole. It is extremely difficult in the absence of such an outlook to evolve a rational policy which synthesises stability with growth.

The general principle that should govern the fiscal policy of the state is to make the governmental deficit compensatory to business conditions. That is to say, the state should build up a surplus reserve during booms and incur deficits during depression. Such a policy is aimed at securing internal stability. In Ceylon, in addition to this general principle, the state has to fit in a programme of more or less rapid development of national economy.

These two policies may often be contradictory. Development and expansion, if too rapid and not counter-balanced by appropriate measures may add to the inflationary pressure and may threaten stability of the internal price and cost structure. The means to develop and expand are more readily available during a boom and the temptation, strengthened by political pressure, is great to sacrifice stability to expansion.

Building up a surplus reserve without sacrificing national development during the boom could have been done easily by heavier taxation of the windfall incomes. An export duty equaling to the windfall profits of the marginal plantations, coupled with an excess profits duty on the superior plantations would have yielded enough revenue to build up a reserve which could have been utilised for national development. Such a fiscal policy would have had the additional advantage of removing the sting from the boom so that the problem of inflation would not have assumed such a dangerous proportion. The Central Bank, therefore, rightly regards the Government deficit as "most disturbing."

Production

Two facts stand out to belie the appearance of prosperity generated by the export boom. In the words of the Report, "It is most disconcerting to find that even on the crest of the present boom there is still some unemployment and a very considerable amount of under-employment." The second factor of equal import, missed by the Report, is the fact that while the price of exports increased by 343.43 per cent during 1938-1950, the volume of export increased by 37.9 per cent only. It is true, perhaps, that a greater proportion of the factors of production are used now to produce goods for domestic consumption and that a greater proportion of the export commodities are consumed internally, yet an expansion of the volume of export by 37.9 per cent in spite of a rise in price of 343.43 per cent cannot but emphasise the fact that our productive apparatus has reached its limit both in production capacity and in absorbing labour. We have, therefore, to wait anxiously for a rapid transformation of our economy which could, perhaps, be brought about only by such people whose economic fortunes are not tied up with the maintenance of the present economy of the country.

Inflation in Ceylon

W. RASAPUTRAM

There is no doubt that inflation is prevalent in our economy. The Colombo Working Class Cost of Living Index has risen 272% over the prewar level. Such a sharp and tremendous rise in living costs is attributable to no other cause than inflation. Inflation exists when there is an excess demand for goods and services which is not met by an increase in the supply of goods and services. In other words the creation of money income is much greater than the total supply of goods and services.

The extent of the inflationary pressure can be gauged by the rise in the nominal national income of Ceylon since 1938:

Year	Amount Rs. millions	Index of National Income	Cost of Living Index
1938	556	100	100
1943	1,455	261	196
1947	1,736	312	252
1948	2,272	409	260
1949	2,569	462	258
1950	3,200	576	272

The national income shows a rise of 576% over of the prewar level. During the war a major factor that caused national income to rise was "occupation costs." The U.K. Government spent a large some of money on defence to protect her Far Eastern interests. In 1947 foreign military expenditure dwindled to low levels and one of the major causes of wartime inflation was removed.

There soon followed a slight deflationary period and it continued till 1949. The recession in business activity in America was responsible for this trend. It was reflected in the downward trend in our export prices. The prices of rubber after fluctuating at the beginning of the period began to fall to very low levels and not even the most optimistic observers of the rubber crisis were able to predict any early revival of the industry. Devaluation together with the outbreak of the hostilities in Korea and the international tension caused by the rearmament programmes led to a spectacular change. The whole position was not only reversed, but the prices soared up to unprecedented heights. The year 1950 saw inflation spiralling upwards.

During an inflation prices go on spiralling upwards if no measures are taken to check their growth. When prices rise profits and wages tend to rise along with prices. The costs will

be affected by the rise in wages and prices will rise further—the vicious spiral of inflation will be set in motion and when uncontrolled, will daily gather momentum and could reach dangerous levels. To check its growth the Government should mitigate its evil effects by various methods open to them, and try to remove the basic causes altogether.

Prices rise when, for whatever, reason there is a net addition to the flow of money demand not offset either by an increase in savings or by an increase in output. The addition to money demand can come about in three ways:

- An excess of Government expenditure over Government revenue *i.e.* a Budget deficit;
- A surplus in the balance of payments which creates an increase in incomes without a corresponding increase in output, and
- An increase in investment outlay.

Assuming that total output is inexpandable in the short run, the extent of the inflationary pressure would be equal to the sum of these three items less savings.

It is proposed to show in this article that the inflationary pressure in the economy is due mainly to increased Government expenditure and the surplus in the international balance of payments.

Cash Operating Deficits

The net cash operating deficit (which includes revenues surplus or deficit + loan expenditure = Budget deficit + reserve fund + food subsidy + etc.) shows an appreciable increase in 1949/50 over 1945/46.

Government Net Cash Operating Surplus or Deficit (Rs. million)

1945/46	1946/47	1947/48	1948/49	1949/50	1950/51
+6.3	—164.9	—59.9	—113.1	—154.3	—106 ¹

The Budget deficit (*i.e.* surplus revenue or expenditure + loan expenditure) is much less than the cash operating deficit except in 1947/48. The deficit was financed by an inflationary method. The Government drew down its cash balances and the Commercial Banks created money in favour of the Government,² more than half of the deficit was thus financed. It is evident that such a method would add to the money supply and intensify the inflation. Little or nothing has been done to reduce the large deficits.

1. Estimate. Source—Annual Report 1950, Central Bank of Ceylon.
2. Annual Report of Central Bank for 1950.

Balance of Payments

A factor that goes hand in hand with budget deficits is the balance of payments. An active or favourable balance of payments is inflationary. An export surplus will bring in more and more money into the country and when it is added to the existing income flow, inflationary forces are more and more intensified. The chief objection against a favourable balance is that it increases the money incomes of a certain class of people, namely the exporters, without increasing the available goods for consumption simultaneously. As international capital movements are of little or no inflationary significance, we may examine the balance of payments situation on current account.

Balance of Payments on Current Account

	1938	1940	1941	1943	1945	1946	1947	1948	1949	1950
Balance	-27	-28	+56	+267	+314	+52	-196	+24	-28	+147

Except for the adverse balances experienced in 1947 and 1949 the balance of payments continued to be favourable from 1940 onwards. The deficit in the balance of payments in 1947 was a direct outcome of the trade recession in U.S.A. The mounting surpluses in the balance of payments was another cause of inflation.

Investments and Savings

No exact estimate of investments is available. Only the Government expenditure on various projects can be known.

In an underdeveloped country like Ceylon, investments are financed either by drawing out of private savings or by obtaining some form of credit other than bank loans. During the war, investments must have been at a very low ebb. The Six Year Plan of the Government and the Colombo Plan will involve Rs. 1359 millions. The question arises whether Government expenses can be cut down to give some sort of relief to the inflationary pressure. However, the Government expenditure on national economic development cannot be cut down if we are to improve the standard of living of the people.

Moreover, in the long run, such investments by increasing the production and productivity, would combat the evil effect of inflation.

The actual savings figures are also not known. The only data available on savings are those with regard to post office and National Savings Certificates and Ceylon Savings Bank deposits.

In the absence of total savings and investment figures, I have taken only the cash operating deficits and balance of payments in arriving at the gross and net inflationary pressure.

Year	Gross inflationary pressure	Net (as "% of " National Income)
1945/46	+307.7	—
1946/47	+248.9	—
1947/48	-102.1	-6
1948/49	+137.1	+4
1949/50	+126.3	+3
1950/51	+253.0	+6

The net inflationary pressure is calculated by subtracting the base year (1938) ratio of gross inflationary pressure to national income from that of the given year or the year under consideration. That both net and gross inflationary pressure remain high is obvious from the above table.

Rise in Import Prices

It is sometimes argued that inflation in this country is caused by conditions beyond our control. We are almost fully dependant on imports for our entire supply of foodstuffs. The inflation from other countries from whom we import will push up the prices of our import articles.

Our chief import countries exhibit the following³ inflationary indications:

India

1937 = 100

Year	Cost of Living Index	Money Supply (Billions of Rupees)
1939	103	4.91
1941	118	6.46
1945	224	20.52
1948	288	20.57
1949	292	18.73
1950	302	19.84

Australia

(1937 = 100)

Year	Cost of Living Index	Money Supply (millions)	Govt.—Deficits or +surpluses (millions)	Export + Surplus or—Deficit (millions)
1939	105	203	- 4.1	+ 9.2
1941	115	287	-105.3	+ 11
1945	129	648	-257.7	- 58.3
1948	148	879	- 1.1	+ 69.2
1949	162	1052	+ 13.7	+133.1
1950	179	1302	- 33.4	+ 81.4

3. International Financial Statistics, I.M.F.

United States

(1937 = 100)

Year	Cost of Living Index	Money Supply	Budget-deficit + surplus (billions)	Export + Surplus or—deficit (millions)
1939	97	36.2	- 2.9	+ 789
1941	103	48.6	- 4.78	+ 1761
1945	128	102.3	- 45.02	+ 6443
1948	167	111.6	+ 8.87	+ 5471
1949	165	111.2	+ 1.0	+ 5378
1950	167	118.2	- 2.21	+ 1329

United Kingdom

Year	Cost of Living Index	Money Supply (billions)	Budget deficit or + surpluses (millions)
1939	104	1 79	- 773
1941	133	2.72	- 2680
1945	152	4.42	- 2059
1948	183	5.12	+ 350
1949	186	5.19	- 99
1950	189	5.28	- 355

The gravity of the situation becomes clear on a close examination of the above table. All the countries have resorted to deficit financing, and at the same time building up export surpluses. For instance, in 1950, U. S. A. had a budget deficit of \$ 2.21 billions and an export surplus amounting to \$ 1329 millions. Another factor tending to aggravate the inflationary situation is the increase in money supply whose effect on the economy is an indirect one. Any increase in the money supply should increase the money incomes of the people for it to be harmful. In every country money supply too has increased thus causing further inflation.

A further impetus to the rising import prices was given by the defence programmes of Western Nations which led to the diversion of resources for the production of war materials thereby creating a shortage in consumption goods.

The index number of import prices has risen 430% over 1939.

(1934-38 = 100)

1939	1946	1947	1948	1949	1950
101	358	413	443	423	434

However, the presence of serious inflation abroad is no indication that conditions are beyond our control.

Export Prices and Cost of Living

The mounting export surpluses as exhibited by our balance of payments situation, as we have already seen, cause only a rise in nominal money income which affects adversely the economy of the country.

Everyone knows that all our major export commodities are fetching high prices. Rubber representing a large proportion of our exports has risen by over 165%. Tea, another major export rose by more than 600% over the prewar level. The following table shows the rise in prices of some of our exports:—

Commodity	Unit	Price 1938 Rs. cts.	Price 1950 Rs. cts.	% Increase of 1950 prices over 1938
Tea	per lb.	.37	2 .52	600
Rubber	„	.70	1 .53	165
Copra	per candy	27 .74	304 .65	1000
Coconut oil	per ton	182 .22	1682 .20	823
Desiccated coconuts	per lb.	.06	.95	1483
Cardamoms	„	1 .20	10 .75	795
Cinnamon quills	„	.40	1 .15	188
Citronella	„	.73	5 .17	600

The prices of copra and desiccated coconuts have risen by over 1000% over the prewar level. It has the effect of pushing up the domestic prices of food and clothing. The increase in money incomes not matched by an equivalent increase in goods and services would create a bigger demand for the available supplies of goods and thereby intensify the inflationary pressure. The exporters are far better off than other income earners. This unjust and inequitable distribution of wealth is a social evil. The Government's attempt to reduce the cost of living by imposing export duties on tea, rubber, coconut, etc., was of little or no avail. The duties were either small or the prices were less sensitive to the duties.

The chart at the end shows the trend (obtained by the method of moving averages) of the items that have contributed to the inflationary pressure. Export prices show a rising trend, and it is therefore one of the potent causes of inflation and the rise in living costs. Note circulation, Government expenditure and Bank clearing all show an upward trend. Note circulation has maintained an upward trend throughout the period. Imports do not show any significant rise at all. The contribution of imports to the inflationary pressure being small, it is obvious that causes of inflation are mainly internal and are controllable.

A correlation coefficient shows the degree of association between two variables. The correlation coefficient between the export prices and the cost of living index is 40.42. This shows that as export prices rise, cost of living too rises. The following correlation coefficient give us added interest in finding out the causes for the high living costs:—

1 = Note circulation	4 = Savings
2 = Bank clearing	5 = Import price index
3 = Export price index	6 = Cost of living index
(1)	(2)
Simple Correlation Coefficient	Partial Correlation Coefficient
r	r
16 = + 0.22	12.6 = + 0.16
r	r
26 = + 0.17	56.2 = + 0.17
r	r
36 = + 0.42	56.1 = + 0.25
r	r
46 = + 0.13	16.2 = + 0.20
r	r
56 = + 0.23	56.12 = + 0.24
	r
	36.12 = + 0.14

Column 1 of the above table shows the degree of association that each item has with the Cost of Living. Column two shows the partial correlation coefficient. The partial correlation coefficient is necessary in order to consider simultaneously the relation between three or more variables whilst eliminating the effects of one or the other. A marked positive correlation is observed between export prices and cost of living and a positive correlation between note circulation and cost of living. The partial correlation coefficient between export prices and cost of living after eliminating the effects of note circulation and bank clearing is also as high as the simple correlation coefficient between those two. The correlation coefficients establish the fact already proved by the chart that the primary cause for the rise in cost of living is the boom in export prices and that imports play a secondary part.

Remedial Measures

As there is no single cause for inflation so there can be no single cure. Before we suggest any remedial measures suited to Ceylon let us examine the measures taken by some other countries to check inflation.

The U.K. has kept down its food prices by a successful system of rationing and subsidies.

In most of the West European countries, price control and control of investments have been rigidly imposed. Control of consumer goods is less important and their relaxations seem to mark the easing of the inflationary situation.

In the Netherlands and Denmark, credit policy has been employed to ease the inflationary situation. France too pursues a policy of credit restriction. Reliance has been placed on Direct Controls and budgetary surpluses as measures to check inflation by most of the West European countries.

The solution to our troubles lies in various fields. The growing Government deficit is a matter of concern. With the existing commitments it seems impracticable to cut down substantially the Government expenditure. The inflationary method of financing the deficit *i.e.* dissipation of the cash balance, is highly undesirable. In 1940, Keynes put forward a plan to prevent inflation in U. K. He advocated compulsory savings. The idea behind it was to prevent the current earnings of the community from being spent. Various provisions were made to avert severe personal hardships. The adoption of such a scheme would enable the current savings so be used to finance most of the Government deficit (as it is already done on a minor scale⁴).

The great obstacle in the way of expansion of total savings is the wide disparity in the distribution of wealth. Not more than 8% of the population could save. Measures tending towards a more equitable distribution of wealth should be adopted. The volume of private wealth and the degree of liquidity should be reduced to desirable (*i.e.* until they are no longer excessive) levels. To achieve this end heavy taxation of the rich is advocated. The producers should not be allowed to reap the full benefit of the windfall profits that accrue to them now, at the expense of fixed income earners. The profit index shows a spectacular rise.⁵

Year	Tea	Rubber	Tea cum Rubber
1938	100	100	100
1946	126	248	161
1947	258	225	234
1948	305	130	182

The above table shows that the index of rubber fell after 1946, but today it has risen to unprecedented heights even surpassing the 1925 boom prices. In Malaya the wages have risen

4. Central Bank of Ceylon, Annual Report 1950, page 10.

5. Statistical abstract of Ceylon—1948

about 300% over the prewar level and about 60% of the profits are taken away by taxes and duties. Some sort of stabilisation may be established. Part of the heavy export duties should be kept as reserves and returned to the producers when prices fall, as a part of the rehabilitation policy. There should also be a relaxation of the *destinational* controls that exist now. *Destinational* controls tend to hide real total demand and artificially peg down the prices. The additional revenue from taxation could be used to cover the gaps caused by inflation. The U. K. Government, for instance, finances most of her deficit by revenue from direct taxation. Budget surpluses should be achieved by adopting a good fiscal policy and the surplus funds could be used for national economic development.

The import policy is also unsound. It is not possible to ward off inflation by placing restrictions on imports, for we saw that the correlation between import prices and cost of living is small. At the Commonwealth Prime Ministers' Conference in July 1949, it was decided by the members of the Commonwealth to reduce their expenditure on dollar purchases by 75% its level in 1948. Restriction of imports would hinder the release of a welcome anti-inflationary force—namely increased imports.

These extraneous circumstances are not fully uncontrollable. The import policy should be such that we get an adequate amount of consumption goods. What is most desired is a relaxation of the present control policy. The Government should also fix ceiling prices on imports and a strict method of rationing should be introduced.

We are largely dependant on imported foodstuffs. Physiological standards of nutrition in the feeding of our people in times of peril and scarcity should not be allowed to go down to low levels. An adequate diet must have a caloric value sufficient to provide for the requirements of the basal metabolism, etc. A man, for instance, requires 2900 calories a day and a child requires 2748 calories a day. The caloric content of food consumed by a worker per month is less than 6500 calories which is about 70% of the primary requirements. The Government should take this factor into consideration before they decide upon a new import policy.

Our chief goal should be the promotion of social welfare, but inflation obstructs the achievement of this end. The inflated economic balloon should not be allowed to burst, for, if it does, it would be with disastrous economic consequences. Budgeting for surpluses, removal of restrictions on imports and the releasing of other anti-inflationary forces would bring the economy back to equilibrium.

The Motor Traffic Act No. 14 of 1951 and Co-ordination of Transport

P. SANGARAPILLAI

What is co-ordination of transport? The word "co-ordination" has been defined in various ways and it carries different meaning to different persons. To the transport expert, co-ordination is the solution to all problems. Like the quack doctor prescribing the same pill for all ailments, co-ordination is the remedy prescribed by the transport expert for all the defects in the transport system. To the vested interests, co-ordination means the protection of their rights. If a railway cannot earn enough revenue to meet its expenses it is not inefficiency in operation or wasteful expenditure but lack of co-ordination that is responsible for it. If a bus company claims a route, it is not because of profit or self interest but in the sacred name of co-ordination of road passenger transport services. To the newspapers, co-ordination is a high sounding word to be used in editorials and for propaganda purposes. Recently to make confusion worse confounded, the transport experts have added another word to their vocabulary, viz., integration—whose meaning is equally ambiguous. The Chairman of the British Transport Commission has described integration as co-ordination raised to a higher power. What are the implications of these two words? The dictionary gives the following definitions. Co-ordination—the act of making co-ordinate, i.e., of the same rank, order or authority. Integration—the act of making entire. Co-ordination means a state of equalisation and can be applied to otherwise separate and distinct entities. Integration suggests a much closer welding together into one whole. Therefore, the word co-ordination can be applied to agreed measures between separate undertakings for their mutual benefit and is not incompatible with separate and independent financial interest and management. Integration, on the other hand, connotes a complete fusion of activities and can be achieved only when financial interest and management are one.

2. Co-ordination has two definite aspects. In its technical aspect, it refers to such problems as connection between services to provide through facilities for passengers and freight with through charging arrangements and time tables permitting of reasonable transits; the introduction of regular headways; inter-availability of tickets; joint publicity, etc. Such problems may be roughly divided as (i) internal co-ordination within one undertaking, (ii) co-ordination between one or more undertakings in

the same type of transport, and (iii) co-ordination between undertakings in different forms of transport.

(i)—Internal co-ordination includes the inter-connection of passenger services to provide the maximum of through facility for the passenger. Under our system of exclusive monopolies, a company is given not only the exclusive right to operate on a route but on a large number of routes in a particular locality or area. Where necessary and where the traffic warrants, through services are arranged. In other cases, the time tables are adjusted to provide connections without delay.

(ii)—Co-ordination between services provided by the different transport companies has not been developed to any extent in Ceylon. There are 68 companies providing bus services in the various parts of the Island and licences have been issued for about 800 services. Many of these licences are no doubt for short distance urban and suburban services, where owing to high frequency little or no delay is involved in changing from one service to another. Even in the case of other services, this may not be an urgent problem since the majority of bus travellers are short distance passengers and bus companies find it impossible to provide adequate buses even to cater to the needs of these passengers. Travellers using the services of two or more companies are an insignificant portion of the total number. Still this problem of co-ordination remains and will have to be tackled as early as possible. For example, there is a substantial volume of traffic between Southern and Eastern Provinces. Before the introduction of the monopoly system in 1943, there was a bus service between Galle and Batticaloa. The monopoly system has however divided the service as follows:—

Route		Operator
Galle—Matara	...	Galle Motor Bus Co. Ltd.
Matara—Tissa	...	Ruhunu Transit Co. Ltd.
Tissa—Wellawaya	...	do
Wellawaya—Monaragala	...	P. M. T. Co. Ltd.
Monaragala—Akkaraipattu	...	Gardiya Bus Co.
Akkaraipattu—Batticaloa	...	Eastern Bus Co. Ltd.

There are similar cases in other parts of the Island. While it is the task of the Government to arrange time tables to avoid inconvenience and delay to passengers, the bus companies themselves should adopt a spirit of co-operation and discard dissimilar methods of documentation, accounting, etc. As an initial step towards this type of co-ordination, every bus company should publish its time and fare tables and copies made available to the public at reasonable charges.

(iii)—Co-ordinating road and rail transport in this sense is a most difficult and onerous task. These difficulties have been summed up by D. F. Klapper, Assistant Editor, "Modern Transport" as follows:—

Physical Difficulties

"To effect connections between rail and bus is not always physically easy. Stations are often away from main roads and cannot be served without lengthy double running, always irritating to the passengers taking longer journeys. Others, even in large cities, are more or less cut off by low bridges or level crossings. Indeed, Stoke-on-Trent station has to be approached from one side by a bridge so low that not all types of single-decker will clear it, and it is thus not unnatural that the principal routes calling for double-deckers do not pass its entrance. Wherever possible, however, buses do call at station yards or run near entrances. It is remarkable, none the less, that even in the most likely places the turnover of passengers from bus to train is often under 10 per cent of the whole bus traffic.

"Actual co-ordination of railway and bus time-tables is a most onerous task except in cases where each service is so frequent that connections are bound to be made. It has always to be kept in mind that buses cannot wait for more than, say, three minutes—if on a through route—without causing annoyance to passengers who do not desire a train connection and that trains, even on the best regulated railways, run behind schedule far more frequently than is tolerated by bus managements. Furthermore, the bus network of the country is a close one and connections have to be made on schedule between the bus services themselves if still more distant connections either to rail service or with other bus routes are to be maintained.

Limiting Factors

"The ideal of a bus service which connects with every arriving and departing train at the railway station which it serves is practically impossible of attainment because it would either require a road vehicle to convey passengers to the station to catch each train of the day and another to take passengers from each train, or the buses which pass a railway station along their line of route would have to wait for a period at the station in order both to feed into and take passengers from a particular train. The number of trains with which bus connections can be provided is limited by the number of road vehicles available,

and this difficulty is accentuated at the present time by the acute shortage of both vehicles and staff. It therefore becomes necessary in the majority of cases to decide which of two or more arriving or departing trains is the most important from the point of view of meeting the public need for bus connection. This may not be apparent to the passenger who wishes to catch a particular train, but the bus which reaches the station three minutes after his hoped-for train has departed may have been useful to a greater number of people who arrived by that train and wish to proceed to some other destination.

"It may also be that the bus was so timed that at some other point on its journey or perhaps even on its return to the same station it would make the ideal connection with some other train, and to alter its timing to feed into the first train would render impossible its connection with the latter and possibly more important one. If, as previously stated, buses which pass a railway station along their route were allowed a lay-over of, say, ten minutes or so at a railway station in order both to feed into and convey passengers from a particular train, there would doubtless be complaints from the other passengers who were not concerned with the connection at the station and who possibly form a majority of the passengers using the bus service. Unless great care is taken the bus passengers may lose the benefits of even headways on their services."

At present, the Railway Department is running co-ordinated services with the co-operation of the bus companies concerned to Adam's Peak, Madhu, Kataragama, Talawila, etc. during pilgrim seasons. A co-ordinated service is also provided by the railway to Nuwara Eliya. Although it is impossible to provide such services to all places, yet the feasibility of co-ordinated services to important places like Mullativu, Kegalle, Galoya, etc. should be explored and more services of this nature should be provided.

Co-ordination of road and rail in the sphere of freight transport is the urgent necessity in Ceylon. People prefer road transport owing to delay at railway terminals, the difficulty of loading and unloading and finding road transport at both ends and the absence of safety as the traffic is handled by a large number of persons. If rail transport is to be the chief means of long distance carriage as contemplated by Mr. Donald Rutnam, late Adviser on Transport to Government, then it becomes all the more necessary that the railway should collect and deliver traffic utilising both means of transport. It is not necessary that the railway should run road services except in exceptional cases. The railway and the road hauliers should work in close co-operation. Even now, there are

a large number of co-ordinated freight services operated by the railway especially from stations like Matara, Bangadeniya, Kodikariam etc. This type of co-ordination is an administrative problem. Even the most violent critic of the Government must agree, that the foundations have already been laid and that it only remains for the Government to extend these services wherever necessary.

3. The second kind of co-ordination is the commercial and economic division of traffic between the alternate means of transport. This is an economic problem. There are two accepted and well known definitions of transport co-ordination. The Royal Commission on Transport defines co-ordination "as a state of affairs whereby every passenger who travelled and every ounce of goods was carried by the most economical route and form of transport." This definition depends on the meaning of the word "economical." Does it refer to the user, the provider of transport or the general community? Clearly the word refers to the community. The interests of the user and the provider should be subordinated to the interests of the community unless it can be shown that these interests are in harmony. The report of the committee of experts of the International Chamber of Commerce issued in 1938 states that the principal aims should be "to co-ordinate all means of transport in such a way as to secure for each of them the traffic for which it is best suited and to avoid overlapping, the financial consequences of which the community will ultimately have to bear." The Committee further adds that "the functions of the State is not to maintain the status quo or to favour one means of transport at the expense of the other but to create the requisite conditions for securing the maximum efficiency of all means of transport as to further their evolution in the interests of the general welfare of the community and of economic progress." Economic co-ordination therefore means a state of affairs where goods and passengers are carried at the minimum cost to the community. Each traffic should be allocated to that form of transport which costs least to carry it. In other words, the division of traffic between the alternate means of transport should be based on costs or marginal costs. By cost of an article, we mean the sum total of satisfaction forgone or sacrificed in order to produce that article. If that article was not produced, the factors of production which were devoted to its production could have been utilised to produce another article which would have yielded a certain amount of utility or satisfaction. The amount of utility so lost represents the real cost of the first article. This abstract cost is indeterminate and cannot be measured. In a monetary economy, we would not be far wrong if we base the division of traffic on monetary costs.

There would be a large measure of unanimity in regard to the above objective. Not only in transport but also in every economic activity, the object is to secure maximum results at minimum cost. We shall now restrict ourselves to the problem of rail-road co-ordination. How can we achieve this co-ordination and ensure that traffic is sent by rail or road according to cost? Will free competition between these two forms of transport achieve this object? In the history of both these forms of transport, at no time, did we have free competition? Both the business and the operating practice of railway companies are closely regulated by law. Railway net revenue is regulated by statute. The principles upon which railway rates may be constructed are laid down by law; the actual rates which may be charged upon any traffic are subject to review by statutory bodies and are controlled both by statute and by judicial decision. Moreover, these rates are not based on costs but on what the traffic will bear. Different rates are charged for different commodities. The railways are statutory carriers who must carry the traffic at the prescribed rates. The rates are made public and rate books are kept open for inspection by interested parties including competing transport concerns. The road haulier is not subject to such statutory control. Although he is a public carrier, his rates are not fixed. He is free to accept or reject any traffic except at his own rates. The result has been that the railway was left with the low-class traffic or traffic which costs much owing to handling charges or the very small volume in which it moves such as parcels. Road transport was able to get the high class traffic since it was in a position to undercut the railway rates in respect of this traffic. The railway cannot be run at a profit unless it has a substantial monopoly of transport. The excess of income on low-class traffic over marginal costs is insufficient to meet its fixed charges. In 1937, the British railways asked for a square deal. They suggested that they should be freed from all statutory regulations and allowed to compete with road transport or that road transport itself should be subjected to the same control as the railways. The railway request is, therefore, for free competition or for adequate control of both forms of transport.

4. As you know, free and perfect competition does not exist today in any field of activity. It is incapable of realisation. Even if it can be realised, there is no guarantee that it would produce the best results. In the early stages of industrialisation, units were small, very little capital was invested in each unit and there was a large degree of mobility of the factors production. Under such conditions, free competition resulted in great benefits to the community. Even at that time, there was wastage and duplication owing to surplus capacity. But there was continuous

progress owing to increase in population, technological changes, etc. The surplus capacity in any industry never became a serious problem. It was only necessary not to expand that industry any further for some time till the increase in population eliminated the surplus. Even if adjustments had to be made, the units that went out of business and the capital invested therein were small that the destruction of the capital and the withdrawal of the unit were not felt by the community and this loss was insignificant when compared with the large gains and advantages of free enterprise and competition. What we have today are giant units. The economy has become more and more rigid and the factors of production less and less mobile. In any struggle, the unit that cannot carry on the business will not retire and transfer its resources to some other industry. The struggle will resolve itself into a fight till death and both victor and the vanquished will be reduced to ashes and their capital destroyed and the community will suffer. Moreover the nature of these industries is such that competition would be harmful to the community. A railway requires heavy capital expenditure in fixed plant. Once laid down, it can deal with a great increase of traffic at relatively little extra cost. Even from the point of view of operation, its optimum unit is large. If it is to be operated efficiently, it must be maintained as a large unit and sufficient volume of traffic must be diverted to it to work it up to capacity. If owing to road competition, sufficient traffic is not available to the railway and it becomes necessary to reduce its size, its efficiency will be impaired. Its capacity to compete with road transport is further reduced and further reduction in size will become necessary. This tendency will go on and on till the entire railway system is scrapped. No person or country in its senses will ever agree to the complete elimination of rail transport which is essential to its progress and which performs many useful functions. If on the other hand, the railway, owing to its great financial strength, eliminates road transport, the country loses all the advantages of road transport. In actual fact, competition might not result in the complete elimination of one form of transport or the other. Each form of transport and each undertaking would be developed up to the point where its marginal costs are equal to anticipated marginal income. These anticipations will never be realised. Development would therefore take place without regard to the total transport needs of the community and the position of other forms of transport. Each undertaking would try to secure goods and passengers from other undertakings. Free competition would therefore lead to the creation of surplus capacity. Capital and other factors of production which could have been utilised in other necessary services are wasted. There is another reason why free competition is undesirable in transport. Industries subject to free

competition, contract and expand according to demand, prices fluctuate and adjustment is brought about through the irrational forces of supply and demand. On the other hand, the production of a country depends on the stability of the facilities and rates of transport and fluctuations in transport are fatal to the progress and welfare of the community. Transport is a public utility service. As in all public utilities, stability is the chief desirable characteristic.

5. The other request of the British railways that both forms of transport should be subject to the same statutory control is impracticable. In the first place, it is impossible to calculate costs of transport by road since the services provided by the hauliers differ in quality. Secondly, the road transport industry is a small man's business. There are many units having one or two lorries and catering to the needs of their clients. To enforce the rate structure, an army of policemen is required to scrutinise countless transactions between the hauliers and the customers. Further, to subject road transport to the railway classification, is to destroy the economic advantage of road transport.

6. The established practice in every country is the institution of some form of control by licensing of road transport vehicles. The principles of transport control are very nearly the same in practically all countries. Persons or companies not actually engaged in the business of carrying for hire and who wish to set up as public or limited carriers are "new comers." Licenses are granted to new comers only if there is a need for the proposed services, a need which is not being met by some existing carrier. To do this, an applicant has to show:—

- (1) that they are persons able and willing to employ him and
- (2) that existing facilities are either inadequate or unsuitable.

An established haulier, one already in business and holding a licence, may apply for additional vehicles. He has to satisfy:—

- (1) that there has been an increase in his business; or in the business of his customers or of some of them or in the industries in which they are engaged, and
- (2) that his customers or some of them have been put to inconvenience because the applicant did not have the vehicles needed to serve them.

An established haulier who applies for a renewal of his licence need only show:—

- (1) that during the currency of the previous licence, the vehicles had been regularly or fully employed, and
- (2) that there had been no material change in the circumstances of his business.

A system of licensing will never achieve co-ordination. The object is clearly to stabilise the existing position and to maintain the *status quo*. It gives time for the authorities to tackle the problem of co-ordination. It is only a short term measure till other measures are devised. If the system of licensing is continued for a long period, it leads to many abuses. The licensing system greatly inhibits both change and enterprise in the road transport industry. Enterprise does not have the opportunity of working up new services and cannot create a demand for its product and any change in an existing business is discouraged since it may jeopardise renewal. The customer will not enjoy the fruits of enterprise in the form of reduced rates. The trader is prevented from choosing the transport which suits him best. Owing to the conflict of different financial interests, the development of a cheaper means of transport is hindered and a number of new services are prevented from coming into existence. The beneficiaries are the hauliers who could keep his licence and the railway. Even the railways did not gain owing to competition from existing hauliers. The British Railway found themselves in the same financial position in 1938 as in 1933 before licensing was introduced. The position of the Ceylon Government Railway is not in any way better in 1950 than in 1938 before Ordinance No. 45 of 1938 came into existence. Perhaps, it might be said that the position of the railways would have been worse if not for the system of licensing. It is, however, clear that co-ordination cannot be achieved by the system of licensing alone. Unfair and wasteful competition would continue to exist.

7. A system that would lend itself to the automatic division of traffic on an economic basis is the combined monopoly system. The carriage of each passenger or article would depend on marginal costs and passengers and goods would be carried by that form of transport whose marginal costs are the least. There would be no conflict between different financial interests, no wasteful competition and no unnatural diversion of traffic. The amount of each form of transport would be determined by the operating costs and the needs of the community. All surplus capacity would be eliminated. The cheaper and more economic form of transport would be developed. The rates charged would be such that the capital charges of all forms of transport would be met. The only theoretical solution to the problem of economic co-ordination is the integration of all forms of transport. Even then, there is no guarantee that division of traffic will be based

on real costs. The combined monopoly will acquire the existing undertakings. Its capital structure at the beginning will, therefore, determine its future policy. If its capital is mainly in the railways, in order to protect this capital, traffic will be diverted to the railways to work it up to capacity. There will be no allocation of traffic on an economic basis. This tendency has already manifested itself in the case of the British Transport Commission. If Sir Cyril Hurcomb's statements are to be accepted, it has already been decided that the railways should form the backbone of the transport system. The job of the Transport Commission should have been to think out what unification of transport means and to decide how an improved system can be built up at less cost. Instead of which, the Commission has decided to maintain the existing structure. Secondly, the responsibilities of a combined monopoly are so great and the problems to be faced so numerous and varied that decentralisation would become necessary and with decentralisation would arise conflicting interests. Admittedly integration would result in rationalisation and economies of operation. But such a monopoly of transport can never be left in private hands but will have to be owned and managed by the State or a Public Board. On this question of nationalisation, there can be sincere differences of opinion. The nationalisation of transport in Great Britain must be traced to the principles of Fabian Socialism. The Fabian Society has been working for the nationalisation of all industries, considered readily susceptible to public ownership such as transport and other public utilities as preliminary steps in the gradual socialisation of industry by legislative action rather than by violent social revolution. The case for nationalisation has been ably and lucidly set out by Mr. Herbert Morrison in his book on *Socialisation and Transport*. It is unnecessary for me to repeat these arguments. I shall, however, quote one passage from his work. "We must think more and more in terms of transport as a whole and less and less in terms of railways, road transport, canals, coastwise shipping and airways; and we must handle our transport organization with directness and decision, instead of assuming that by accident and good luck the provision of transport by competitive scramble will somehow work out for the best. Once we have done that, we can pursue the sensible course of enabling each form of transport to serve in the field where it is best fitted to serve. There are transport needs for which the railway is not the best medium; for example, light traffics, branch routes connecting sparsely populated areas, or rural areas with the great towns, door to door deliveries for moderate distances and so on; there is a field within which road transport is unquestionably superior to the railway just as there is a field within which the railway is superior to road transport;

so with the canals; so with the coastwise shipping. An unified, comprehensive transport system would concern itself primarily not with capturing traffic for this or that form of transport, but with determining the most economical and efficient method of meeting this or that public requirement."

Briefly then, the case for nationalisation is as follows:—

- (1) Integration of all forms of transport is absolutely necessary if rationalisation, avoidance of overlapping and duplication and economic co-ordination are to be achieved.
- (2) This huge monopoly cannot be left in private hands as then, politically and socially, it will prove a danger to the community. Transport is a public utility service. On the efficiency, adequacy and suitability of this service depends the propriety of other industries and services. The primary end of transport should be not profit making but efficient public services; and
- (3) There is no reason why a nationalised undertaking should be less efficient than private enterprise since the motive of service is as good an incentive as the motive of profit, if not better.

The opponents of nationalisation are equally firm and sincere in their views. They deny the validity of propositions (1) and (3) above, if not of (2). Integration in their view will not lead to co-ordination but to the perpetuation of the existing structure of transport. Without competition, there will be no enterprise or changes. The best form of transport will not be developed and traffic will not move by the most economic form of transport. It is possible that the combined monopoly may make a profit but that does not mean that it provides the best or most efficient service. A reasonable surplus of transportation is a powerful incentive to efficiency in operation and this incentive is lost in a combined monopoly. In a private firm, responsibility rests with the shareholders and directors. In a public concern, the responsibility is vested in Parliament, the Minister, and the Board of Executives. Excessive functionalisation of authority and responsibility which is endemic in Government enterprises, creates thousands upon thousands of individual management situations and problems. It also creates and maintains thousands of unnecessary jobs. Mr. Urick, a brilliant English student of organisation and management puts the problem as follows:—

"Whitehall—is still a tilt yard where desperate assaults at arms are engaged over points of interdepartmental competence of no interest whatever to the public." Confusion and conservation are the results of this divided responsibility. The staff

suffers from a sense of frustration and the zeal and gusto for work and initiative which are the characteristics of private enterprise are lost under nationalisation. This is expressed most clearly in a telling passage by John Stuart Mill, "Every function supper added to those already exercised by the Government causes its influence over hopes and fears to be more widely diffused and converts more and more, the active and ambitious part of the public into hangers on of the Govt. or some party which aims at becoming the government. If the roads, the railways, the banks, the insurance offices, the great joint stock companies, the universities and the public charities were all of them branches of the Government; if, in addition, the municipal corporation and local boards with all that now devolves on them, become departments of the Central Administration; if the employees of all these different enterprises were appointed and paid by the Government, and looked to the Government of every rise in life, not all the freedom of the press and popular constitution of the legislature would make this or any other country free otherwise than in name".

Nationalisation is a political problem. It is for the people to decide this problem. It can only succeed where the people are imbued with the motive of service and not the motive of profit. Although in theory, integration and nationalisation may achieve co-ordination, yet in practice, this result may not be achieved. It is only planning allied to integration that will achieve this objective. Planning implies not only the planning of transport but central planning of the economy. It is said that planning by the individual gets somewhere but planning by governments or by bodies gets nowhere. In the Road to Serfdom, Professor Hayek puts it quite simply, "the more the Government plans, the less the individual can plan." Here again, it is for the people to decide whether they would accept a planned economy and co-ordination of transport or a free economy but controlled to some extent or other in the national interest.

8. So far, we have been chasing after the illusive and shadowy co-ordination. In a free capitalistic economy we cannot achieve co-ordination of transport. Are we prepared to sacrifice the advantages of such an economy? If not, we must be satisfied with something less than ideal co-ordination. In such an economy there is still the transport problem to be solved but not the problem of ideal co-ordination. There is an economic problem applicable to transport as well as to all human activities. All our efforts are directed towards the creation of utilities for the satisfaction of human wants. The means at our disposal for the creation of utilities are limited and are also capable of alternate uses. Our problem is to allocate the limited means at our disposal

to different uses so as to achieve the maximum amount of utility. To do so, we should avoid duplication and make the most efficient and effective use of all factors of production. In a capitalistic free economy there are many alternatives before the Government.

(a) Where the transport capacity available is insufficient and further development of transport is necessary. In this instance the Government will have to decide what form of transport should be developed to serve the needs of the country. Clearly the interests of the general community require that the cheapest form of transport having regard to the economy of the country, should be developed and not an out-of-date or unsuitable form of transport.

(b) Where the transport capacity available is more than sufficient and no further development of transport is necessary. If it is necessary and desirable in the interests of the community that any form of transport should be curtailed we should curtail that form of transport which is inefficient and uneconomic.

(c) Where there is a surplus capacity, this capacity should be reduced as far as possible unless it is felt that this capacity would be required by the community in the future. But the problem is not so simple in transport. Transport is one of those industries which must be of a large scale in order to realise certain economies. This is especially true of rail transport. The fixed costs of rail transport are proportionately high and for the concern to remain efficient and to carry goods and passengers at cheap rates it must be assured of a certain amount of traffic and must be maintained at a certain size. Reduction of capacity may impair the efficiency of the undertaking and make it totally unsuitable to perform its functions. This is the most difficult problem but it is not incapable of solution. Let us take the case of road and rail transport in any country. First we should find out whether any form of transport is being subsidised at the expense of the other. Road transport should pay its fair share of the costs of building and maintenance of roads. If not taxation of road transport should be increased to meet these costs. The conditions of work such as pay, hours of work, etc., should be of the same standard as those prevailing in the railway having regard to the nature of duties and responsibilities undertaken. Both forms of transport should, as far as possible, be placed on a footing of equality. If even then, full use cannot be made for example, of railway capacity available, then the undertaking should be rationalised and expenses reduced to the point below which any reduction would impair the efficiency of the working of the railway. For purposes of argument, I assume that for

some reason or other, whether it be political or social, or economic, it is not prudent to abandon the railway altogether. If after having adopted all the above measures, we find that the surplus capacity still exists, then the railway can be subsidised from taxation or traffic diverted to the railway by arbitrary methods. Which method if adopted would depend on the particular circumstances of the country. Let us suppose that the subsidy required to maintain the railway as an economic unit is X million rupees. If the second method is adopted, then we should assess the effect on the economy of the country. We have assumed that the state would ensure equitable conditions as between both forms of transport and both forms of transport are run efficiently. If under such conditions the railway cannot be run without a loss and cannot make full use of its capacity, it must be because road transport is more economic and efficient having regard to the geographical position and economy of the country. Arbitrary diversion of traffic would then result in higher costs of transport and higher prices. Higher prices, especially of export articles, would bring about a contraction of production and income. Once a contraction of income sets in, the national income would still further be reduced. The total loss should be assessed. Let us assume that the total loss in national income due to the arbitrary diversion of traffic is Y million rupees. If X is less than Y , then the railway should be subsidised. It will thus be clear that in the midst of these conflicting theories, no clear cut policy of economic co-ordination is possible. Each country should adopt policies having regard to its political and economic development, the advantages of avoiding duplication and surplus capacity and making full and efficient use of existing capacity and the disadvantages of arbitrary diversion of traffic.

9. How does the Motor Traffic Act, No. 14 of 1951 propose to divide traffic between road and rail on an economic basis? We should judge the proposals in the context of the political, social and economic conditions of the country and the expressed views of the Government on the question of rationalisation. The Act sets up the machinery for achieving co-ordination in its technical aspect and lays down the legislation to achieve co-ordination in its economic and commercial aspect.

- (1) One of the functions of the Commissioner of Motor Traffic is to recommend to the Minister of Transport and Works measures for the co-ordination of road transport with rail transport and with other commercial transport. Recommendations regarding road and rail transport co-ordination will normally be made after consultation with the G. M. R. and if the Minister accepts, such co-ordination will be made through administrative directions.

- (2) *Road Passenger Transport*:—Ordinance No. 47 of 1942 eliminated a large number of long distance road passenger transport services which were running in competition with the railway such as Colombo-Trincomalee, Colombo-Jaffna, Colombo-Talaimannar, Colombo-Anuradhapura, Colombo-N'Elia, Colombo-Tissa, etc. At present, the following services might be considered as long distance services running parallel to the railway:—

Service No.	Route	Route Mileage	Trips
R/642	Jaffna-Anuradhapura	122	2
R/643	Jaffna-Trincomalee	183	4
R/644	Jaffna-Mannar	135	2
R/645	Jaffna-Mullaithivu	90	2
R/64	Colombo-Galle	72	22
R/321	Colombo-Kandy	72	42
R/322	Colombo-Kurunegala	58	14
R/193	Colombo-Norton Bridge	73	6
R/238	Colombo-Badulla	137	6
R/176	Colombo-Ratnapura	56	44

In respect of these services, Mr. J. N. Arumugam, Permanent Secretary to the Minister of Transport and Works states as follows in one of his recommendations to Government:—

“Most of the above services do not actually run parallel to the railway but run through different areas. Moreover, the passenger traffic originates from various places on the route and terminates at various places on the same route. The number of trips allowed on these various services are strictly controlled so that an expansion of these services is not permitted unless the operator could show sufficient evidence to prove that the traffic is not from terminus to terminus but along the way. Total mileage run on these routes is about 3.8 millions a year and the gross income is about Rs. 3.8 millions. Out of this amount, income from through traffic from one terminus to another may be about Rs. 1 million. The amount involved is so small that it is not worthwhile disturbing the present structure of the transport system and causing inconvenience to the public.”

The view of the Government on this matter appears to be the following:—

- (a) An economic division of passenger traffic between road and rail has been made by Ordinance No. 47 of 1942. There are only a few long distance services running parallel to the railway.

- (b) As regards urban, sub-urban and short distance passenger traffic, no restriction on any form of transport is proposed. Both forms of transport are allowed to develop their services freely and to attract traffic by the quality and quantity of their services and,
- (c) while the railway does not face competition from regular operators in regard to long distance passenger traffic, it still has no monopoly since it has to face competition from the air services, private cars and the contract carriage services. This competition would be sufficient to keep the railway alert and efficient.

The provisions of the Motor Traffic Act, therefore, mainly deal with measures to improve road passenger services.

(3) The Ceylon Government Railway now carries about 1.2 million tons of goods per year. The average haul is between 90-100 miles. If the wagon position is improved, the Railway is in a position to carry about 2.2-2.4 million tons per year without any appreciable addition to the costs of operation. It is in the interests of the country therefore that we should divert to the railway about 1 million tons of long distance carriage and make full utilisation of existing capacity. With suitable organisation and arrangements for expeditious delivery and co-ordinated services the railway will be in a position to transport these goods as efficiently and well as road transport. There would be no injurious effect on the economy by this diversion. The Ordinance therefore proposes to reserve for the railway long distance carriage, except for certain exceptions. I quote below the relevant sections of the Ordinance in regard to this matter:—

“88 (1) Where any two places are conveniently connected by railway, and the shortest distance by road between those places is not less than sixty miles, then, save as otherwise provided in section 89, no permit shall be granted:—

- (a) authorising the carriage between those places; or
 - (b) authorising any carriage involving or necessitating the through carriage between those places, of goods by lorry or by a succession of lorries.
- (2) For the purpose of sub-section (1), any two places shall be deemed to be conveniently connected by railway if:—
- (a) each of such places is situated either (i) within the limits of a municipal town within which there is a railway station, or (ii) within a distance by road of not more than 3 miles from a railway station; and

- (b) the railway route between the two railway stations does not exceed one and one half times the shortest distance by road between the two places in a case where there is no break of gauge in the railway connection or does not exceed the shortest distance by road in a case where there is any such break of gauge.
- (3) For the purpose of this section, the expression “distance by road” means the distance measured along any highway or highways on which the use of lorries is not prohibited under this Act.

“89 (1) Notwithstanding the provisions of section 88, a permit authorising any carriage of the description mentioned in that section (hereinafter referred to as “regulated long distance carriage”) may be granted:—

- (a) in exceptional circumstances, on the ground that the Commissioner considers it expedient to grant a permit for the carriage of fresh fish, fresh fruit, fresh vegetable or other perishable or fragile articles, having regard to the delay and risk involved in, and the other disadvantages of, the carriage of such articles by railway; or
 - (b) on the ground that the applicant for the permit is a person who, immediately prior to December 31, 1949, was the holder of a licence or licences authorising the use of a lorry or lorries for substantially the same purposes and in substantially the same area of operation as the purposes and the area, respectively, to which his application relates, so however, that the permit which may be granted in any such case shall only authorise the use of the same lorry or lorries or other lorries of the same total payload; or
 - (c) in exceptional circumstance, on the ground of strong economic justification; or
 - (d) on the ground that the lorries are owned by the Government or any prescribed public authority.
- (2) No permit authorising regulated long-distance carriage which is granted on the ground specified in paragraph (b) of sub section (i), shall be expressed to be in force after December 31, 1955 and the provisions of this sub-section shall have effect notwithstanding anything in section 84.
- (3) In any case where—
- (a) any person is, by permits granted on the ground specified in paragraph (b) of sub-section (i), authorised to perform regulated long-distance carriage during the whole of the period commencing on the appointed date and ending on December 31, 1955, and

- (b) an application made by that person for a permit authorised regulated long-distance carriage by him during the currency period commencing on January 1, 1956, is refused.

That person shall be entitled to compensation for loss of business in such circumstances and subject to such conditions and restrictions and of such an amount as may be prescribed by regulations made in that behalf; and the payment of all sums due by way of such compensation is hereby charged on the Consolidated Fund.

(4) No permit authorising regulated long-distance carriage shall be granted on the ground of strong economic justification, unless the Commissioner is satisfied:—

- (a) that the grant of the permit will result in substantial and justifiable economy of time and cost to the prospective consignors or consignees; and
- (b) that, after carefully weighing the total potential loss to the railway (having regard to the likely number of other cases in which permits will have to be granted on similar grounds), against the advantages of the carriage by road of the goods proposed to be carried by the applicant, it is expedient in the public interest to grant the permit.

(5) Nothing in section 88 shall be deemed or construed in any case to prohibit the grant of a permit authorising regulated long-distance carriage in any case where the permit is required by any applicant to authorise any carriage of any description set out hereunder:—

- (a) the carriage of liquids in bulk in a tank permanently fixed to a lorry, or in a tank not so fixed the capacity of which is at least five hundred gallons;
- (b) the carriage of goods of a special character which, under any written law specifically relating thereto, may only be carried in a vehicle constructed or adapted so as to comply with that law and which are being so carried;
- (c) the carriage consisting of an ordinary furniture removal;
- (d) the carriage of meat;
- (e) the carriage of livestock;
- (f) the carriage of felled timber on a lorry specially constructed for the purposes of such carriage;
- (g) any carriage only in a lorry specially constructed to carry abnormal indivisible loads, and the carriage in a lorry in which no other goods are being carried for fee or reward, of apparatus or equipment ancillary to the operation, for

the purposes of the carriage of such loads, of such a specially constructed lorry; or

- h) the carriage of goods in a vehicle with a payload not exceeding fifteen hundred-weight.

(6) Nothing in section 88 shall be deemed or construed to prohibit the grant, to the holder of a private carrier's permit, of a short-term permit authorising regulated long distance carriage in any case where the Commissioner is satisfied that such short-term permit is required on any particular occasion for any purpose of a prescribed description."

At this stage, it would be premature for me to interpret these sections or to explain their significance. This will be the task of the Commissioner and the Tribunal of Appeal.

Economics of Food Subsidies

J. B. KELEGAMA

Food being the first necessity of life is the first constituent in the cost of living. Changes in food prices are therefore of major importance to all of us. Ceylon's staple food is rice of which she produces only one-third of her requirements; the other two-thirds is imported. As a result of the second world war about 15,000,000 acres under rice were abandoned in South-East Asia; this had adverse effects on countries importing rice. Burma, the chief source of Ceylon's rice supply suffered heavily under the Japanese occupation; she is still below her pre-war production levels. The scarcity of rice led Ceylon to ration the limited supply among the consumers equally. Rationing came into force during the war when the essential commodities were in short supply, but as the situation has not improved appreciably it has continued up to this day. The distribution of rice at the subsidised price is according to a fixed ration of $1\frac{1}{4}$ measures per head per week with an extra quarter measure of rice per head to the manual worker. Flour and sugar are not rationed as the present supply can meet the demand. Since these three commodities *i.e.* rice, flour and sugar are the main items in the cost of living, the Government has taken the sole responsibility of purchasing them from abroad and distributing them through co-operative and authorised private stores. This scheme protects the consumer from the exploitation by self-interested private traders. The prices of imported foodstuffs have been gradually rising. The retail price of rice in 1939 was 12 to 15 cts. per measure; today it is 68 cts. Wheat flour, before the war, was 10 cts. a pound, now it is 28 cts. Sugar has risen from 11 to 45 cts. per pound. The rise in the price of those foodstuffs naturally led to a rise in the cost of living. The following table shows the rise in the cost of living in the past few years.

¹ 1938-39	100	1950 January	271
1939	108	February	271
1940	112	March	266
1941	122	April	266
1942	162	May	266
1943	197	June	271
1944	200	July	272
1945	221	August	274
1946	229	September	283
1947	252	October	279
1948	260	November	277
1949	259	December	273

1. Source: Department of Statistics.

The rise in the cost of living index was not due to the rise of food prices alone, it was also due to the rise in prices of clothing, rent, fuel, etc. Further we must distinguish between the rise in prices of imported foods which is due to a general rise in world prices and that of local goods such as coconut oil and tea, which is caused by the high external demand. The Government at first thought that dearness allowances alone would tackle the problem of the rising cost of living. But the middle class agitation, especially that of the General Clerical Services Union for the increase dearness allowances made the Government search for new weapons. This took the form of increased subsidisation of prices of rice and flour. The idea behind subsidisation was that the Government bought the three essential commodities at their world prices and sold them to the consumer at reduced prices, the Government bearing the loss.

"A reduction in the prices of articles to the consumer will necessarily bring down the cost of living. Effective reductions in the retail prices of these articles by means of a subsidy are possible only in the case of those articles which are imported and distributed to the consumer by the Government or its agencies. In the case of articles not so distributed, the subsidy is likely to be dissipated and the consumer may not get the full benefit of the State aid." (Budget Speech, 1950-51.)

Rice and Flour

In October 1950, the price of rationed rice was reduced from 36 cts. per measure to 30 cts. per measure, and that of flour from 28½ cts. to 23 cts. per pound. In December, the price of rice was further reduced to 25 cts. per measure. The landed cost of rice to Government is 61 cts. per measure. The following table shows the details clearly.

Article	Retail Price	Price if not subsidised	Landed cost to Govt.
Rice	25 cts. per m.	64 cts. per m.	61 cts. per m.
Flour	23 cts. per lb.	28 cts. per lb.	26 cts. per lb.

The landed cost of rice was 56 cts. per measure in 1950, now it has gone up to 61 cts. It is estimated that on rice alone a family of five saves Rs. 150/- per year or Rs. 12.50 per month. To this must also be added the saving on flour. If we assume that a family of five consume 75 lbs. of flour a month in the form of bread and buns, it will save Rs. 3.75. The Central Bank annual report points out that the fall in the cost of living index from 283 in September 1950 to 279 in October and to 273 in December, was due to the increased subsidisation of the prices of flour and rationed rice in October and December.

2. Source: Director of Food Supplies.

Sugar

The position of sugar on the other hand is different, as the Government is making a profit on it. The price of sugar has been fluctuating for a long time—the landed cost to the Government of brown sugar fluctuating between 29 to 38 cts. per pound and that of white sugar between 32 and 46 cts. per pound. But since of late the price has risen:—

	Retail Price	Landed Cost	Govt.'s Profit
Brown Sugar	45 cts.	40 cts.	5 cts.
White Sugar	55 cts.	50 cts.	5 cts.

When the landed cost of sugar was low, the Government made large profits—Rs. 40,000,000 in 1947-48 and Rs. 35,000,000 in 1949-50. But now as the price has risen, the Government's profits will be considerably reduced. In fact, only a moderate sum of Rs. 12,000,000 is expected this year. If the price of sugar rises further, the Government's profit might vanish altogether. There is no denial of the fact that the Government has profited at the expense of the consumer; to sell an essential commodity like sugar at a profit is to increase the consumer's burden and to wipe out some of the benefits brought by subsidies. It is true that the Government's profit on sugar is utilised for subsidising the prices of rice and flour, but it would be better if the Government resorted to taxation instead.

Advantages of Subsidies

There is no doubt that the subsidisation of the prices of rice and flour tend to keep the cost of living down. It is mostly the lower income groups that will benefit from subsidies as they cannot afford to pay exorbitant prices in the free market. The export boom in rubber and coconuts has led to a favourable trade balance, and the rubber and coconut owners have accumulated large bank balances. So long as there is a serious food shortage combined with an unexpended purchasing power in the hands of the rich, food prices should not be allowed to shoot up to the free market level. Some sort of control is necessary. If prices are uncontrolled they will rise to exorbitant levels. Workers will then clamour for higher wages which in turn will pave the way for further inflation. It is through food subsidies that the Government hopes to prevent first, a rise in the prices of the main items of food to the consumer and second, spiralling inflation caused by the demand for higher wages. In the first it has succeeded; in the second it has temporarily led to a cessation in the demand for higher wages, but this must not be taken as a good sign, for prices are still rising and there is much discontent underground. Keeping

3. Source: Director of Food Supplies.

down food prices alone will not reduce the cost of living. Other items in the cost of living index too have risen in price and their prices have not been subsidised. There is no reason for complacency—the demand for higher wages will come again.

It is learnt that the Government also intends to subsidise the prices of coconuts and tea. The export boom in these goods have driven up their prices, a coconut costs 25 cts. today. The Co-operative Wholesale Establishment has fortunately come to the aid of the Colombo residents; it sells through its stores two coconuts to a person per week at 15 cts. each. But this is confined to Colombo only and the Government has no hand in it. The new suggestion is that the price of both tea and coconut should be subsidised by the Government. This undoubtedly will help to bring down the cost of living further. But it will have other repercussions to which we shall turn next.

Disadvantages

Though the subsidisation of the prices of essential commodities is intended to benefit the poorer sections of the community in particular, it has the undesirable and indirect effect of benefiting all sections equally. The higher income groups do not need assistance; but still the subsidisation of the prices of food assist them. Such indiscriminate benefits virtually amount to a wastage of funds.

Subsidies are no remedy to inflation. They do not attack inflation at the root. In fact they accept the existence of inflation and merely try to counteract its impact on the price structure. "..... They tackle the symptoms of the disease not the disease itself....." It does not check the rise in prices in general, it merely makes essential commodities available to the consumer at fixed prices. Subsidies by abandoning the free price market mechanism may also lead to uneconomic redistribution of resources. More over increased subsidies will lead to a budget deficit which will aggravate the present inflationary pressure.

In the probable case of coconuts and tea, since the amount of the subsidy will be roughly based on the costs of the least efficient producer, there will be little incentive for the more efficient producers to increase their efficiency and lower the costs. Since the rises in costs will be covered by the subsidy, producers will have little incentive to reduce costs and consequently prices. The maximum price allowed tends to be *de facto* the minimum charged to the consumer; black market will raise its ugly head; the urge of competition will be lessened and this will be reflected in lower standards of goods and services; these will increase

costs still further "It is almost elementary in economic theory that subsidies inevitably tend to result in high costs of production in subsidised industries." (Economic Digest.)

Further when the prices of essential commodities are held down in comparison to the prices of non-essentials there will be a tendency for manpower and materials to be diverted to the latter from where they are needed most. This is a misdirection of economic activity, and should be at all costs avoided. The consequent low prices of these goods—rice, flour, coconuts and tea—will mean that people will have more to spend on luxuries. This results not only in an increased demand for radios and motor cars from the rich (which might also reduce the country's favourable balance) but it will also lead to an increase in the collections of the Ceylon Turf Club, cinemas, carnivals, gambling dens and taverns. This wasteful expenditure in turn leads to the forming of false standards of living and an increase in crime in the country. New gambling dens will be opened, more drunkards will be on the streets, illicit arrack distilling will be on the increase—the police will have to cope with all these. This should not be taken lightly, especially because in Great Britain large food subsidies resulted in the release of large sums of money for football pools, gambling and drinking.

We are glad to note that the Central Bank has disapproved of subsidies. "From the economic point of view a widespread system of subsidies has a tendency to hide real costs, to distort the country's economy, and sometimes to act as a barrier to efficiency" (Central Bank Annual Report 1950). The fact that subsidies hide real costs may result in the consumer failing to realise the true cost of his essential commodities. This too leads to the forming of false standards of living.

Taxation

Increase in food subsidies has led to an increase in the taxation of exports. Export duties on tea and rubber have been increased by 15 cts. per pound and a new export duty of Rs. 2.00 per pound has been imposed on pepper. These export duties alone will bring Rs. 75,250,000 to the Treasury. Higher taxation of exports is justified in a boom period as Ceylon has experienced during the past months. But will this export boom continue? Rubber price has fallen from the zenith of Rs. 3.35 per pound to Rs. 1.75 (May '51) and the price of coconut has declined from Rs. 315.00 per candy to Rs. 190.00 (July 6, '51). It is very probable that this decline will continue further, and in the face of this decline it is unwise to increase taxation. The cost of food subsidies is yearly increasing; the money to finance it comes from taxation. An increase in subsidies

is an increase in taxation. But taxation may not prove a profitable source of income in a period of price decline. Higher taxation can be a deterrent to Ceylon's productive effort. Let it not be misunderstood that we oppose increased taxation. On the contrary we feel that the present taxation is fully justified and that export industries were lightly let off when their products were selling at boom prices. We are only arguing that if the prices of our exports decline further the Government might not be able to tax them without reducing the incentive to increased production. Assuming that the prices of exports decline still further, and the Government cannot tax them as they are doing today, then what new avenues are available for revenue? Probably it might lead to a budget deficit—a budget deficit which might have to continue for years.

Scarcity of Rice

Finally it must be noted that the Government cannot indefinitely hold down the cost of living index regardless of cost. Perhaps the best solution is a reduction in the cost of buying food both at home and abroad. But this is very unlikely. In fact the tendency is for world prices in essential commodities to rise still higher. The price of rice has increased in the past months. Burma has agreed to supply Ceylon with 300,000 tons of rice a year. Pakistan will try its best to supply Ceylon with 20,000 tons more. But the supply of both Burma and Pakistan are inadequate to meet the country's present demand. Burma and Thailand are expected to have good harvests only towards the end of this year, and rice is difficult to obtain from anywhere except from Egypt and Italy, and that too at exorbitant prices. Rice will thus remain a scarce commodity for some time. Rationing and subsidies will have to continue. There is no likelihood of the domestic supply of rice increasing immediately.

A Permanent Budget Deficit?

The Government's policies of full employment and increased social services will create a further demand for food. The increasing population—200,000 a year—too will need food. Rationing therefore might have to be permanent. No doubt, rationing is distasteful, but it is the only way of protecting the worker in a world of food scarcity. There is no hope of a reduction in food subsidies. The budget for 1950-51 allocated Rs. 42,000,000 for food subsidies; but now the Government is spending Rs. 133,000,000 a year on food subsidies. The Director of Food Supplies expects this to rise further next year; it is estimated that it may rise to Rs. 170,000,000. If rice continues to be scarce and coconut and tea too are taken into the subsidy

scheme, the cost to the Government might be still higher. The Government will have to run a budget deficit which will fan the flames of the present inflation.

The cessation of food subsidies on the other hand would lead to a sudden and sharp rise in the cost of living, severe hardships would fall on the lower income groups; there will be much discontent, demand for higher wages and strikes.

Higher Wages and Controlled Prices

The cessation of food subsidies should therefore be followed by an increase in wages. The wage increase must be so graduated that the lower income groups get more in proportion than the higher income groups, the motive being to alleviate the hardships of the former. Such a scheme is preferable to food subsidies which has the grave defect of benefiting all classes equally irrespective of income. It is interesting to find out what the Central Bank has to say regarding this—"The alternative to an extension of the system of subsidies is an adjustment to changes in living costs by permitting a rise in cost of living allowance" (Central Bank Annual Report for 1950). The Government's policy of increasing wages (dearness allowance) must be followed by private enterprise, for otherwise the Government employees would benefit at the expense of other workers.

An increase in wages by placing additional purchasing power in the hands of the people would aggravate the inflationary forces. It will also lead to the wages-price race which is another important source of inflation. But this inflation can be checked by an efficient system of price control. Price control may mean additional expenditure on administration—but it is the main weapon to check the wages-price race. The flexible wage policy of post-war Norway was a success because it worked in combination with price control.

"The available evidence then suggest that Norwegian wages policy has had considerable if not complete success in achieving its objects—that it has contributed to preserving stability of prices, and that it has helped to improve the living standards of the less well off groups. What have been the main elements in its success? An extremely important part has undoubtedly been played by the Norwegian price control system, which is unusually comprehensive and has been very strictly administered. The knowledge that official policy has been strongly against price increases except for virtually unavoidable causes, has checked the willingness of industrialists to grant increase in wages which could only be met by passing them to the consumer; and it has been one

of the principal factors, very likely the principal in preventing a wages prices race." (F. Inman in the Bulletin of the Oxford University Institute of Statistics, July and August 1950.)

The Central Bank Annual Report has recommended a flexible wage policy to the cost of living index. "A flexible wage system tends to make the Ceylon economy resilient and more readily adaptable to changing conditions of the outside world" (Central Bank Annual Report). A policy of flexible wages is to be commended firstly, because it keeps the real wages constant, secondly, because it makes the trade unions concentrate more on real wages than money wages and finally because "It brings about a widespread awareness of the dangers of inflation and the uselessness of increase in money wages which will soon be absorbed by rising prices" (T. Balogh). The important thing to remember is that the Central Bank's flexible wage policy will be ineffective in a period of prosperity without price control. Without price control such a policy will lead to a never ending wages-price race.

Conclusion

Subsidisation of the prices of rice and flour has brought down the cost of living index a little. But we can see no end to subsidies in a world of food scarcity. Food subsidies will increase in the future. This means that the Government has to run a budget deficit for an indefinite period of time if taxation of exports is not possible. This is unwise. Further subsidies have many disadvantages to which we have alluded before. The remedy is first a balanced budget and second the cessation of subsidies and an increase in wages in combination with price control. This prescription is not free from objections; but it is the best for a healthy economy at this juncture. Further this is only a short term solution. The long term solution is to increase food production.

(I am deeply indebted to the Director of Food Supplies who has supplied me with most of the statistics concerning food subsidies).

The Gal Oya Project and The Crisis of Agriculture

DR. S. A. WICKREMASINGHE

"Gal Oya has become almost a house-hold word. It is symbolic of the New Lanka. May it obtain fulfilment speedily and herald the progress of our march towards self-sufficiency."

With these words, Mr. D. S. Senanayake, the Prime Minister unveiled the commemoration pillar of the Gal Oya Scheme at Inginiyagala.

Mr. Senanayake spoke more truly than he knew.

The U.N.P. propaganda organs have worked overtime to make Gal Oya "almost a house-hold word" in the hope that this new clamour would make people forget the repeated failures of previous highly-publicised schemes.

Gal Oya is also "symbolic of the New Lanka." But it is not symbolic of the New Lanka which the people desire—a New Lanka of freedom and economic progress. It is symbolic of the New Lanka of the U.N.P. leaders—a Lanka where pious sermons on freedom and progress are used to cover a real protection of imperialist interests at the expense of the people of the country.

Public criticism of the Gal Oya scheme, however, has hitherto been concerned with the exploitation practised by the American contractors and with detailed questions of administrative waste, inefficiency and corruption. Very little attention has unfortunately been paid to the fundamental aspects of the scheme, with the result that Government propagandists have been able to confuse many people into thinking that, whatever its minor defects may be, the Gal Oya scheme does represent a positive benefit to the country.

It is the purpose of this article to challenge that assumption. It seeks to analyse the scheme, study its implications and assess to what extent it deals with the basic problems of irrigation and agriculture and can expect to fulfil Mr. Senanayake's hope that it will "herald the progress of our march towards self sufficiency."

As the Gal Oya scheme is principally an irrigation scheme, this article will confine itself to irrigation and attendant problems. It will not deal with the many other immediate and long-term

problems of agriculture, where the Government's failures have been just as disastrous, but which will require more space than this article permits if they are to be examined in essential detail.

1. Imperialism and the Crisis of Agriculture

Ancient Ceylon not only grew all the rice it needed for its own consumption, but has also been known to have had surpluses for export.

Twentieth Century Ceylon, however, has been continuously in the position of having to import two-thirds of its requirements of this staple foodstuff.

This fact alone is symbolic of the crisis of our agricultural system. Our forefathers had not the benefits of modern scientific discoveries or technological achievements. Yet they were not beset with the problems which overwhelm our latter-day rulers.

The modern failure of our agricultural system is not, as is sometimes alleged, due to adverse climatic conditions. The natural climatic conditions of the world have not altered appreciably during this period. Nor can it be stated that the natural climatic conditions of Ceylon are adverse for successful agriculture.

The mean annual rainfall in Ceylon (76 inches) is two and a half times that of the mean annual rainfall on earth (32 inches) Even our so-called "Dry Zone" has a mean annual rainfall of 72 inches, i.e., twice the mean annual rainfall on earth and two and a half times that of California. The historic landing place of Vijaya near Puttalam and the area near Hambantota of Dutugemunu fame are declared "arid zones," even though the rainfall in these areas is almost double that of Palestine, where some of the world's best orchards exist.

In recent years, it has become fashionable for Government apologists to seek to excuse their failure by placing the blame on "overpopulation" due to an increasing birth-rate. This has led to the grotesque spectacle of the Minister of Health advocating extensive birth-control and the Minister of Agriculture patriotic celibacy as the main means of helping the Government to solve the food problem.

It is the height of political bankruptcy for our Ministers to resurrect the reactionary economic doctrines of Malthus, which have long ago been exploded as being without foundation of fact.

Three-fourths of the entire land area of Ceylon is undeveloped; two-thirds of the entire land area, which is cultivable, is not used for cultivation; land tenure and cultivation methods are

so primitive that Ceylon's yield per acre is perhaps the lowest of all countries producing rice; and yet the Government has the effrontery to blame "over-population" for its own failure to maintain even the previously existing ratio of producing one-third of our requirements of rice.

It is clear that the main causes of the crisis of our agriculture must be sought elsewhere. The cause is not natural, but man-made. *The crisis of our agriculture is due to the havoc caused by imperialist exploitation of the lands of our hill country and the devastating immediate and permanent effects of the indiscriminate opening of plantations.*

Unlike the civilisations of the Indus, Amu Daraya, Euphrates or the Nile, which developed only along river banks, the ancient Sinhalese and Tamil civilisations were nurtured with the aid of a highly developed system of irrigation, which extended all over the "dry zone" plains and even in the mountains. The low country plains were irrigated by a system of large and small tanks, partly fed by the clear waters of the great rivers which maintained a fairly constant level in both dry and wet seasons and, more considerably, by water from perennial underground springs. Water absorbed by the soil in the high elevations drained through underground channels and formed into springs in the low country plains. This was augmented by the local storage of rainwater through a system of village tanks.

On such a basis, our ancestors, for nearly 2,500 years, irrigated rice fields on the mountains and in the vast plains of the low country. Irrigation of the hill country was made possible by terracing the slopes, maintaining adequate forest reserves and thus preserving the surface soil, that invaluable agricultural capital, and preventing the rivers from silting.

The introduction by the British of a colonial economy destroyed this basis of agriculture—the only basis on which a sound agricultural system could be maintained—by wholesale and indiscriminate destruction of forests and unscientific cultivation of tea and rubber. These imperialists were only interested in making as much money as possible in the shortest possible time, irrespective of the damage done to the country and its people. Within the short period of three quarters of a century, they brought Ceylon's agriculture and irrigation to a state of chaos and ruin.

It cannot be said that the imperialists were unaware of the results of their actions. From the very beginning they were warned about this, even by experts from their own country of origin.

In 1873, Thwaites, Director of the Royal Botanical Gardens, Peradeniya, made the following report to Government:

"It must have made itself painfully evident to many of the older residents of the Island that great changes have been brought about by the deforesting of land, particularly so in the central districts. From the deforesting has resulted much washing away of valuable surface soil which cannot be replaced, and which has found its way into the rivers.....injuriously interfering with native cultivation.

In 1895, Lewis, Assistant Conservator of Forests, in advocating the opening of a railway line to the Kelani Valley, gave his reasons as follows:

"River transport which has hitherto been one of the chief lines of communication between the Kelani Valley and Colombo was fast becoming impossible owing to accumulation of silt in the Kelani Ganga..... the increased area of land in tea is distinctly the cause for the silting of the river."

In 1916, another expert, Howard, reported:

"In the hill tracts in the centre of Ceylon, which is now covered with tea gardens, the original forest canopy was removed.....The loss of soil has been enormous and is still going on..... The agricultural capital of the island has been allowed to run to waste and can never be replaced by any system of manuring."

In 1925, G. D. Hope, Chief Scientific Officer to the Indian Tea Association, stated:

"In certain districts complete denudation has been reached, and during heavy rainy weather the rivers are running red all over the colony carrying away masses of the soil.....the hill sides will eventually not be able to grow anything at all."

In 1928, A. W. Hall, F.R.S., Director of the Royal Botanical Gardens, Kew, dramatically warned the Government:

"Your island seems to be slowly washing away into the sea."

Despite these repeated warnings, it was not till 1930 that a Committee was set up to consider the problem of soil erosion. The report of the Committee, published in 1931, though seeking to protect plantation economy, nevertheless was constrained to

make the following eloquent comment on the 1916 remarks of Howard, quoted above:

"The picture painted above is tragic enough but the devastating effects of soil erosion do not stop at internal destruction water is removed rapidly instead of being temporarily detained..... the flow of streams become irregular..... choking of irrigation channels and rivers, irrigation works destroyed by rush of water..... agricultural works below the eroded land ruined by deposition of sand and silt..... Damage to major and minor irrigation works..... flooding of roads necessitating additional bridges and culverts, enlarging of existing ones..... damage to railway lines and roads silting of paddy fields and silting of tanks....."

It is thus clear that it is the land-grabbing and reckless, unplanned introduction of plantation economy by Imperialism that is responsible for the two scourges of present-day Ceylon—flood and drought.

Floods, which have become almost an annual occurrence, have already caused tens of millions of rupees worth of damage to homes and property, not to speak of the permanent and irreparable damage to the land.

In the North Central and North Western Provinces, which together comprise about half the land area of the whole country, drought has become a permanent feature. The hitherto agricultural population has very largely to exist through work on ill-conceived and hastily-improvised relief schemes.

According to the report of a responsible Divisional Agricultural Officer, the total cultivable area under minor tanks in the N. C. P. alone is 79,000 acres. But of these, 49,000 acres are cultivated for one season only, while the remaining 39,000 acres are not cultivated at all. In the N. W. P. even the coconut plantations perished during the dry season, not to speak of paddy and other sensitive food crops.

Such have been the "benefits" of imperialist rule.

2. Failure of Government Schemes

In 1931, Mr. D. S. Senanayake became Minister of Agriculture. He held this post continuously until 1947, when, on becoming Prime Minister, he handed it over to his son.

During these 20 years, the Ministry of Agriculture has always received the major budgetary allocations. Not a single cent of the

hundreds of millions of rupees which Mr. Senanayake demanded for agricultural development was ever refused by either the two State Councils or the present Parliament.

Yet all this time and colossal expense have failed to make any appreciable change in agriculture, irrigation or food production.

The reason for this failure cannot be traced solely to inefficiency or negligence. *The failure stems directly from Mr. Senanayake's political policy of subordinating the permanent interests of the people of this country to those of imperialist vested interests, which he seeks to protect at all costs.*

Translated into agricultural terms, this policy has meant that Mr. Senanayake and the U.N.P. leaders have only been prepared to undertake agricultural and irrigation schemes which did not fundamentally conflict with imperialist plantation interests and those of the handful of big local capitalists who had wormed themselves into a subsidiary position in plantation economy.

This refusal to take action against imperialist vested interests, the main cause of our agricultural crisis, is the reason for the continued failure of all Government attempts to deal with the basic problems of our agriculture.

How did Mr. Senanayake attempt to deal with the problem of floods?

The nationalisation of big foreign-owned and other estates in the upper reaches of almost all Ceylon's rivers was obviously unthinkable to those who constituted the government of this country. Urgent and effective reforestation and conservation of soil and water in these regions could not be undertaken without major damage to imperialist vested interests.

Mr. Senanayake therefore evolved the scheme of building massive bunds in the lower reaches of rivers for protection from major floods. These schemes had, however, to be abandoned even before they could be started because experts were of opinion that bunds adequate enough to cope with the volume of water from major floods, could not be constructed without, in some instances, a foundation 60 to 70 feet below ground level and a superstructure whose height could not be determined owing to the ever-increasing flood level.

When these schemes were finally abandoned, Mr. Senanayake advised the people to reconcile themselves to the inevitability of major floods and their resultant devastation. He then launched protection schemes against minor floods. Such were the Nilwala Ganga and Gin Ganga schemes and the schemes for the protection of the towns of Ratnapura and Gampola.

After the spectacular fiasco of the one-million-rupee Nilwala Ganga scheme, which had to be abandoned even before it was completed, it became obvious that something was going wrong with even these minor flood protection schemes. In 1947, at the request of the Ceylon Government, the Crown Agents specially sent out Mr. E. V. Richards, an expert on flood protection and water conservation, to report upon these schemes. His report, which was published in 1949 but which was available to the Government even before the Gal Oya scheme was launched, roundly condemned these minor flood protection schemes.

(1) On the construction of bunds, he says: "We consider that any scheme which involved the passing of a large volume of water over unprotected earth bunds is not sound."

(2) On the improving of river outlets, he says: "Until some further action has been taken to reduce excessive soil erosion which occurs in the upper reaches of this and other rivers, there appears to be little purpose in suggesting the removal of the sand banks from the lower lengths."

(3) The proposal to construct massive bunds to prevent the flooding of Gampola and Ratnapura is dismissed as impractical and undesirable. The proposal to improve the Mahaveli Ganga channel below Gampola by widening the Peradeniya gap only produces the biting comment that this method of increasing the discharge rate of flood waters in order to lower the flood level at Gampola is not certain of successfully protecting Gampola but it is certain to cause much more havoc and devastation to the villages below Kandy and Gampola.

It is refreshing to note that Mr. Richards has preferred scientific objectivity to the sickening sycophancy which characterises the reports of literary charlatans or self-appointed "experts" of the Gal Oya Board.

Mr. Senanayake's irrigation-cum-colonisation schemes, when considered in the context of his scheme for achieving self-sufficiency, have been as tragic and costly disappointments as his flood protection schemes—and for the same reason.

The much-publicised Minneriya and Parakrama Samudraya schemes have already over-reached saturation point with the opening of mere 20,000 acres in about 20 years. Already the total water supply is inadequate to irrigate even these 20,000 acres owing to the drying-up of underground springs and the low water level of the Amban Ganga in the dry season consequent on the lack of water conservation in its upper reaches in the plantation-covered Matale hills. During the current Yala season,

the colonist of Polonnaruwa, who receives a field allotment of five acres only, has by Government regulations to confine cultivation to two and a half acres owing to the lack of water in the Parakrama Samudraya.

In the Kalawewa-Yoda Ela scheme, which was started in 1900 and irrigates about 15,000 acres, repeated crop failures have taken place during the last few years due to insufficient water in the Kalawewa. A similar fate has overtaken the Walawe Ganga Left Bank—Ridiyagama Tank scheme. Every other major and minor tank in the Dry Zone—e.g., Tissamaharama, Wirawila, Kantalai, Giant's Tank—dries up almost completely in the dry season.

Thus it will be seen that any attempt to solve the problems of irrigation and water conservation which does not propose drastic measures against imperialist vested interests in tea and rubber in the hill country is doomed to failure even before completion.

3. The Gal Oya Scheme

Undaunted by his previous failures, Mr. Senanayake has now launched upon his biggest project—the Gal Oya Scheme.

The main features of the scheme are simple. The Gal Oya is 70 miles long. It takes its source "from the central mountains where lie the tea estates of Dehigala, Roberry, Ele-mana and Dunedin" (Department of Information). These hills rise to a height of 5,000 feet. At a point 40 miles from its source, where the elevation is 140 feet above mean sea level, an earth dam has been constructed, 3,600 feet long and 154 feet high, in order to convert the main channel into a reservoir. Water from this reservoir will be used to irrigate paddy fields by means of irrigation canals.

This scheme has also been described as "multi-purpose scheme." That is to say, a hydro-electric plant is being constructed capable of yielding about 8,000 kilowatts. It has been claimed that this project will be a flood protection scheme as well.

When completed, the scheme is estimated to cost about Rs. 600 million. The construction work on the dam alone has cost about Rs. 80 million up to date. It is claimed that the reservoir will be capable of irrigating 30,000 acres for two crops, in addition to 33,000 acres which are even now being irrigated by 14 anicuts and 4 minor tanks.

The Gal Oya flows through an area rich in history. It begins in the land of the Uva Uprising against Imperialist domination. Its upper basin lies in the Wellassa, the "land of a hundred thousand fields," where even to-day the neglected and devastated remains of an ancient system of anicuts, channels and tanks can be found. In its middle reaches is located the ancient irrigation scheme called Maha Kandiya and described in the *Maha Vansa* as Diga Vapi, or long bund. The Pellang-Oya dam is another ancient irrigation scheme of this region. The upper and lower basins of the river contain an extensive network of tanks, now in shameful neglect.

The British imperialists followed up their savage reprisals against the uprising in the Wellassa, in which whole villages were burnt and their inhabitants driven into the jungle, by deforesting the upper reaches of the river and opening tea and rubber plantations. This brought about the decay of the entire irrigation system of the upper and middle reaches, with the result that the population of the upper reaches have to eke out a precarious livelihood from rainwater cultivation in the short-lived wet season and by chena cultivation throughout the rest of the year. In the middle reaches, where rainfall is even less, the population has to depend entirely on chena crops and hunting and are euphemistically known as Veddahs.

It is difficult to say exactly what consideration was uppermost in the mind of the U.N.P. leaders when they decided to launch this project when they did. It was apparent that they were looking for some super-scheme which in the proclaimed magnitude of its aim and the actual magnitude of its cost would dazzle the people sufficiently to make them forget 20 years of repeated failures. There is equally little doubt that the Gal Oya was selected for this experiment because it was hoped that this river would not present to any appreciable extent the problems and difficulties which plantation economy had imposed upon all the other major rivers of Ceylon. The extent of plantations through which the Gal Oya flows in its upper reaches is less than that of any other major river. Its middle reaches are covered by an extensive jungle belt. If any area was suitable for an irrigation scheme without any adverse effect on imperialist-owned plantations, this was it.

Whatever the reason, the fact remains that the Gal Oya project was undertaken with the maximum of haste and the minimum of care. An American expert, Dr. Savage, was imported for a flying visit and, on his apparent recommendation, a contract was signed, on most unfavourable terms, with an American firm for the construction of a dam at Inginiyagala in

the lower reaches of the river. No hydrological data had been collected in the vast region of the Gal Oya basin above the dam. No scientific investigations were undertaken regarding soil fixing, reforestation of patnas or geological lay-out.

The social consequences of this refusal to disturb the property rights of imperialist planters have been enormous. In order to bring 30,000 acres under paddy cultivation, an area of 20,000 acres is to be inundated. Over 4,000 people are to be evicted from this area by the autocratic decree of the Gal Oya Development Board to whom they are only primitive Veddahs, even though they have for many years participated in the local administration of four Village Committee areas.

While refusing to reforest the areas under plantations, the Government seeks to prevent soil erosion by stringent measures against the far less harmful system of chena cultivation. Thousands of the village populations of Medagama Wasama, Nikeweti Korala, Nilgala Wasama and Dambagalla Korala have been prohibited from engaging in chena cultivation, their main source of livelihood. As far as these areas are concerned, the scheme for opening 30,000 new acres for cultivation in the lower reaches of the river has meant the effective stopping of all food production over an area of almost 250,000 acres.

The completion of the entire Gal Oya project is estimated to take about 20 years. Whether it will, at the end of this period, be capable of fulfilling its stated objects is open to serious question. While anonymous scribes in the newspapers seek to allay public doubts by airily proclaiming that appreciable silting will not take place for 5,000 years, this easy optimism is not shared by soil erosion experts. I myself have ascertained from an authoritative and unimpeachable official source that Dr. Gorrie, the Government's soil erosion expert, has expressed the opinion that the Gal Oya reservoir will be badly silted within 20 years and its efficiency gravely impaired. The belated and frantic attempts now being made to introduce legislation to conserve water and provide safeguards against soil erosion in the catchment area are an indication that even the Government is beginning to entertain serious doubts on this question.

The Gal Oya Basin could have been developed to benefit the entire people in both the upper and lower regions of the river and, at the same time, make a great contribution towards the attainment of self-sufficiency in food for the whole country. The first step is the reforestation of a large section of the tea estates in the upper reaches and of the patnas as well. A series of reservoirs should be created by damming the multiple streams of the river in its upper reaches. The ancient system of irrigation

of the entire basin should be restored and utilised. Such a scheme will control the floods in the lower basin and provide more than sufficient water for irrigation, without the colossal and wasteful expenditure of building a single massive bund in the lower basin.

Even a layman who is familiar with the topography of this region will know that the Gal Oya takes its source from the same mountain region as the Kumbukkan Oya, which enters the sea near the boundary of the Eastern and Southern Provinces. Water conservation in the upper reaches of the Gal Oya could easily be combined in a single scheme with water conservation in the adjacent upper reaches of the Kumbukkan Oya to provide irrigation for the vast area of Buttala and Wellassa. The full development of the upper and lower basins of both the rivers in one large scheme can develop an area of about 2,000 square miles, instead of the 200 square miles which is the ultimate aim of the American "experts" and the satellite Gal Oya Board.

• The social benefits of such a scheme would be immense. The villagers, now dependent on hunting, chena and occasional rain-fed paddy cultivation, can become a prosperous and expanding community growing rice and other essential and commercial crops. Cheap hydro-electric power and pipe-borne water will facilitate the development of industries and towns. The Gal Oya itself will become navigable to river boats for about 40 miles.

Instead of this, the Senanayake-American scheme aims at eliminating this historic river from the map of Ceylon and forcing the people who have for generations inhabited the upper basin to evacuate the area. On the advice of the American "expert", Dr. Savage, Mr. Senanayake, who has urged repeatedly the importance of restoring ancient irrigation systems, and Mr. R. L. Brohier, who has made a life-long study of these systems, are today shamelessly eliminating all traces of the ancient irrigation works of this area.

When the history of Gal Oya is finally written, it will be found that it is not the people of Ceylon but the American experts and contractors who have benefited from it.

This is already being officially acknowledged. Plans are already being made to alienate even such limited gains as may be made from the Senanayake Gal Oya scheme to American capitalists. As the official report of the Department of Information states, when dealing with the possible development of a sugar industry in this area:—

"It is possible that the responsibility of nursing such an industry would be greater than the Gal Oya

Development Board can be expected to undertake, in addition to its other duties. Therefore the general view is that a Ceylon Corporation should be formed for the purpose based on inviting investors from foreign countries to find half of the capital....."

4. A Soviet Multi-Purpose Scheme

It will be interesting to compare the Senanayake-American Gal Oya scheme with a similar scheme in another Asian country—the Soviet Republic of Turkmenia.

Such comparisons are all the more important as the U.N.P. propagandists are using the Gal Oya Project to create a myth of American technological superiority and thereby re-inforce the present policy of subservience to the U.S.A.

The official report on Gal Oya, for instance, seeks to maintain that it is only in America that the necessary equipment and power plant can be obtained:—

"It is not thought that there is an available source outside the United States for obtaining the necessary construction equipment, nor is it expected at this time that there will be any other source for obtaining power plant equipment. Hence both of these types of plants will have to come from the U.S."

The Soviet irrigation scheme, which I wish to compare with Gal Oya, is taking place in the Soviet Asian Republic of Turkmenia. In 1918, when they were liberated by the Russian Revolution from centuries old oppression, these Muslim people were in such a backward state that they had no written language. They were, then even, more backward than the so-called "Gan Veddahs" of the Gal Oya basin. Today, with the help of the entire Soviet people, they have progressed so rapidly that their scientists and engineers are capable of launching the biggest multi purpose scheme in the world, several times the size of the much publicised Tennessee Valley scheme in the U.S.A.

The scheme is concerned with the Amu Darya river, which rises in the Pamir Plateau on the borders of Kashmir and flows through the Kara Kum desert regions into the Sea of Aral, a distance of a thousand miles. Mention of this river is made in the Jataka stories connected with incidents in the life of the Bodhisatva. What is now desert once cradled an ancient civilisation.

The scheme consists in building within 5 years a 700 mile long canal (the longest in the world) from the Sea of Aral to

Krasnovodsk, the big port on the Caspian Sea. The Amu Darya river, which now flows uselessly into the Sea of Aral, will be completely diverted into this canal by means of a dam at the river mouth. The famous maxim of Parakrama Bahu that not a single drop of water should be allowed to run into the ocean without being put to use is being put into practice in the Soviet Union even though it has been rejected in this country by those who claim to be his reincarnation.

By means of 800 miles of irrigation canals and 600 miles of pipe lines, this scheme will irrigate a now desert area of 31,000 square miles (greater than the entire area of Ceylon) and make it fit for cultivation. The diversion of the river will lower the water level on the Sea of Aral by about 20 feet. The fertile Amu Darya delta, now covered by sea, will be reclaimed and 750,000 acres of the delta will be irrigated for rice and cotton cultivation.

The main Turkmenian canal will provide 3 hydro-electric stations with an aggregate of 100,000 kilowatts. Water will be pumped into reservoirs to irrigate the higher elevations. Planting of forests, fixing of sands, fish culture, livestock farming and many other industrial and agricultural enterprises are essential features of this enormous project. Plans are already completed to grow the highest quality long staple cotton, superior to Egyptian cotton, and to develop a textile industry.

The development of inland water transport is another aspect of the multi-purpose character of this scheme. The river bed will be deepened and the water level raised. The rate of flow will be controlled, flood damage prevented and the river channel developed for water transport. The Turkmenian canal will also be made large enough to be navigable. Special river-boats with hydro-electric diesel units have already been constructed to navigate the Amu Darya, the canal and the Caspian sea right up to the borders of India.

Similar gigantic multi-purpose schemes are now being constructed along the Volga, the Don and the Dneiper. They will irrigate the vast Ukranian and Crimean steppes and the deserts of the Caspian area. In the Volga region alone, 30 million acres will be irrigated in 5 years.

Under these multi-purpose schemes now under construction in the Soviet Union four times more land will, in 5 years, be irrigated than the U.S.A. has managed to irrigate within the last 100 years.

The much-advertised power projects of the Tennessee River have been under construction for the last 35 years and have not yet attained their projected capacity. The builders of the Dneiper Dam in the Soviet Union will break their own record and complete the Volga Project within 5 years. The new hydro-electric stations will have an aggregate capacity of 4,220,000 kilowatts.

The new irrigation works of the Soviet Union aim at turning deserts into fertile fields. In the U.S.A., despite the advice of experts so freely imported and believed by the U.N.P. government, an average of 8,000 acres per day are going out of cultivation due to soil erosion.

The official scribes who tell us that it is only from the U.S.A. that necessary construction machinery can be obtained and who go into ecstatic rhapsodies over the relatively commonplace machinery used by the American contractors at Gal Oya are either abysmally ignorant or deliberately dishonest about the plant and construction equipment now in use in the Soviet Union and exported to hitherto under-developed countries like China, Bulgaria and Rumania.

In 1950 alone 50 new machines were invented for agriculture. For digging wells in Kazakhstan a new machine has been supplied to the farmers. In one day this machine digs a well 100 feet deep and 4 feet in diameter, simultaneously fitting the walls with rings of ferro-concrete.

An excavator called the "Walking Excavator" has been invented. It is about 180 feet long and weighs 1,200 tons. The engines of the Excavator generate 7,000 kilowatts *i.e.* almost the amount generated by the entire Gal Oya hydro-electric scheme (8,000 kilowatts). This excavator can scoop about 15,000 cubic metres of earth in a day. It is operated by one person and moves forward automatically in the fashion of a person walking. One half of the huge plant raises itself and propels forward and then the other half follows it. This remarkable plant was exhibited at the recent International Exhibition at Milan. So the U.N.P. leaders and their agents cannot plead ignorance due to an "iron curtain."

Irrigation construction has been revolutionised by applying the new principle of hydro-mechanisation of earth-moving works in the digging of canals. Suction dredgers are used and the earth removed in the form of liquid mud through hose-pipes to a distance of about one and a half miles. The suction dredgers now operating on the Volga scheme alone do the work of 50,000 workers.

It is clear from this that it is not to imperialist America but to the Soviet Union that Ceylon must look for inspiration, advice and technical assistance in its multi-purpose irrigation schemes. Already the Soviet Union is assisting Bulgaria, Albania and Rumania in the construction of such gigantic multi-purpose schemes. The effect of Soviet aid given to Liberated China can be seen from the fact that *within one year* China has been turned from a land of scarcity and famine into a country which not only now produces enough food-grains to feed the biggest nation in the world but is also able to export one million tons of rice to famine-stricken India early this year.

Any real solution of our agricultural crisis, therefore, involves a policy not only of stringent action against imperialist vested interests in this country but also a policy of firm friendship and alliance with the Soviet Union.

5. The Way Out of the Crisis

The crisis of Ceylon's agriculture has gone too deep for a solution to be sought only in technical terms. It has firstly to be sought in the field of political action.

The U.N.P. leaders not only protect the imperialist vested interests in the plantations but also try to dupe the people into believing that their welfare depends on the continuance of these interests.

Mr. Senanayake, publicly rejecting at a U.N.P. conference the demand for nationalisation of the big estates, told his countrymen: "We must not kill the goose that lays the golden eggs."

The former labour leader, Mr. A. E. Goonesinha, no doubt influenced by his recent conversion to Moral Rearmament, has publicly apologised to the planters for his past attacks upon them and declared that he had now attained "enlightenment" and was able to appreciate the great benefaction conferred upon the people by the foreign imperialist exploiters in opening rubber and tea plantations.

The Minister of Food, Mr. Ratnayake, not to be outdone, seeks to invest imperialist exploitation with spiritual sanction and exhorts his followers to worship the tea bush.

How different is this rosy picture from the cold facts of devastation and havoc presented by experts in official reports.

The first task in solving the crisis of agriculture is, therefore, the political defeat of Imperialism and its U.N.P. supporters and the coming to power of a government which will not flinch from the supreme national duty of nationalising imperialist property and establishing close and friendly relations and alliance with the Soviet Union and the progressive forces it leads.

Any scheme which such a government undertakes to solve the problems of agriculture must begin with the reforestation of large upland areas which are unsuitable for planting with tea and rubber as a permanent cultivation. Mr. Dudley Senanayake's proposals for stream reservation are utterly inadequate and will not touch even the fringe of the problem as three-fourths of the rivers that drain the entire island have as their source of supply tea and rubber estates on the hills and uplands. Reforestation, not cover crops and other patchwork devices, is the natural form of soil and water conservation.

Artificial water conservation must be undertaken by means of reservoirs in the upper reaches of every river, which will control the rush of flood water, provide hydro electric schemes, pipe borne water supply for industry and agriculture and a perennial water supply for irrigation of the highlands and the entire "dry zone."

After effecting control of flood water and prevention of soil erosion and silting, the dredging of the upper and lower reaches of the rivers will enable the development of water transport. This is not only the most economical form of transport but will, in addition, enable us to free ourselves from the grip of American oil monopolists.

The cutting of a great irrigation canal from Trincomalie in the North, and the East coast to Puttalam in the West and Jaffna in the North, and the building of a big dam in the lower reaches of the Mahaweli Ganga can divert the entire volume of water, now passing into the sea, into the dry zone through this canal. It will feed the big and small tanks in the dry zone and create large natural fresh-water lakes by filling the lagoons in Jaffna and elsewhere with fresh water. This and other dams will enable the building of several hydro-electric stations for industrial development, the pumping of water to higher elevations and the draining of water from swamps.

If the big rivers flowing through the wet zone are connected by a system of canals and dams with the rivers in the dry zone, the water-level in the latter can be increased. This will supply a plentiful supply of water to the big irrigation tanks in the dry zone and, in addition, provide a net-work of canals for transport.

There is no need to fear that the reforestation of hill-tops will destroy Ceylon's present principal export industry—tea production. By adopting the Soviet method used in the tea gardens of Georgia, where tea is grown only in those areas where soil erosion can be avoided and scientific cultivation used to obtain maximum yields. The highest average annual yield in Soviet Georgia is about 17,000 lbs. of green tea per acre, while in Ceylon the highest average is about 4,000 lbs.

Such a plan for irrigation will also enable the development of live-stock farming, fish culture, cotton and sugar cane cultivation, orchards and the raising of other crops besides paddy. The development of industries run on hydro electricity and based on raw material grown under the irrigation schemes will affect the necessary change-over from our present complete dependence on a rapidly deteriorating tea and rubber economy. A pipe-borne water distribution system can also be provided for the domestic and industrial needs of the entire Island.

Such schemes are not utopian visions. They are being actually put into practice in countries not far away from us where imperialism has been ended and the people rule. To the imperialists and their friends such schemes are a terror for they strike at the very basis of their existence. But to the masses of people, they are an inspiration of what the power of the people and the path of peace can achieve. It will not be long before our people can also say, as the Soviet people proudly and confidently say to-day:

"Only man-haters, only obscurants can say that the earth is incapable of feeding its population, that sterilisation and birth restriction are necessary. All that is needed is to develop it in the interests of all the working people, to exploit its reaches rationally instead of rapaciously."

Exchange Control in Ceylon

J. A. LEEMBRUGGEN

1. Historical Background

In this article, I shall try to trace the history of the Ceylon Exchange Control up to June, 1948. Up to this date we were administering our control merely as a member of the Sterling Area. Ceylon's own requirements, in relation to her external finances, were not the criterion for determining her actions under exchange control. It is appropriate therefore for me, in tracing the development of the Ceylon Exchange Control during this period, to lay emphasis on the economic and financial relationship between the Sterling Area as a whole, particularly the United Kingdom, with the rest of the world. Readers may find some of this background unnecessary because they probably have a fair idea of such recent history, but I think it is desirable to indicate the problems of exchange control during this period in relation to this background.

Before proceeding further, it may be useful for me to explain in very general terms what the term Exchange Control means. Ceylon has certain assets abroad. The Ceylon Government, the Central Bank, the Commercial Banks, and some trading concerns and individuals hold assets abroad. These assets may be held in the form of securities, cash balances, property and so on. In our financial relations with the outside world we are all the time causing changes in the level of these assets. When we sell goods or services abroad, or when we receive dividends and interest on our investments abroad, our assets are increased. They can also be increased if we borrow abroad. On the other hand, when we buy goods or services or when we pay out interest and dividends on investments held in Ceylon by non residents, our assets are reduced. From this it will be seen that if we start on a given date with a certain value of assets held by us abroad, and if between that date and a given date in the future, certain transactions involving receipts and payments take place, the change in the assets between the two dates will be determined by the margin between receipts and payments. This is, of course not always true. The value of the assets themselves may change. But apart from this contingency, this may be taken as a reliable generalisation. The primary function of an exchange control would, therefore, be to restrict the payments outwards in such a way that they bring about a desired change in the level of the external assets or keep it steady. This then is the first function of control, namely, to place a curb on outward remittances.

I said earlier that the assets held by this country may be those of the Government, the banks and private firms and individuals. If a control can keep track of the assets of all private firms and individuals, the restriction on remittances will be about the only main function of the control. Unfortunately, there are grave practical difficulties in attempting to keep a check on the transactions of private individuals which affect the assets which they hold abroad. Consequently, it is necessary to canalise all the transactions of private firms and individuals through the banks. There are two good reasons for this. Firstly, by doing so we mobilise the foreign resources of the country and concentrate them into the hands of a few so that they can be available for use in an emergency. Secondly, by reducing the amount of privately held assets, we make it easier from an administrative point of view to control transactions which have the effect of reducing our assets, viz., outward remittances. In order to achieve this, the control is obliged, as a second function, to ensure that all inward receipts which bring the country foreign currency are routed through the banks, who in turn pay the local recipient in Ceylon rupees.

A third function which the control performs is to ensure that the assets of the country abroad are held in a sufficiently liquid form to enable the country to draw on them for its current needs. These are the three main functions of the control. This is not to say that it does not perform a variety of other functions. But these latter can generally be traced to these three. It will be noticed that I approach the question from the point of view of the assets which we hold outside Ceylon. What about the assets which non-residents hold in Ceylon? Do they not constitute a liability by us to non-residents? They do, and the question of an increase or decrease in these liabilities is of vital interest to us. The emphasis in Ceylon is, however, more on the assets we hold abroad because the Ceylon rupee is not a currency which has hitherto entered much into international financial transactions. It has been the practice in the past, and still continues, for our transactions with the outside world to be settled almost entirely in foreign currencies. Foreign banks and governments hold comparatively small rupee balances in Ceylon. The financing of transactions cannot, therefore, be looked at from the point of view of an increase or decrease in those balances. The emphasis is rather on the effect of these transactions on our external assets. In the case of a country like the United Kingdom which acts as banker for many other countries, the impact of a protracted adverse balance in her payments can to some extent be cushioned by an increase in the sterling balances of non-residents, before the drain on her foreign reserves and gold begins.

Exchange Control was introduced in Ceylon as an emergency measure on the outbreak of war in 1939. The initial measures were confined to restrictions on dealings in foreign exchange and gold and on the export of currency, gold and securities. The first step was to appoint the commercial banks as authorised dealers in foreign exchange and gold, subject to certain conditions under which they were bound to operate. The regulations prescribed that no person could make a payment directly or indirectly, or make any promise to make a payment, to any person residing outside the Sterling Area. The banks were entrusted with the task of seeing that this was carried out and a permit system introduced under which payments could be made for approved purposes. Approved purposes naturally included payments for licensed imports and services and for most current commercial transactions. Imports were controlled under the Import Control Regulations and licences issued on the basis of essentiality. The restrictions imposed on voluntary payments, such as for maintenance of dependants outside the Sterling Area, were however very strict. Transactions of a capital nature were at first permitted; but within a short time, when it was found that they contributed to a black market in sterling, they were suspended. It will be noted that these restrictions were only on payments directed outside the Sterling Area, which at that time consisted of all the countries in the British Empire, excluding Canada, New Foundland, Hong Kong, British Honduras and Sudan. The second restriction, namely, on the export of currency, gold, securities, etc., did not differentiate between Sterling Area and non Sterling Area currencies nor between Sterling Area and non Sterling Area destinations. The reason for this was that these instruments, being negotiable abroad, and encashable outside the Sterling Area, became a potential vehicle for the transfer of capital outside Ceylon. It would be most difficult to ensure that a person travelling from Ceylon to, for example, the United Kingdom, did not step ashore at a non-Sterling Area Port en route and dispose of any currency and other negotiable instruments in his possession, leaving it to his credit. It was, therefore, necessary to apply the restriction irrespective of the destination of the traveller. An exemption was, however, made permitting any person to send by post or take out of Ceylon foreign exchange not exceeding the equivalent of Rs. 200/-.

These measures were taken by the Ceylon Government in conformity with an assurance given by it to the British Government that it would, at the outbreak of war, impose in Ceylon regulations designed to conserve the exchange resources of the Empire on a scale no less stringent than those introduced in the U.K. We acted in line with all other countries in the Sterling Area. All financial transactions within the Sterling Area were

free of restrictions. The Sterling Area, therefore became a single monetary area and all its earnings of foreign exchange were pooled together in London. The expenditure of foreign exchange by each individual member of the group was met out of the common pool. As a member of the group, Ceylon also undertook to follow a common policy of conserving exchange both by supervising its receipts and by controlling its expenditure. By prohibiting transactions in foreign currencies except by the Bank, we ensured that all transactions were done through banks who were thus enabled to turn over to the Bank of England, which acted as the Manager of the central pool, all surpluses of such exchange.

The second step taken was to introduce a regulation making it compulsory for all residents in Ceylon to surrender to the Controller of Exchange all gold coins and bullion in their possession. The gold so collected was originally sold in the U.S.A. and the dollar proceeds turned over to the Bank of England, but later it was sold to the Reserve Bank of India, in view of the difficulty of shipping it to America. This regulation was rescinded in 1943 due to the decline in the offers of gold. Gold coin and bullion to the value of approximately Rs. 1,975 million was purchased under this regulation.

The next step was designed to mobilize receipts of foreign exchange to prevent earnings of foreign exchange being held by individuals or by firms. A regulation was introduced under which certain currencies were specified, which made it obligatory on the part of all persons who held these currencies to surrender them to the Control in return for Ceylon rupees. At the same time a regulation was introduced which provided that exporters who shipped goods to certain destinations should receive payment in the foreign currencies relating to those destinations. The currencies chosen at the outset were U.S. dollars, Canadian dollars, Belgian francs, Swiss francs, French francs, Dutch guilders, Argentine pesos, Swedish kroner and Norwegian kroner. A difficulty in implementing this regulation was immediately apparent, namely, that most of the export trade of Ceylon was negotiated through London and consequently it was impossible for the exporters to receive payment in these currencies. This difficulty was surmounted under an arrangement whereby the Ceylon Control and the London Control worked in liaison to ensure that either the Ceylon exporter or the intermediary in London received payment in the appropriate foreign currency. With the progress of the war, financial agreements were made by the U.K. Government with many countries concerning the regulation of sterling accounts held in London by those countries and it was progressively possible to amend our regulations to provide

for payment either in sterling from these accounts or in the appropriate foreign currency concerned. It also became necessary from time to time to add to the list of specified currencies.

It was not long before the demands of the war began to have a serious effect on the foreign exchange reserves, particularly the dollar reserves, of the commonwealth. Both the diversion of man-power from the export industries to the armed forces and the need to purchase war material in the dollar area contributed to a rapid decline in the dollar reserves of the U.K. It was necessary, therefore, for the U.K. to introduce a regulation which compelled all its residents to register their holdings of foreign securities and prohibit the disposal of these securities in any way. Further, powers were taken to compel the surrender of securities denominated in certain currencies, for example, U.S. and Canadian dollars. The requisitioning by the British Government of these securities and their sale in America provided a temporary supply of dollars for war purposes. In Ceylon, we introduced similar regulations but it was not found necessary to requisition any of the securities held by Ceylon residents. The scope of the regulations in Ceylon was later enlarged to provide a control over transactions in Ceylon securities held by persons resident outside the Sterling Area. This had two purposes, namely, to prevent enemy persons who held such securities from realising them by sale to persons in neutral countries, and also to restrict the withdrawal of capital invested in Ceylon by persons resident outside the Sterling Area. A further function was taken over by the Exchange Control which does not really belong in the sphere of such a control. This was a restriction on the floating of new companies in Ceylon with a capital in excess of Rs. 100,000. The Control was charged with the duty of seeing whether there was a genuine need for the flotation of a company. If the operations of the proposed company were considered essential the investment was allowed. The purpose of this particular piece of legislation was to ensure that capital was not tied up in the non-essential industries at a time when all funds were required for investments connected with the war effort or with maintaining the basic requirements of a war economy.

I stated earlier that transfers of capital were practically prohibited. But though the actual transfer might have been prevented, the control could not always prevent change of ownership. People have an unfortunate habit of dying, for instance, and leaving their money to non-residents. To meet this type of situation a system of blocking was devised. Under this system it was possible for money which was due to a person resident outside the Sterling Area but which could not be remitted

to be credited to an account known as a Blocked Account, and opened at a bank. This was preferable to leaving the money in the custody of a private individual where the Control could not have effective supervision over it. Supervision was necessary to prevent what was known as a compensation deal, i.e., a payment made in Ceylon between two persons as a consideration for a similar payment made abroad between two persons. The blocking arrangement ensured that the money due to the non-resident was placed in a bank and could not be used except with the authority of the Control. It also secured for the person in Ceylon who had to make the payment a legal discharge of his obligation. Blocked funds could if required be invested in approved securities, an approved security being a Government security not redeemable within 10 years. They could not, for example, be invested in private mortgages.

The last exchange control measure which was found necessary arose at that stage of the war when the Germans were beginning to overrun Europe. Large quantities of sterling notes fell into the hands of the Germans and it became the concern of the Sterling Area to see that those notes did not find their way into the Sterling Area. Person entering Ceylon were not allowed to bring in more than £10 in sterling notes. It is interesting to note here that though this restriction was placed for the limited purpose of preventing the notes returning into circulation in the Sterling Area, it has continued to remain as a permanent feature of the Control. Currency notes have always provided a loophole in the machinery of any control. For example, sterling notes have at various times been in common use on the Continent and persons going out of England have succeeded in smuggling large quantities to the Continent notwithstanding restrictions on the export of these notes. Now, persons outside England will not accept sterling notes unless they have means of obtaining value for them. The normal means of obtaining value for a foreign note is to tender it to your bank. But a bank will not accept it unless it can dispose of it either by sale to somebody else or by repatriation to the country of issue. Repatriation to the U.K. of sterling notes was and is still not permitted. If, however, travellers were allowed to bring in sums without restrictions, there would always be a convenient method of disposing of these notes on the Continent, namely by sale to persons going to England. It has been found necessary therefore to restrict the amount which person coming into England can bring; and the more effective this restriction, the more difficult it will be for sterling notes smuggled out of England to be disposed of abroad. Its value will therefore fall abroad making the proposition less attractive to those who smuggle the notes out of England. For this reason the restriction on the import of sterling notes into the Sterling Area has been maintained.

We in Ceylon found it necessary to restrict in the same way the importation of Ceylon currency notes into the Island when we began to control exchange transactions with India. I might add that the same type of restrictions were applied in most other countries during the war, even in U.S.A. and the Latin American countries.

I have I think covered the main features of the Exchange Control. It existed in this form during the war and up to June 1948. The control was probably at its tightest in 1941 prior to the entry of the United States into the war and inauguration of Lease-Lend and Canadian Mutual Aid. With these means of bolstering up the financial position of the Sterling Area it was possible for relaxations to be made within the framework of the Control. The system of sterling accounts of non-Sterling Area countries was gradually being simplified in London. Three main types of Sterling accounts emerged. In the case of "Special Account" countries, payments by residents in the Sterling Area to the country concerned were effected by credits to a special account maintained in that country for the purpose. A second type was the Registered Account, applied to American, Canadian and Swiss Accounts. A feature of these accounts was the guarantee of convertibility to the currency of the country concerned at a fixed rate of exchange. The third type was known as the "Sterling Area Account" a type of account meant for financing the minor expenses in the Sterling Area of the account holders. Relaxations were possible in certain types of capital transfers such as the redemption proceeds of securities denominated in sterling area currencies. It was also easier for non residents holding sterling area securities to switch them from one type of security to another though it was not possible for them to sell these securities and repatriate the proceeds. With the next stage of the war, namely, the re-occupation of countries in Europe which had been occupied by the Germans, the Control began to be faced with a number of problems arising chiefly out of the movement of refugees from one country to another, and the return to Europe of persons normally resident there, who had come to the sterling area for the duration of the war. It was always necessary in these highly complicated times to bear in mind the danger of monies going to the enemy through persons in neutral and re-occupied countries. With the enemy on the run, travel also became less dangerous and many people who had deferred plans for moving from one country to another during the course of the war began to think about it again. All these meant problems for the Control, but I do not propose to go into detail about the measures taken to deal with them. It may be interesting however to record the types of problems involved, for example, transfer of assets of non-sterling area nationals leaving the Sterling Area; British women marrying

non-residents; deceased persons; estates of foreign nationals who died in the Sterling Area; foreign nationals who had ceased to be enemy, or who, having left their countries where they resided before they were declared enemies, were regarded as resident in enemy territories for the purposes of the regulations.

When the war ended, the aids to the foreign exchange position of the Sterling Area and particularly of the U.K. came to a sudden end. American troops stationed on British territory and whose expenses brought in dollars, were withdrawn. Lend-Lease and Canadian Mutual Aid came to an end. The result was that towards the end of 1945 the Sterling Area was once more feeling acutely the pinch of inadequate foreign exchange reserves. I should like at this stage to indicate the problem facing the U.K. which inevitably was reflected in the other parts of the Sterling Area. The problem had two aspects. The first of these arose out of the deficit in the external balance of payments of the U.K. which appeared likely to develop during an estimated period of 3 to 5 years before equilibrium could be restored. The second arose out of the indebtedness of the U.K. to overseas countries in the shape of sterling balances and other liabilities accumulated during the war. The prospective deficit in the balance of payments position was attributed to several causes namely, loss of exports, loss of overseas investments, loss of shipping, increase of overseas debt and loss of reserves. British export trade had to be sacrificed to a diversion of man-power, production and materials to the war effort and the outcome was that it shrank to less than one third of its pre war volume. More than half of the pre-war tonnage of British merchant shipping was lost during the war but allowing for new building during the war the tonnage in 1945 was less than three quarters of the pre-war figure. It was estimated that the net income from overseas investments in 1945 was less than half that received in 1938. This was a result of extensive liquidation of foreign securities and the repatriation of loans by overseas debtors. I mentioned earlier that all the marketable U.S. dollars securities of U.K. nationals were compulsorily acquired by the Government for sale before Lend-Lease came into operation. The gold and dollar holdings of the Sterling Area had been mobilized and freely spent in the early stages of the war and in fact before Lend-Lease could come into operation these reserves had fallen to only £3 million. They had been built up subsequently but were still below the pre war level. It was estimated that in order to restore equilibrium in the balance of payments a volume of exports nearly seventy five per cent in excess of the pre-war level was necessary. On the basis of what was thought to be within the powers of the export industry it was estimated that a deficit of approximately £750 million would emerge in 1946, followed by a deficit of about £500 million in

1947. To this was added the fear that other countries of the Sterling Area, and also non-Sterling Area countries, who had built up large sterling balances in London, would begin to draw down these balances to finance their requirements, and would seek to convert part of the sterling into dollars in order to meet their dollar requirements. The pattern of trade of most of the Sterling Area countries had changed during the war and they had come to rely more than ever before on the Western Hemisphere for their essential requirements. European economy at this stage was incapable of meeting the demands for goods from other parts of the world and apart from the fact that many of the Commonwealth countries had become used to drawing goods from America, there was also the sheer necessity of continuing to go to America because no other country was able to supply what they wanted. In the circumstances the fear of the U.K. Government that there would be demands on her to convert sterling balances into dollars was a real one.

The result of these considerations was that England had to obtain a dollar loan of \$ 3.75 billion. There were several strings attached to this loan. The most important of them were these:—

- (a) That within one year arrangements would be concluded under which sterling acquired by Sterling Area countries from current transactions would be freely available for current transactions in any currency area without discrimination. This would mean that each member of the Sterling Area would have its current sterling and dollar receipts at its free disposition for current transactions anywhere.
- (b) That not later than one year after the date of the agreement, neither the Government of the United States nor the Government of the U.K. would impose restrictions on payments and transfers for current transactions.
- (c) That if either of the Governments imposed or maintained quantitative import restrictions, such restrictions would be administered on a basis which did not discriminate against imports from the other country, in respect of any product. It should be noted that a clause was written into the agreement giving either government the right to maintain any restrictions which it was authorised to impose in conformity with the Articles of Agreement of the International Monetary Fund.
- (d) That the U.K. Government would make agreements with the countries concerned for an early settlement covering the sterling balances accumulated by Sterling

Area and other countries, the settlements being on the basis of dividing these accumulated balances into three categories: (1) balances to be realised at once and convertible into any currency for current transactions; (2) balances to be released in instalments beginning in 1951 and (3) balances to be adjusted as a contribution to the settlement of war and post-war indebtedness.

I have mentioned the terms of this Loan Agreement in some detail because it highlighted two important questions which dominated financial transactions in subsequent years. In the first place it showed a determined attempt to force the pace and to bring about convertibility of sterling in a years time. Secondly, it brought to the forefront the question of the sterling balances and the restrictions that were to be put on them by the U.K. The question of convertibility had earlier been discussed at Bretton Woods and there was unanimity that convertibility was a most desirable objective. It was later written into the Articles of Agreement of the International Monetary Fund, which was one of the results of the Bretton Woods Conference, in the following terms: "The purposes of the International Monetary Fund are to assist in the establishment of a multilateral system of payments in respect of current transactions between members and in the elimination of foreign exchange restrictions which hamper the growth of world trade."

Exchange transactions between the Sterling Area and a large number of the other countries were based on bilateral payments agreements which in some cases provided for all transactions to take place in Sterling, and in others provided alternatives of Sterling or the currency of the country concerned. Further, in some of these agreements, it was provided that if the sterling balances of the country concerned rose over a certain figure, the U.K. would convert the excess into gold. A feature of these agreements, however, was that they confined transactions between the two countries concerned into water-tight compartments. There was no provision for the use of surpluses in order to make payments to third countries. For example, if between the Sterling Area and Sweden, there was a balance of payments in favour of Sweden, the result would be an increase in Swedish sterling balances in London. If Sweden, however, was in deficit with a third country, she would not be able to use her sterling balances to settle that deficit. The idea of convertibility was to get rid of this system and to allow greater elasticity in international trade so that each country would be concerned only with its overall balance of payments and not with its position in respect of individual countries. There is no doubt that this was a most desirable objective and by writing in a clause to this effect in the

Anglo American Loan Agreement it was hoped to bring about this desirable state of affairs at the earliest possible moment. The U.K. therefore proceeded to make arrangements with a large number of countries under which the sterling acquired by those countries on current account was to be convertible into any other currency on current account. These arrangements were entered into up to July 15, 1947, which was the deadline date on which sterling was to become freely convertible. Unfortunately, the strain imposed on the sterling area by other countries who wished to convert their sterling into dollars was too great and within about six weeks the accelerated drawing down of the Sterling Area's gold and dollar reserves made it necessary for the U.K. to abandon convertibility. What had happened was that though the Sterling Area might have been capable of balancing its payments with the outside world there was a wide degree of disequilibrium between the Sterling Area and certain sections of the outside world. For example, we ran a very large deficit with the dollar area and with certain European countries whose currencies were hard. But with many other countries, particularly some of the liberated European countries, we had a substantial surplus, brought about in some cases, for example, France, by an over-valuation in the exchange rates fixed by those countries. But it was not possible to set off the surplus against the deficit because the countries with whom we had a surplus were themselves unable to convert that surplus into dollars for our use. The convertibility of sterling was, therefore, a one-sided arrangement. There was an unprecedented rush by some European countries to convert sterling into dollars. In any event, the re stocking of the entire sterling area was going on apace in 1947 and this too contributed to the rapid decline in the Sterling Area dollar reserves. Full convertibility was, therefore, abandoned. But this did not mean that nothing was salvaged from the wreck. What was known as 'partial convertibility' was retained, namely, the conversion of sterling into any currency other than U.S. or Canadian dollars. These arrangements were translated into practice by the setting up of sterling accounts which were known as Transferable Accounts and the Ceylon Exchange Control as well as other Exchange Controls in the Sterling Area had to contribute to the supervision of transactions which passed through these Transferable Accounts. It is worth recalling that the Dollar Loan which was to have lasted 4 or 5 years was exhausted in one year and eight months when on the 2nd March 1948 the last instalment was drawn. The post-mortem on the rapid exhaustion of this loan attributed it to three main causes. Firstly, the continued rise in American prices; secondly, the very slow recovery of Europe and the Far East; and thirdly, the setback to the U.K.'s export drive due to the fuel crisis. Before

the loan was exhausted it was realised that the piecemeal aid given by the United States to various European countries was not producing the results expected and that if any attempt was made to step up the recovery of Europe in order that it could begin to play a fuller part in maintaining the trade of the world, the chances of success would be greater if the problem was tackled as a whole. Europe's paucity of dollars and her inability to regain her export trade held the threat of an eventual curtailment of activity in America with all its disagreeable consequences. It was these factors which brought about the famous offer of General George C. Marshall at Harvard in 1947, under which later the Marshall Aid Plan was to develop.

The next stage in the life of the Ceylon Control is bound up with the second problem mentioned above as having been brought to the forefront by the Anglo-American Loan Agreement. This was the problem of sterling balances held by Sterling Area countries. In terms of this Agreement the U.K. Government began a series of negotiations with Sterling Area countries regarding their balances. Ceylon was one such country, but this phase I shall leave for the next article because it opened a new era in the Ceylon Control.

Cost of Living Index

Cost of Living Index—Working Class—Colombo Town.

Group	Average Price, Nov. 1938 to April, 1939=100			Average Price, November, 1942=100										
	Weight	Average			Weight	Average								
		1939	1940	1941		1943	1944	1945	1946	1947	1948	1949	1950	1951
Food	52.40	112	115	129	183	103	102	111	113	128	138	144	154	156
Fuel & Light	6.28	102	103	108	171	94	94	94	111	121	101	97	102	113
Rent	15.96	97	97	96	93	105	106	112	124	136	140	129	129	129
Clothing	8.36	112	128	153	194	138	156	165	180	213	189	156	155	196
Miscellaneous	17.00	104	111	116	144	118	127	158	155	157	157	148	154	158
Total	100.00													
		Index No.				Index No.								
		Nov. 1938				Nov. 1938								
		April, 1939				April, 1939								
		= 100				= 100								
Index Nos.		108	112	122	162	107	109	121	125	138	142	139	149	155
						197	200	221	229	252	260	254	272	284
														283

* Five months' average.

† Eleven months' average.

Export Volume Index

(Base 1948 = 100)

Month	All Export Products		Tea		Rubber		All Coconut Products		Desiccated Coconut		Coconut Oil		Copra		Other Coconut Products		Other Export Products	
	1950	1951	1950	1951	1950	1951	1950	1951	1950	1951	1950	1951	1950	1951	1950	1951	1950	1951
January	106	120	99	101	167	166	81	148	209	382	62	128	9	30	166	192	98	114
February	85	107	70	84	123	152	97	147	326	392	64	123	13	30	137	191	131	114
March	89	107	81	86	130	124	74	155	317	264	21	173	2	51	161	169	125	157
April	75		74		82		77	154	154		83		4		122		65	
May	111		116		115		97	303	303		85		3		82		72	
June	143		167		115		90	331	331		40		45		91		108	
July	131		135		120		129	384	384		81		81		103		113	
August	118		100		135		163	514	514		114		72		103		142	
September	110		85		144		164	541	541		98		60		190		124	
October	123		94		127		229	545	545		223		52		223		100	
November	112		85		128		190	484	484		176		63		134		115	
December	122		102		143		173	444	444		149		61		166		125	
January-February																		
1950	95		85		145		89	267	267		63		11		151		114	
1951	113		92		159		147	387	387		125		30		191		114	

Source: Department of Statistics, Colombo.

Export Price Index

(Base 1948 = 100)

Month	All Export Products		Tea		Rubber		All Coconut Products		Desiccated Coconut		Coconut Oil		Copra		Other Coconut Products		Other Export Products	
	1950	1951	1950	1951	1950	1951	1950	1951	1950	1951	1950	1951	1950	1951	1950	1951	1950	1951
January	127	175	126	133	120	375	138	159	84	87	138	172	168	176	140	160	119	151
February	139	191	141	143	128	420	148	170	84	83	153	179	178	206	143	161	115	164
March	139	199	138	147	128	436	154	181	87	93	135	193	236	212	146	177	115	181
April	133		130		132		140		90		138		206		155		111	
May	133		122		151		161		104		157		207		153		117	
June	128		115		180		134		114		143		124		149		112	
July	129		113		194		133		106		134		144		142		110	
August	143		125		233		135		99		138		150		141		122	
September	158		133		284		145		104		150		162		141		141	
October	168		138		319		150		109		160		159		141		144	
November	173		133		370		153		102		163		164		155		142	
December	175		133		383		154		92		166		166		159		140	
January-February																		
1950	133		133		124		143		84		145		173		141		117	
1951	183		138		397		164		85		175		191		160		157	

Source: Department of Statistics, Colombo.

Government of

Ceylon Securities

RUPEE LOANS			Date Repayable	Current Closing Prices 28-2-51		Comparative Prices				Interest payment due	TOTAL LOAN Outstanding Rs.
						Six months ago		One year ago			
						B.	S.	B.	S.		
Ceylon Govt.	3½% Loan 57/62	...	Between 15-11-1957 & 15-11-1962	105	—	104	—	104½	—	15th May & November	27,941,000
Do.	3½% Loan 59/64	...	Between 1-10-1959 & 1-10-1964	104½	—	104½	—	104½	—	1st April & October	10,793,700
Do.	3 % War Loan 59/69	...	Between 1-4-59 & 1-4-1969	101½	—	101	—	101	—	do	9,608,400
Do.	3 % War Loan 1956/60	...	'A' Series ... Between 1-3-56 & 1-3-60 'B' Series ... " 1-9-56 & 1-9-60	100½xd	—	100xd	—	100½xd	—	1st March & September	13,352,900
Do.	2½% War Loan 1954	...	1-4-1954	101½	—	100½	—	101½	—	1st April & October	27,359,200
Do.	3½% Home Def. Loan 62/67	...	Between 1-6-1962 & 1-6-1967	105½	—	103½	—	104	—	1st June & December	11,216,000
Do.	3½% do 63/68	...	Between 1-6-1963 & 1-6-1968	105½	—	103½	—	104	—	do	4,113,000
Do.	3½% do 1952	...	1-6-1952	101	—	101	—	102½	—	do	1,691,000
Do.	3½% do 1953	...	1-6-1953	102	—	101½	—	102½	—	do	817,700
Do.	3½% National Loan 1964/69	...	Between 1-8-1964 & 1-8-1969	103½	—	102½	—	103½	—	1st February & August	48,799,700
Do.	3½% do 1956	...	1-8-1956	102½	—	101½	—	101½	—	do	9,706,200
Do.	3½% do 1957	...	1-8-1957	102½	—	101½	—	101½	—	do	15,093,200
Do.	3 % do 1953	...	1-8-1953	102	—	100½	—	101½	—	do	32,979,100
Do.	3 % do 1954	...	1-8-1954	102½	—	100 3/8	—	101½	—	do	18,421,800
Do.	3 % Victory Loan 1965/70	...	Between 15-7-1965 & 15-7-1960	102	—	100½	—	99 3/8	—	15th January & 15th July	22,827,500
Do.	2½% do 1955/60	...	Between 15-7-1955 & 15-7-1960	100½	—	—	—	—	—	do	20,073,600
Do.	3 % National Development Loan 1965/70	...	Between 1-11-65 to 1-11-1970	102½	—	100 5/8	101½	100 1/8	—	1st May & 1st November	64,834,400
Do.	2½% National Development Loan 1955/60	...	Between 1-11-55 to 1-11-1960	101	—	—	—	—	—	do	35,165,600
Do.	2½% National Development Loan 1967/72	...	Between 15-12-67 & 15-12-72	100	—	—	—	—	97	15th June & 15th Dec.	26,830,100
Do.	2½% National Development Loan 1962/67	...	Between 15-12-62 & 15-12-67	—	—	—	—	—	—	do	7,141,700
Sri Lanka Govt.	3% Loan 1969/74	...	Between 1-3-69 & 1-3-74	101½xd	—	—	102½xd	—	—	1st Mar. & 1st September	58,379,900
Do Govt.	2½% Loan 1959/64	...	Between 1-3-59 & 1-3-64	100½xd	—	—	100½xd	—	—	do	19,148,300
Ceylon Govt.	1½% Loan 1952	...	1-12-1952	100½	—	—	—	—	—	1st June & 1st December	40,000,000
Do. do.	3 % Loan 1966/71	...	Between 1-12-66 & 1-12-71	102½	—	—	—	—	—	do	50,000,000

Note:—Transactions in recent months have been based on the following approximate yields.

Loans maturing within 4 years	2½%
do 7 "	2½%
do 10 "	2½%

(Accrued interest on Govt. Stock is included in the price.)

Gross Public Debt (including sterling loans, but excluding War Loans re-lent to the United Kingdom Government) ...

Less Value of Sinking Funds as at 30-9-50 ...

Nett Public Debt ...

(Reproduced from the Bank of Ceylon Monthly Circular for February, 1951.)

Loans maturing within 12 years and over ... 2½%

Rs. 651,423,833.33

Rs. 119,719,146.09

Rs. 531,704,687.24

Volume, Price, and Terms of Trade

(Base 1948 = 100)

Period	Import Volume Index	Import Price Index	Export Volume Index	Export Price Index	Terms of Trade
1950					
1st Quarter	96	99	93	134	74
2nd Quarter	149	98	110	129	76
3rd Quarter	129	98	119	143	69
4th Quarter	113	103	119	172	60
1949		(Base 1934—1938 = 100)			
1st Quarter	132	438	125	316	139
2nd Quarter	138	412	129	309	133
3rd Quarter	98	416	130	314	132
4th Quarter	111	419	130	356	118
1948					
1st Quarter	106	445	132	316	141
2nd Quarter	123	449	124	301	149
3rd Quarter	109	439	131	287	153
4th Quarter	102	444	131	315	141

Source: Department of Statistics, Colombo.

Finance Indices

(1934-38 average=100)

Month	Note Circulation (Gross)		Note Circulation (Active) *		Total Savings†		Bank Clearings		\$ Government Revenue		\$ Government Expenditure	
	1950	1951	1950	1951	1950	1951	1950	1951	1950	1951	1950	1951
January	1002.0	775.7	637.4	882.2	724.0	834.7	581.6	927.3	613.2	775.8	533.7	701.1
February	928.7	818.3	646.6	943.2	725.0	851.9	497.1	761.4	406.6	703.3	466.3	723.6
March	787.8		645.2		725.3		631.2		500.0		456.2	
April	745.9		653.4		724.7		545.2		480.2		434.8	
May	752.8		665.7		727.6		592.2		593.4		493.3	
June	806.0		677.4		734.1		638.7		685.7		513.5	
July	823.6		692.8		739.0		642.1		634.1		496.6	
August	645.2		725.3		749.7		901.4		691.2		541.6	
September	699.8		776.0		767.5		748.0		760.4		1170.8	
October	692.4		786.1		783.8		744.6		596.7		460.7	
November	726.7		824.2		800.6		786.0		607.7		527.0	
December	779.3		865.1		818.8		718.3		795.6		744.9	
	*	*	*	*	*	*	*	*	*	*	*	*
January-February 1938	108.0					121.4					106.6	98.9
1949	891.1			621.4		723.1					547.3	407.9
1950	965.3			641.9		725.0					509.9	500.0
1951	797.1			912.7		851.9					739.6	712.4

* September, 1938, to August, 1939=100

† Nett values of savings deposits plus Savings Certificates.
§ From February, 1951, the figures are provisional.

**Quarterly Index of Share Prices:
Rupee Companies—**

January-June 1939 = 100.

		Tea	Rubber	Tea-Cum Rubber
1948	1st Quarter	184	133	168
	2nd "	168	103	142
	3rd "	171	105	143
	4th "	170	105	145
1949	1st Quarter	168	96	140
	2nd "	157	79	133
	3rd "	163	96	135
	4th "	193	115	165
1950	1st Quarter	207	134	182
	2nd "	222	186	216
	3rd "	230	206	234

Source: Department of Census and Statistics.

Printed at The Rokeby Press, Colombo.

THE CEYLON ECONOMIST

VOL. I.

INDEX

SUBJECT	ARTICLES	AUTHORS	No.	Page
Agriculture	Land and Agriculture in Ceylon	P. Kandiah	2	169
	An Analysis of Peasant Economy in Ceylon	P. Kandiah	3	242
	Gal Oya Project—An Analysis of Irrigation in Ceylon.	Dr. S. A. Wickramasinghe	4	358
	The University in the Island's Economy	Sir Ivor Jennings	3	272
Education	British Socialism at Work I.	London Correspondent	3	230
Foreign Affairs	The Ceylon Wages Boards	Dr. K. P. Mukerji	2	115
	Thoughts on Full Employment	H. A. de S. Gunasekera	2	191
Monetary & Banking	Unemployment in Ceylon	P. Kandiah	1	32
	Economics of Rupee Devaluation	G. V. S. de Silva	1	71
	Thoughts on Full Employment	H. A. de S. Gunasekera	2	191
	The Central Bank, an Analysis	W. Ladduwahetty	1	55
National Income	Exchange Control in Ceylon I.	J. A. Leembruggen	4	375
	Price Stability Vs. Exchange Stability	S. Samarasinghe	3	259
	The Theory of Value	P. Sangarapillai	2	124
	The First Year of the Central Bank	N. K. Sarkar	4	315
Planning	Some Reflections on the Purposes of Exchange Control—P.H. Siriwardhana		2	143
	Inflation in Ceylon	W. Rasaputram	4	322
	What is National Income?	H. Minc	1	89
	Some Problems of Economic Development in Ceylon	G. Corea	1	39
	National Savings and Economic Development	Dr. B. B. Das Gupta	1	6

SUBJECT	ARTICLES	AUTHORS	No.	Page
Planning [contd.]	Some Observations on the Colombo Plan	Dr. N. M. Perera	3	289
Population	An Estimate of the Future Population of Ceylon	N. K. Sarkar	2	167
Public Finance	Overall Budgetary Policy in an Export Economy	G. Corea	2	177
	The Budget. An Iniquitous Transference of Wealth	G. V. S. de Silva	1	10
	Economics of Food Subsidies	J. B. Kelegama	4	350
	Public Accounts and Estimates Committee	Dr. N. M. Perera	1	22
	A Survey of Tariffs in Ceylon	G. H. Wadinambiaratchi	3	237
Trade	International Commodity Arrangements & Ceylon	Dr. B. B. Das Gupta	3	223
	Back to Barter in Ceylon's Overseas Trade?	C. Suntharalingam	3	280
Transport	Rail-Road Co-ordination in Ceylon	S. Samaratunga	2	149
	The Motor Traffic Act No. 14 of 1951 and Co-ordination of Transport	P. Sangarapillai	4	331

AUTHORS

AUTHORS	SUBJECT	No.	Page
Corea, G.	Some Problems of Economic Development in Ceylon	1	39
	Overall Budgetary Policy in an Export Economy	2	177
Das Gupta, Dr. B. B.	National Saving and Economic Development	1	6
	International Commodity Arrangements and Ceylon	3	223
de Silva, G. V. S.	The Budget, an Iniquitous Transference of Wealth	1	10
	Economics of Rupee Devaluation	1	71

AUTHORS	SUBJECT	No.	Page
Gunasekara, H. A. de S.	Thoughts on full Employment	2	191
Jennings, Sir Ivor	The University in the Island's Economy	3	272
Kandiah, P.	Unemployment in Ceylon	1	32
	Land & Agriculture in Ceylon I	2	169
	An Analysis of Peasant Economy in Ceylon	3	242
Kelegama, J. B.	Economics of Food Subsidies	4	350
Ladduwahetty, W.	The Central Bank, An Analysis	1	55
Leembruggen, J. A.	Exchange Control in Ceylon I	4	375
London Correspondent,	British Socialism at Work I	3	230
Minc, H.	What is National Income?	1	89
Mukerji, Dr. K. P.	The Ceylon Wages Boards	2	115
Perera, Dr. N. M.	Public Accounts and Estimates Committee	1	22
	Some Observations on the Colombo Plan	3	289
Rasaputram, W.	Inflation in Ceylon	4	322
Samaratunga, S.	Rail-Road Co-ordination in Ceylon	2	149
	Price Stability Vs. Exchange Stability	3	259
Sangarapillai, P.	The Theory of Value	2	124
	The Motor Traffic Act No. 14 of 1951 and Co-ordination of Transport	4	331
Sarkar, N. K.	An Estimate of the Future Population of Ceylon	2	167
	The First Year of the Central Bank	4	315
Siriwardhana, P. H.	Some Reflections on the Purposes of Exchange Control	2	143
Suntharalingam, C.	Back to Barter in Ceylon's Overseas Trade?	3	280
Wadinambiaratchi, G. H.	A Survey of the Tariffs in Ceylon	3	27
Wickramasinghe, Dr. S. A.	The Gal Oya Project—An Analysis of Irrigation in Ceylon	4	358

1	THE HISTORY OF THE
2	THE HISTORY OF THE
3	THE HISTORY OF THE
4	THE HISTORY OF THE
5	THE HISTORY OF THE
6	THE HISTORY OF THE
7	THE HISTORY OF THE
8	THE HISTORY OF THE
9	THE HISTORY OF THE
10	THE HISTORY OF THE
11	THE HISTORY OF THE
12	THE HISTORY OF THE
13	THE HISTORY OF THE
14	THE HISTORY OF THE
15	THE HISTORY OF THE
16	THE HISTORY OF THE
17	THE HISTORY OF THE
18	THE HISTORY OF THE
19	THE HISTORY OF THE
20	THE HISTORY OF THE
21	THE HISTORY OF THE
22	THE HISTORY OF THE
23	THE HISTORY OF THE
24	THE HISTORY OF THE
25	THE HISTORY OF THE
26	THE HISTORY OF THE
27	THE HISTORY OF THE
28	THE HISTORY OF THE
29	THE HISTORY OF THE
30	THE HISTORY OF THE
31	THE HISTORY OF THE
32	THE HISTORY OF THE
33	THE HISTORY OF THE
34	THE HISTORY OF THE
35	THE HISTORY OF THE
36	THE HISTORY OF THE
37	THE HISTORY OF THE
38	THE HISTORY OF THE
39	THE HISTORY OF THE
40	THE HISTORY OF THE
41	THE HISTORY OF THE
42	THE HISTORY OF THE
43	THE HISTORY OF THE
44	THE HISTORY OF THE
45	THE HISTORY OF THE
46	THE HISTORY OF THE
47	THE HISTORY OF THE
48	THE HISTORY OF THE
49	THE HISTORY OF THE
50	THE HISTORY OF THE
51	THE HISTORY OF THE
52	THE HISTORY OF THE
53	THE HISTORY OF THE
54	THE HISTORY OF THE
55	THE HISTORY OF THE
56	THE HISTORY OF THE
57	THE HISTORY OF THE
58	THE HISTORY OF THE
59	THE HISTORY OF THE
60	THE HISTORY OF THE
61	THE HISTORY OF THE
62	THE HISTORY OF THE
63	THE HISTORY OF THE
64	THE HISTORY OF THE
65	THE HISTORY OF THE
66	THE HISTORY OF THE
67	THE HISTORY OF THE
68	THE HISTORY OF THE
69	THE HISTORY OF THE
70	THE HISTORY OF THE
71	THE HISTORY OF THE
72	THE HISTORY OF THE
73	THE HISTORY OF THE
74	THE HISTORY OF THE
75	THE HISTORY OF THE
76	THE HISTORY OF THE
77	THE HISTORY OF THE
78	THE HISTORY OF THE
79	THE HISTORY OF THE
80	THE HISTORY OF THE
81	THE HISTORY OF THE
82	THE HISTORY OF THE
83	THE HISTORY OF THE
84	THE HISTORY OF THE
85	THE HISTORY OF THE
86	THE HISTORY OF THE
87	THE HISTORY OF THE
88	THE HISTORY OF THE
89	THE HISTORY OF THE
90	THE HISTORY OF THE
91	THE HISTORY OF THE
92	THE HISTORY OF THE
93	THE HISTORY OF THE
94	THE HISTORY OF THE
95	THE HISTORY OF THE
96	THE HISTORY OF THE
97	THE HISTORY OF THE
98	THE HISTORY OF THE
99	THE HISTORY OF THE
100	THE HISTORY OF THE



*The things you need and want to buy
Are all in very short supply ;
'Tis not the time to cut a dash
Or thoughtlessly to spend your cash
For if you don't resist temptation
The effect will surely be Inflation
So save and lend with might and main
Till happy days are here again.*



NATIONAL SAVINGS MOVEMENT