

[Communicated to the Council
and the Members of the League.]

Official No.: **C. 178. M. 97.** 1935. II.B.

Geneva, May 20th, 1935.

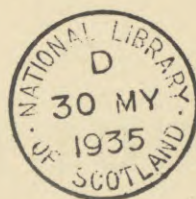
LEAGUE OF NATIONS

ECONOMIC COMMITTEE

Considerations
on the Present Evolution
OF
**AGRICULTURAL
PROTECTIONISM**

Series of League of Nations Publications

II. ECONOMIC AND FINANCIAL
1935. II.B. 7.



CONTENTS

	Page
<i>Introduction :</i>	
The Economic Committee's Enquiry and Discussions	5
I. Origin and Development of Agricultural Protectionism in its Present Forms	6
II. Necessity of Agricultural Protection	7
III. The " Scissors " Question	8
IV. The " National Defence " Argument	10
V. Direct Dangers to the Agricultural Producer from Excessive Agricultural Protectionism	10
VI. Indirect Dangers to the National Economic System and to International Relations from the Same Cause	12
VII. Need for a Return to Moderate Forms of Agricultural Protection . . .	13
 <i>Annexes :</i>	
I. Agricultural Protectionism in Europe in the Post-war Period, by Sir Frederick Leith Ross	15
II. The General Evolution of Agriculture at the End of the Nineteenth Century and before the World War, in relation to the Growth of Agricultural Protection — Note by the Secretariat	36

CONSIDERATIONS ON THE PRESENT EVOLUTION OF AGRICULTURAL PROTECTIONISM

INTRODUCTION.

1. At its session of July 1934, the Economic Committee of the League of Nations asked the Secretariat to make "a study of the consequences in industrial countries of increased agricultural protectionism and the effects of this policy in countries engaged mainly in agriculture".

Moreover, in the course of the discussions of the Assembly of the League of Nations in September 1934, "stress was laid on the extent to which the demand of agricultural countries for industrial goods is limited by their inability to sell their products in industrial countries, which have increased their agricultural protection".

The Second Committee's report observed that, in the opinion of several delegations, "an investigation of this problem would contribute towards elucidating the reasons for certain of the difficulties the world was encountering at the present moment and would possibly point to some methods of initiating a revival of international exchanges of goods".

The attention which was thus directed to the question of agricultural protectionism emphasised its international importance.

2. Thanks to the active co-operation of its members, the Economic Committee has been able to collect interesting documentary material which facilitates an impartial examination of the problem of agricultural protectionism.

A personal note by Sir Frederick Leith Ross, which is reproduced as an Annex, served as a basis of discussion. This note provides a collection of highly instructive information; it attempts to determine, with the help of statistics, the extent to which excessively rigorous agricultural protectionism is responsible for the collapse of international trade, and arrives at objective conclusions of the greatest interest.

It was supplemented by a number of observations submitted by the members of the Economic Committee and by the agricultural organisations of the different countries.

These documents have enabled the Committee to form an idea of the different points of view adopted by the Governments, by public opinion, and by the circles concerned in the different countries, according to whether they attach most importance to the export of agricultural products or the defence of the home agricultural market; according to the more or less preponderating influence of the agricultural factor in their national economic systems; and, lastly, according to whether, by tradition or necessity, they follow a more or less pronounced policy of protection.

It has been thought desirable to attach to Sir Frederick Leith Ross's note a study which relates how agricultural protectionism developed in Europe in the last third of the 19th century. It is indeed not without interest to follow the simultaneous evolution of agriculture and protectionism during the depression in the agricultural world which

covered the twenty years from 1875 to 1895. The history of the still recent past permits of instructive comparisons with the present, and provides useful lessons.

On the basis of this documentary material, the Economic Committee held a long discussion. The facts of the situation being described in Sir Frederick Leith Ross's note, we shall here confine ourselves to making a few observations of a general character.

I.

The attached description of the evolution which has occurred since oversea production began to make its appearance on the European market shows what were the origins of agricultural protectionism as practised before the war.

It is unnecessary to recall here how the war, by taking millions of workers from the fields in the belligerent countries just when the armies were demanding more and more foodstuffs, gave an impetus to oversea agricultural production—particularly cereals—the effect of which is still apparent to-day.

For several years indeed after the close of hostilities, Europe continued to import considerable quantities of agricultural products—particularly cereals and meat—her return to her former productive capacity having been retarded by a series of concomitant causes, such as the Russian revolution and numerous agrarian reforms.

But directly her producing capacity was again restored, about 1925, the balance between supply and demand was broken; prices were already on the downgrade, and the full force of the collapse was felt from 1930 onwards.

Exporting countries with a surplus of goods had to bear the full shock of this catastrophe, against which they possessed only one means of defence—a useful means at first, but one which was later to constitute an additional danger—namely, to slow down the marketing of their crops by accumulating stocks.

On the other hand, agricultural producers in the importing countries with a shortage of crops were obliged to appeal to their Governments and to national solidarity in order to escape the contagion. This means they have used, and abused: the introduction of duties two or three times higher than world prices, ever stricter rationing, the progressive reduction to close upon vanishing-point of the proportion of foreign products admitted in the various preparations, bounties for production, export bounties, "schemes", monopolies and various other forms of planned economy.

These Draconian measures, which, quite apart from the disorder which they caused in the delicate and complex mechanism of the balance of international accounts, tend to create as many different price regimes as there are protectionist countries and thus delay a return to the essential system of non-watertight compartments, were followed by a whole series of difficulties, perhaps less serious but almost as irksome. Quotas have to be allocated as between the countries; hence the danger of discrimination. Quotas have to be allocated as between the traders, and allocation is necessarily synonymous with delay, confusion, error, abuse, *de facto* monopoly and sometimes corruption. The whole body of sanitary measures, applied with the utmost severity, creates a suspicion that those measures have economic objects, and one cannot understand why international co-operation, which is making such strides in the matter of human hygiene, should remain powerless in regard to animal hygiene.

The consequence of all these measures, applied more particularly by the big industrial countries, was naturally a big-scale reduction, amounting in some cases to the total exclusion, of agricultural imports, and that more particularly in the case of products—

such as wheat, meat and butter—playing a fundamental part in the economic life of the producing countries.

That, roughly, is a picture of the present situation, which is a matter of common knowledge and which, consequently, it is unnecessary to describe in any detail. This situation, taken as a whole, represents a defensive reaction, often violent and incoherent, but in the main comprehensible, against the dangers of an unprecedented economic depression.

Had it achieved its object, it would be difficult indeed to criticise it; but facts are to hand which prove that this exaggerated policy of protectionism, spreading from one country to another, is tending to prolong the depression which it was designed to combat and to prejudice the interests of the classes that it aimed at protecting. In its present extreme form, it no longer has anything in common with a moderate protectionism, which is quite compatible with the normal functioning of international trade.

II.

Kept within reasonable limits, as practised before the war, agricultural protectionism represents indeed only one form—possibly the most important—of voluntary redistribution of national wealth to which it is hardly fair to apply the abstract standards of pure economic criticism.

Even admitting that Customs duties, by making production dearer, result in the relative impoverishment of the population, it is quite conceivable that a country may prefer to make sure of a strong agriculture and rather less prosperity than seek its wealth in what it regards as over-industrialisation—a conception which the economic depression has strengthened by showing up the vulnerability of over-organised systems of economy.

Nor must it be forgotten that the agricultural system of the older countries already existed, practically in its present distribution, at a time when the world movement of agricultural products was non-existent and when consequently the particular development of that agriculture corresponded to essentially local requirements. The peasant class in those countries still retains this former character, as regards both distribution and manner of living—a fact which places it in a position of relative inferiority in relation to overseas countries and often even in relation to certain Eastern European countries, especially for big-scale production.

True, the moment is in sight when, thanks to the increasing extension of technical progress, half the agricultural population of any given country will be amply sufficient to supply a demand which, unlike the demand for industrial products, can after all only increase at the same rate as the population itself.

But it is clear that no country in which the peasant class plays a fundamental part—and that is the case in almost all countries—can agree to allow this evolution to proceed so rapidly as to produce highly dangerous upheavals. One has, moreover, to reckon with the idea, somewhat obscure but not devoid of foundation, that the farmer, for a series of reasons independent of his will, such as atmospheric disturbances or diseases of animals and plants, is exposed to more sudden and dangerous risks than other classes of producers. It will seem natural, then, in the main, that in countries in which the historical development and dominant conceptions in the life of the people demand such an effort, the population as a whole should be prepared to afford special assistance to the agricultural classes—generally in the form of protective duties—and that such help should be considered more and more imperative in proportion as agricultural prices collapse and the depression continues to exercise its effects.

For social, historical and psychological reasons, the preservation of agriculture appears to the majority of countries as an absolutely vital question, and one which cannot be considered as a purely economic problem. The peasant class, which is an element of order and stability and an admirable reserve of energy, forms, at any rate in the countries of the Old World, the basis of the social edifice, and plays an essential part in reconstituting and rejuvenating the physical strength of generations worn out by life in industrial and large urban centres.

All countries indeed, even the most strongly industrialised, consider it necessary to support their agriculture, which, moreover, in every case occupies a great part of the population. Even when, as in England, it represents a small minority, it nevertheless constitutes one of the chief categories of producers, and that is why, provided that no excesses are indulged in, which would defeat their own ends, a Government can hardly be criticised for endeavouring to maintain the rural classes at a reasonable level of prosperity in order that they may continue to exercise the important part which they play in the national life.

Even the agricultural exporting countries cannot but regard such an aim with sympathy.

Furthermore, it would be impossible in practice to neglect the special interests of agriculture out of regard for principles of pure economics, in view of the enormous political force which it represents in every country, irrespective of climate, development or system of government.

It would therefore show little sense of reality to endeavour to apply free-trade principles to agricultural problems and to plead in favour of the abolition of any form of protection.

The only practical aim which we can set before us is to determine what are the limits which should be placed on this form of mutual social aid in order to prevent it from becoming harmful to the normal development of international economic relations and to ensure that it shall not involve any loss for the nation which practises it or, ultimately, for the farmer himself.

III.

One of the most cogent economic arguments, and one frequently adduced, in favour of agricultural protectionism is that of the "*scissors*"—*that is to say, the disparity at any given moment between agricultural and industrial prices*. While recognising the force of this argument, it must not be forgotten that a certain disparity between these two categories of prices may be regarded as normal. It would only be possible to lay down that the two price regimes must be absolutely equal if either the agricultural producer were forced to purchase on the market all that he required to feed his family and to pay a rent such as is paid for a house in an urban settlement, or if the industrial worker were able to obtain both these requirements on the same conditions as apply to the farmer.

But this, notwithstanding the disparity between agricultural and industrial prices, is the mark of a very serious state of disequilibrium which operates to the detriment of the agricultural producer when unduly accentuated, as it is at present. On the one hand, the expenses of the agricultural producer are greater than they were before the war. On the other hand, the exchange value of agricultural products has fallen in a few years by more than half, and the fall in prices has been infinitely greater in the case of agriculture than in that of industry.

This state of affairs is due to several causes:

(a) In industry, the workers' and employers' organisations have often succeeded in arresting the fall in industrial prices. In an eminently variable economic system, they have introduced a fixed element which does not exist to the same degree in agriculture.

(b) In industry, "marginal" producers who cannot work at a profit are eliminated and supply can be adjusted to a diminishing demand by reducing production and exercising strict control over sales. In agriculture, on the other hand, it is not possible to regulate competition between producers by means of combined and organised efforts. Having to live on the produce of their land, the bulk of the small peasants continue to produce, whatever their financial situation, and the total production remains unchanged. Often, indeed, the unorganised agricultural producer, guided simply by his individual interests, will tend to increase the volume of his output, in order to compensate the losses resulting from the fall in prices.

(c) Moreover, the farmer, disposing as he does of his more important products to middlemen who distribute them in succession until they reach the consumer, does not, like the manufacturer, feel the drawbacks of a production which no longer answers to the needs of consumption until the situation thus created has already become difficult.

These various facts tend to show how difficult it is for the agricultural producer to adapt himself to new and unexpected situations, and are consequently an argument in favour of protection.

One might wonder whether the remedy for this excessive disparity is to be sought in the reduction of industrial prices or in an increase in agricultural prices. Were it not for the fear of being misunderstood, one would not hesitate to say that the elimination of the "scissors" must be brought about by raising the exchange value of agricultural products.

Unfortunately, as we have said, even for a commodity such as wheat, which can be grown in almost any climate, it is difficult as yet to speak of a world price, as this notion now applies only to such quantities—very small compared with the world production—as still form the object of international trade.

The highly protected importing countries have succeeded by various means (exclusion of imports, fixing of a minimum price, monopoly of sales and purchases, etc.) in creating, each for itself, a national price for wheat (as indeed for other agricultural products) which is more or less independent of external prices. The exporting countries themselves, in order to cope to a certain extent with the catastrophic drop in prices aggravated by the growth of protectionism in importing countries, have been obliged, whether they would or not, to employ various measures of co-operation to raise prices on the home market.

Hence there is the danger to-day of misunderstanding if one speaks of an increase or decline in agricultural prices without stating at the same time what prices and what countries are referred to.

Reverting, subject to this reservation, to the desirability of raising world prices for agricultural products, this notion must be understood as applying to foodstuffs the prices for which are not the result of strict artificial measures.

As regards agricultural prices in countries which apply such measures, in all probability when—by the gradual demobilisation of economic nationalism and the re-establishment of monetary order—the necessary equilibrium is restored between prices on the home and on foreign markets, an absolute increase in agricultural prices can hardly be expected. But, none the less, the "scissors" rectification will be brought about in the form of a simultaneous drop in industrial prices and in the expenses of the agricultural producer in general.

IV.

Before dealing with the purely commonsense reasons in favour of moderation in agricultural protectionism, it is important to examine more closely one other argument which is often adduced and which never fails to produce its effect by appealing to patriotic feeling. We refer to what may be summed up as *the interests of national defence*.

The country must be in a position, by its own means, to supply its own agricultural commodities in time of war. This is a most praiseworthy desire in itself, but the practical truth underlying it is rather less sound.

To take only the chief forms of agricultural production, such as cereals and meat, one need but remember what happened during the last war. Not one of the belligerent countries was able to keep on the land the labour, men in particular, necessary to produce the quantity of foodstuffs which it had produced in time of peace.

If that was the case in 1914, how could the countries in question hope to be able to maintain their agricultural production at the much higher level that it has attained under the "hothouse" system of intensive protectionism?

Undoubtedly those countries would soon be forced to have recourse to imports from abroad. Since, however, other belligerents would be in the same situation at the same moment, there would certainly occur on the world market an increase of demand and probably a stupendous rise in the prices of the agricultural commodities in question. Again, it is no easy matter to organise enormous deliveries rapidly when for years, as the result of the policy of the importing countries, commercial relations between the latter and the exporting countries have been interrupted or strained.

It may be added, further, that a country which, in order to remain independent in case of conflict, has long pursued a strict policy of economic isolation will probably thereby have endangered the development of its external economic relations and will consequently find itself with but few resources just when it is obliged to make large purchases at very high prices.

This is not the place to express an opinion on the probable results of such a policy applied on a big scale, but, as regards supplies of cereals, sugar, meat, etc., the idea of self-sufficiency in case of war may prove to be a dangerous illusion.

It is, however, only right to add that since the war certain countries with a high birth-rate may have been obliged, by means of strict Customs protection, to over-develop certain agricultural productions simply because, owing to the closing of emigration territories and the stifling of international trade, they saw no other possibility of feeding or providing work for a growing population.

V.

It must not be forgotten that an agricultural producer living in an adequately protected country remains indifferent to the fate of the farmers in the exporting countries. Even if it is pointed out to him that the reduction in their purchasing power will prevent them from purchasing the industrial products of his own country and from paying their debts, that will not disturb him unduly.

It is important, then, to lay special stress on such arguments as are likely to *appeal directly to the reason and personal interest of the agricultural producer himself*. For this purpose, he must be made to understand that *agricultural protection far more than industrial protection must be moderate if it is to be really effective*.

Its essential purpose, indeed, is to keep home prices at a minimum level regarded as remunerative. Directly, however, the restrictive measures imposed on the import of the agricultural commodity in question become so severe as to ensure the agricultural producer (for example, for his wheat) a price two, three or even four times as high as the price obtaining on the world market, the inevitable consequence—despite all the costly and complicated systems of supervision over and limitation of production—will be to make the majority of agricultural producers, even those who find themselves in the most unfavourable conditions, intensify their production of the commodity in question.

Over-protection inevitably leads to over-production. Recent experience shows beyond all shadow of doubt the inevitable character of these consequences. Directly over-production takes root in a country, the whole machinery of protection, set up and maintained at such cost, ceases to function. Prices drop and it becomes necessary to have recourse to increasingly burdensome and increasingly artificial methods (creation of stocks, carrying forward, fixing of minimum prices, various more or less highly developed forms of planned economy, etc.) which, as a rule, simply aggravate the situation and increase the discontent of the agricultural producer.

It may be noted, further, that even a very small excess of production over consumption is sufficient to bring about a drop in prices out of all proportion to the actual excess.

In the case of production on so large and important a scale, for example, as that of wheat and other cereals, a country which, even quite recently, imported considerable quantities is exposed to a serious danger when, by intensifying its production, it manages to produce a quantity equal, or almost equal, to its consumption. From that moment onward it has entered the danger zone; it is no longer master of events, and is at the mercy of atmospheric conditions. Only a good harvest is needed for its whole defensive system to become a fresh source of calamity for the agricultural producer whom that system was designed to protect.

With the advent of the economic depression which set in in 1929, the majority of countries, threatened by the complete breakdown of international economic equilibrium, sought a remedy in the application of methods which were useful only when they did not exceed certain limits. There thus ensued, first, a progressive increase of duties, followed by the establishment of a system of restrictions practically excluding all imports of certain important agricultural commodities.

The inevitable consequences of these methods were not slow in making themselves felt. Several important countries which in previous years had still imported large quantities of wheat and other cereals increased their production so as fully to cover their requirements. Often, indeed, they found themselves with large excess amounts which led to the collapse of prices and obliged the Government to dip into State funds again in order to constitute stocks, give bonuses for denaturation, export, etc. Millions are being spent in this way because, having benefited for a long time by artificially increased prices, the farmers have naturally been led to increase by every possible means a production thus privileged.

Is it necessary to add that the farmers, having lost their bearings in the face of the collapse of the defensive system which they thought infallible, and being obliged to purchase industrial products which they require at equally high prices, have forgotten that for years they obtained prices representing twice or three times those paid on the world market? More dissatisfied than ever, they reproach Governments with being lacking in energy in the defence of their interests and insist on the complete closing of the frontiers. Thus the vicious circle is complete.

But these direct consequences are not apparent in all the protectionist countries. Many industrial countries are still obliged, notwithstanding the very close protectionism which they have instituted, to obtain their supplies to a large extent from abroad. For

them the problem of internal over-production does not arise, but their policy none the less involves all the drawbacks of a system of very high prices.

On the basis of post-war experience, it is safe to affirm, without fear of contradiction, that an industrial country, which always requires to maintain the closest relations with other countries, will never be in a better position than if it succeeds, by means of moderate protection, in keeping the prices of the chief agricultural commodities, and particularly wheat, at a reasonable level which will prevent over-production and enable it to retain the ample possibilities in regard to agricultural imports. This policy is undoubtedly the wisest, both in time of peace and in anticipation of possible conflicts.

These possibilities in regard to import will, moreover, constitute the best guarantee of the efficiency of the protection system, which will thereby escape the dangers inherent in its exaggeration.

Further, such moderation will carry with it the benefits of a moderate price level, promoting exports, thanks to the moderate cost of production and to the possibility of marketing industrial articles without difficulty in countries which export agricultural products.

Lastly, if the prices of agricultural products are kept within reasonable limits, this will also prevent an excessive increase in the value of land, which would involve correspondingly heavy mortgage charges and would raise farm rents. The day will come when these prices, which are out of all proportion to external prices, will give place to lower prices; the farmer—or his children—will then be glad not to be weighed down by an excessive burden of debt, and the State will avoid the painful necessity of arbitrarily reducing farm rents by exceptional legislation.

VI.

Apart from the direct consequences described above, excessive agricultural protectionism involves other effects which, though indirect, are no less serious.

How can one explain the fact that in certain industrial countries, where it is practically impossible to import a ton of foreign meat, the prices for meat on the home market fall rapidly as the economic depression becomes more acute? Is it a question of over-production or of under-consumption? These expressions, which have been so loosely used in speaking of the economic depression, obviously correspond to purely relative notions. The fact that to-day, in the countries of Europe as a whole, more meat or more butter is produced than was being produced before the war, does not prove that this increased production could not be absorbed if the mass of the population, which has also increased, found itself in a normal economic situation. One need only think of the millions of people who are unemployed or under-fed to realise that the disparity between supply and demand must to a large extent be attributed to the falling-off in the number of persons possessing the wherewithal to purchase the commodities in question at the high prices kept up by the protectionist system.

The fact is too easily forgotten that the policy of scarcity adopted to-day by a large number of countries—this is merely a statement, not a criticism, for a policy of expansion and recovery can hardly be enforced by one country without simultaneous co-operation on the part of others—in the long run reduces the number of consumers of agricultural products and at the same time involves certain forms of over-production.

Town-dwellers and industrial workers in particular, whose income is daily declining, are gradually forced to reduce their consumption of meat, butter, eggs, etc. Then, protection notwithstanding, there is a weakening of prices which is not, however,

accompanied by an increase of consumption. It will simply be the sign of the progressive decline of the national economic system.

In order to realise the relationship that exists between this general weakness of the home market and an extreme agricultural protectionist policy, one need only consider the part that is played by the prices of foodstuffs in the daily expenditure of industrial workers. The higher these prices are, the higher wages will be, and industry cannot cope with foreign competition except by obtaining in its turn a form of protection as effective as that enjoyed by agriculture; thus prohibitive duties, quotas and prohibitions will extend from agricultural products to the products of industry.

From that moment onwards the export possibilities of industry will decline. Everything will be done to maintain them, even selling at a loss, but this will only be possible by further raising industrial prices on the home market.

The agricultural producer will thus be obliged in future to pay high prices for the industrial products which he requires, just as the worker will have to pay high prices for his foodstuffs. Despite the rise in their nominal income, both will feel the effects of the depression more than ever under a system of national economy which is gradually declining as its exchanges of all kinds with the outer world diminish.

Under these conditions, commercial negotiations become more and more difficult, the industrial countries being unable to offer any very considerable advantages in exchange for the concessions which they demand from the agricultural countries. Exaggerated agricultural protectionism thus contributes to the loss of industrial markets.

The ultimate consequences of this state of affairs are brought out in the note, annexed hereto, of Sir Frederick Leith Ross, and are summed up in his conclusions, which, however, apply more particularly to the relations between the industrial countries of Europe and the oversea agricultural countries.

It need hardly be added that a similar situation exists on the Continent of Europe and that the relations between the different European countries are affected in a similar way by the operation of an excessive agricultural protectionism.

The difficulty in Europe lies not only in the conflicting interests of the typically agricultural and the highly industrialised countries, but in the almost insurmountable obstacles which at present stand in the way of the development of commercial exchanges between the industrial countries themselves. These are, in point of fact, large agricultural producers in their turn. They were in the habit until quite recently of exchanging with one another considerable quantities of specific commodities (butter, cheese, citrous and other fruits, wine, etc.) in the production of which they were severally specialised. The present state of depression of this important branch of European trade is a matter of common knowledge.

VII.

An analysis of the situation permits of the conclusion that the maintenance of a normal current of agricultural imports on the part of the industrial countries is in keeping with the true interests of the nation as a whole and of the agricultural producers in particular. Such a conclusion is obviously incompatible with the existence of unduly restrictive quotas, but it does not in any sense exclude the maintenance of reasonable protectionist duties. Certain countries which import large quantities of agricultural products prefer to afford their agriculture what appears to them equitable assistance by means of direct subsidies, the funds for which are provided by duties sufficiently moderate in themselves not to cause any undesirable rise in the cost of foodstuffs within the country.

There are certain signs, moreover, which point to an improvement in world prices, and this will not fail to facilitate a gradual return to the moderate form of protection which was the rule in the past and which achieved its purpose without involving, for the national systems of economy or for international relations, the dangers briefly described above.

It may not perhaps be unduly optimistic to hold that the agricultural producers, having learned wisdom from the cruel experience to which they have just been subjected, will realise the necessity of reducing agricultural protection to reasonable proportions and thus gradually re-establishing the pre-war situation.

The necessary transition might be more easily engineered if exporters could manage to organise themselves so as to avoid unco-ordinated and ruinous competition, which, by flooding the market with products offered at depreciated prices, tends to strengthen the protectionist policy of the industrial countries.

The solution of the agricultural problem can, of course, only be sought in an evolution tending towards the resumption of regular economic relations—an evolution which must occur simultaneously in the sphere of industry, commerce, currency and finance. But such an evolution cannot be the outcome of the individual policy of any one isolated country; it can be brought about only by new tendencies adopted simultaneously by a number of countries.

ANNEX I.

AGRARIAN PROTECTION IN EUROPE IN THE POST-WAR PERIOD.

SIR FREDERICK LEITH ROSS' PERSONAL OPINION ON THE QUESTION.

I. The Period prior to 1929.

1. The post-war period has witnessed a progressive movement towards agricultural protection on the part of virtually every country in Europe. The origin of this movement is to be sought less in the direct effects of the war itself than in the process of recovery from the economic disorder produced by the war.

The years immediately following the close of the war were years in which international trade in general was hampered by the prevalence of high tariffs and other restrictions of a severity and comprehensiveness to which there was no previous parallel, but, broadly speaking, *the main incidence of these restrictions was on manufactured goods and not on agricultural products.*

The following table gives a comparison of the levels of duty to which United States exports of wheat were subject in twenty¹ leading importing countries in 1913 and in 1922. These twenty countries took 97% of United States exports of wheat in 1910-1914.

Table 1.

TARIFF LEVELS ON UNITED STATES WHEAT EXPORTS IN LEADING WHEAT-IMPORTING COUNTRIES.²

Rate category	1913		1922	
	Number of countries	Percentage of total U.S. wheat exports	Number of countries	Percentage of total U.S. wheat exports
Duty free	8	69	10	66
Up to 15 cents per bushel	5	3	6	20
15 to 35 cents per bushel	2	4	3	13
Over 35 cents per bushel	5	24	2	1

1. It will be seen that, in 1913, 24% of United States wheat exports to these countries was subject to a duty in excess of 35 cents a bushel, but that, in 1922, although

¹ The number of countries in 1922 was twenty-one, owing to the creation of Poland as an independent State after the war.

² From "World Trade Barriers in Relation to American Agriculture", Washington, Seventy-third Congress, First Session, Senate Document No. 70 (1933), page 42.

the United States export balance of wheat was about 170% larger than the average of 1909 to 1913, the proportion subject to a duty of this magnitude was virtually *nil*.

A similar enquiry into the level of tariffs on meat and lard revealed that in ten of the twelve principal foreign markets American products were receiving in June 1923 treatment at least as favourable as in 1913.¹

The relatively liberal policy followed by importing countries was mainly due to the impairment of production in Europe consequent upon the war. The economic problems relating to agricultural products in these years were problems of scarcity and not of over-production. Thus the area under wheat in Europe (excluding Russia) had fallen from an average of 29,340 million hectares in 1909-1913 to an average of 26,720 in 1921-1925. The Russian area had fallen from 29,950 million hectares in 1909-1913 to 24,878 in 1925. Similarly, the number of hogs in Europe (excluding Russia) was 57 millions in 1920-1922 compared with 68 millions in 1909-1913; the number of cattle, 99 millions in the latter period compared with 100 millions in the former.

In consequence, the volume of world trade in some of the chief foodstuffs was considerably greater after the war than before it. World exports of wheat and wheat-flour, for example, increased by about 18% in volume between 1909-1913 and 1922-1925, the European import balance rising by more than 20% if Russia is excluded, and by about 90% if Russia is included. The total of the import balances of beef and veal into five of the leading European importing countries was considerably more than twice as large in 1925 as in 1909-1913. (See *Table 16* below.)

2. This phase of post-war economic history, however, came to an end at about the year 1925. During the succeeding period, up to the commencement of the world depression in 1929, the evolution of policy affecting trade in agricultural products and in manufactured goods again followed contrasting lines.

By 1925, the most disastrous of the post-war currency disturbances were over. As regards *manufactured goods*, the gradual restoration of more normal conditions encouraged the stabilisation, if not the lowering, of tariffs, the abolition of direct restrictions, and a return to the policy of regulating trade by means of commercial treaties and the most-favoured-nation clause. The ideals of the period are reflected in the recommendations of the World Economic Conference of 1927. Though actual achievement fell far short of the aspirations expressed in these recommendations and though the general level of tariffs remained high, trade in manufactured products between 1925 and 1929 was subject to considerably less restriction than in the preceding years. But this was not true of *agricultural products*; several facts combine to make 1925 a significant date in the post-war history of agriculture, particularly as regards wheat. It was the first year in which the production of wheat in Europe (excluding Russia) exceeded the average of the five years preceding the war. It was the year in which Germany recovered her freedom, under the terms of the peace treaties, to impose Customs duties, and took advantage of it to re-enact high tariffs on food imports. Sliding-scale duties on wheat imported into Austria and Czechoslovakia likewise came into force in 1925. And, finally, 1925 was the year in which the Fascist Government in Italy re-imposed the duty on wheat, which had been abolished in 1921, and inaugurated its wheat-growing campaign known as the "battle of the grain", with the declared intention of minimising Italy's dependence on foreign food-supplies.

Thus the growth of protectionist policy in the interests of European agriculture is by no means wholly the result of the depression commencing in 1929. The rise of Customs barriers in the period prior to 1929 is illustrated in *Table 2*, in which the duties on wheat

¹ From "World Trade Barriers in Relation to American Agriculture", Washington, Seventy-third Congress, First Session, Senate Document No. 70 (1933), page 43.

in force in various European countries at certain dates are compared. The countries covered by this table are the major wheat-importing countries of Europe; the total of their import-balances over the years 1924-1928 amounted to approximately 94% of the total for all European *wheat*-importing countries and to approximately 76% of the total for the world.

The table shows that importation was free at the beginning of 1924 in eight out of the twelve countries included; but that, by the beginning of 1929, the number of free markets had shrunk to four. On the basis of their average import-balances during 1924-1928, the eight countries which permitted free importation in 1924 constituted 64% of the world import market for wheat and wheat-flour; the four which continued to permit free importation in 1929 constituted on the same basis only 39%.

Wheat was not the only commodity affected by the growth of trade barriers. In many countries, the protection given to wheat was part of a general protectionist policy for cereal products. Duties on *meats* also showed a rising tendency during this period; the German duty on fresh and chilled meat, for example, being raised in August 1927 from RM.21 per 100 kg. to RM.32, while the French duties on beef were raised during the later months of 1927 and earlier months of 1928 from 50 to 350 francs per 100 kg. in the case of fresh and chilled beef and from 50 to 180 francs in the case of frozen beef.

II. The Period since 1929.

1. The third and most critical phase in the development of European protectionist policy since the war is the period of world depression since 1929. As world prices fell, so European Customs barriers rose, each country attempting by this means to shield its own agricultural industry from depression or even to encourage its expansion in order to provide employment for some of those thrown out of work by the decline of industrial activity. In the earlier years of the depression, the foodstuffs most affected by the fall of prices were *wheat* and other cereal crops, the price of Canadian wheat in London and Liverpool falling from an average of 48s. 6d. per quarter in 1929 to 35s. 10d. in 1930 and 23s. 7d. in 1931.

These commodities accordingly provide the first conspicuous examples of increased protection.

German duties on wheat were changed six times in the course of the year 1930, the total effect of the revisions being to increase the general rate from RM.7.50 per 100 kg. to RM.25 per 100 kg., the latter figure being equivalent (at par) to 12s. 6d. per cwt., or about 150% of the English price of Canadian wheat during 1930. At the same time, the lower conventional rate of duty applicable to imports from countries enjoying most-favoured-nation treatment was abolished. The duty was further revised in October 1934 to RM.35 per 100 kg.

In France, the duty was raised in May 1929 from 35 francs per 100 kg. to 50 francs, and in May 1930 to 80 francs, at which rate it was equivalent to 6s. 8d. per cwt. In July 1931, the maximum rates of duty, hitherto equal to the above minimum rates, were doubled.

The Italian duty, which was 14 gold lire per 100 kg. after May 1929, was raised to 16.50 gold lire in 1930 and to 75 paper lire in August 1931, the effect of the latter change being to raise the rate from 6s. 9d. per cwt. to 8s. 3d. (at par). Since the average English price of Canadian wheat during 1931 fell to 5s. 6d. per cwt., the latest Italian duty was also equivalent to about 150% *ad valorem* at the time of its imposition.

In the *United Kingdom*, under the provisions of the Wheat Act which came into force in May 1932, a levy has been charged on flour, both imported and home-produced, out of the proceeds of which payments have been made to British farmers, designed to make up the difference between the prices at which their wheat has been sold and a "guaranteed price" of 10s. per cwt. This guaranteed price, however, is only payable on a maximum home crop of 27 million cwt. of millable quality, and the subsidy is proportionately reduced if the quantity exceeds this figure. The average price of British wheat during the crop year 1932-33 was 5s. 7d. per cwt.; the guaranteed price therefore represented during that year an addition of about 79% to the market price.

At the same time, tariff-protection was supplemented in many countries by other means of control, notably by measures requiring the milling industry to use a *specified percentage of domestic grain* in the manufacture of flour for home consumption, in some cases with the stipulation that this domestic grain must be purchased at an officially determined price. Milling quota regulations of this sort were initiated in Germany in July 1929; they are now in force in at least eight ¹ of the countries included in *Table 2*. In addition, several countries have established official or semi-official *import monopolies* for wheat, while importation is also controlled in a number of countries by means of import *licences or quotas*.

2. In the case of *meats*, the major part of the price-fall during the depression has occurred since 1930; generally speaking, therefore, the adoption of extreme protectionist measures has been more recent than in the case of wheat. During 1930, the *German duty* on fresh and chilled meats (other than bacon) was increased by 20% (40% in the case of ham) and thus brought level with the duty on frozen meat. The duty-free quota of imports of frozen meat was also abolished in that year. During 1931, further increases of about 22% occurred in the duties on fresh, chilled and frozen meats; the rates then established remained in force until February 1933. At this date they were drastically revised, the duty on fresh, chilled and frozen meats rising from RM.55 to RM.100 per 100 kg.; and duties on prepared meats (except canned meat) in a similar proportion. The new duty on fresh, chilled and frozen meat was equivalent at the time of its imposition to £3 10s. 4d. per cwt., which is about 124% of the price of Argentine chilled beef in London for the month in question. In addition to these duties, import regulations now exist which virtually prohibit the import of frozen meat.

In *France*, the import duties on beef, mutton and lamb were unchanged between 1929 and 1933, except for the imposition of an "Exchange Compensation" surtax on imports from countries with depreciated currencies. In May 1933, however, "licence taxes" were imposed on all imports of meat. The present rates of duty on beef, mutton and lamb, including the licence tax, are 275 francs per 100 kg. for fresh and chilled meat and 190 francs for frozen meat. Duties on pork were raised in 1930 and 1931. The present inclusive duty on fresh and chilled pork is 375 francs per 100 kg.; that on frozen pork is 230 francs. In October 1931, the importation of meat was subjected to regulation by quota and, since April 1934, quotas have been allotted for mutton only, so that the importation of other meats is now in practice prohibited.

In *Italy*, the duties on unprepared meats were increased by about 400% in September 1932, the rate applicable to fresh, chilled and frozen meat since that date being 140 lire per 100 kg. Since January 1st, 1932, a regulation has been in force providing that municipal slaughterhouses must regulate their weekly output of slaughtered animals so that at least 85% of the total is of domestic origin.

¹ Germany, France, Italy, Sweden, Belgium, Czechoslovakia, the Netherlands, Greece.

Table 2.

CUSTOMS DUTIES ON WHEAT IN EUROPEAN IMPORTING COUNTRIES.

Date	United Kingdom	Italy	Germany	France	Belgium	Netherlands	Czechoslovakia	Greece	Irish Free State	Switzerland	Austria	Sweden
January 1st, 1924 : (a) Duty in currency per 100 kg. (b) English equivalent per cwt. ^a	Free Free	Free Free	Free Free	14 fr. 1s. 7½d.	Free Free	Free Free	Free Free	42 dr. ^b (paper) 2s.	Free Free	(State Import Monopoly) Free	Free Free	3.70 kr. 2s. 1d.
January 1st, 1929 : (a) Duty in currency per 100 kg. (b) English equivalent per cwt. ^a	Free Free	11 L. (gold) 4s. 6d.	RM. 5 ^c 2s. 6d.	35 fr. 2s. 11d.	Free Free	Free Free	30 Cz. Kr. 1s. 10d.	109.20 dr. ^b (paper) 2s. 11½d. ^b	Free Free	(State Import Monopoly) Free	2 kr. (gold) 10¼d.	3.70 kr. 2s. 1d.
January 1st, 1934 : (a) Duty in currency per 100 kg. (b) English equivalent per cwt. ^a	^d ^d	75. L. ^e 12s. 4d.	RM. 25 ^e 18s. 11d.	80 fr. ^e 10s. 1d.	Free ^e Free	Free ^e Free	55 Cz. Kr. ^{e f} 5s. 1d.	210 dr. ^{b e} (paper) 3s. 9½d.	Free Free	(State Import Monopoly) Free	8.80 kr. (gold) 5s. 8d.	3.70 kr. ^{e f} 2s. 1d.

^a Calculated at rate of exchange ruling at the times in question.

^b Approximate level of Customs duty plus surtax.

^c Reduced General Rate. The general duty was RM.7.50 per 100 kg., equivalent to 3s. 9d. per cwt.

^d "Ottawa" duty of 5s. 6d. per cwt. on foreign wheat.

^e Countries in which milling regulations are in force.

^f State or other official monopoly of import trade.

General Note. — The duties above quoted are, so far as can be ascertained, the minimum rates in force at the various dates. In most cases, they are the rates leviable on imports from countries with which there is a commercial treaty embodying the most-favoured-nation clause. In some cases, lower rates are chargeable on specified quantities of wheat imported from particular countries.

Belgium abolished free importation of meats in November 1931. Since March 1932, the duty on fresh and chilled meats (except bacon, which is still free) has been 120.75 francs per 100 kg. and on frozen meat 86.25 francs. From May 1932, meat and cattle have been among the commodities whose importation into Belgium has been controlled by licence. The Austrian rates of duty on bacon and lard were materially raised in July 1931.

3. With regard to *butter*, the *German duty* prior to November 1930 was RM.27.50 per 100 kg. It was raised to RM. 50 at that date; and, since November 1932, it has been at the rate of RM.75 per 100 kg., total annual imports at the same time being limited by quota. The quota for 1934 is 45,000 metric tons, or about 47 % of the average annual import balance for the years 1924 to 1928. Since the end of 1933, butter has been under the control of the official fats monopoly. A surcharge in addition to the Customs duty has been charged since early in 1934, in order to bring the price of imported butter up to the internal level. The duty of RM.75 per 100 kg. is equivalent to about £3 2s. per cwt. at the present time (about £1 17s. 3½d. at par), and is approximately 93 % of the London price of New Zealand butter during the first eleven months of 1934.

The *French minimum duty* on butter was increased in September 1932, and January 1933, the present rate (including "licence duty") being 900 francs per 100 kg. (£6 2s. 6d. per cwt., about 184 % of the London price), as compared with 200 francs prior to September 1932 and 100 francs prior to June 1930. Butter importation is also regulated by quota.

The *Italian duty* was increased in March 1932 and January 1934, and is now 500 lire per 100 kg. for fresh butter and 540 for salt, plus 15 % *ad valorem*. Before March 1932, the duty was 66.10 lire per 100 kg.

In *Belgium*, the tariff was revised in November 1931 and a surtax added in March 1932, the result being a total increase in the duty from 20 to 161.1 francs per 100 kg. In addition, a quota system was applied to imports of butter in April 1932.

4. The desire to protect the dairy industry has also led a number of countries to place restrictions on the trade in other *oils and fats* which compete with butter through their use in the manufacture of *margarine*. The most prominent examples are the measures adopted in *Germany*, where, in April 1933, the supply of all raw materials used in the manufacture of margarine was brought under the control of a Government monopoly with powers to regulate production and prices. At the same time, the duties on imported margarine and margarine cheese were increased by 150 % and those on artificial edible fats by 500 %. The quarterly production of margarine was restricted from the date at which the monopoly commenced its operation to 50 % of the quantity produced in the last quarter of 1932, the Minister of Food and Agriculture being allowed to increase this percentage in certain cases. Since then the production quota has more than once been raised, but the figure at which it now stands appears not to have been published.

In *Italy*, where the competition of imported oils has been felt by the native olive-growers as well as by the dairy farmers, the duties on oils and oilseeds have been increased on several occasions since December 1929. From July 1934, the duty on ground-nuts has been at the rate of 56.70 lire per 100 kg. and that on ground-nut oil 198 lire, those rates being equivalent to about 10s. and £1 14s. 6d. per cwt. respectively. The latter rate is about 174 % of the average price of ground-nut oil in Hull for the first eleven months of 1934. In addition to the import duty, there is a tax on the manufacture of edible oil from oilseeds (other than olives) which was raised in September 1934 from 65 to 120 lire per 100 kg.; while, since April 1934, the sale of margarine and other butter substitutes in Italy has been prohibited.

In *France*, ground-nuts were free of duty until August 1933. Duties of 8 francs per 100 kg. on undecorticated nuts and 11 francs on decorticated were then imposed, but imports from French Colonies and Protectorates, which form the bulk of the supply, continued to be free. In August and October 1933, the duties on ground-nut oil were

raised, but the present rate charged on oil imported for the manufacture of edible fats is relatively moderate, being only 47 francs per 100 kg. or 6s. 5d. per cwt. Import licence and quota regulations, however, were introduced in December 1933, imports of pure fixed vegetable oils for edible use or for the manufacture of edible fats being restricted during the first half of 1934 to 5,800 metric tons or about half of the imports during the corresponding period of 1933 and 1932. For the second half of 1934, no quota was allocated to ground-nut oil; and the quota for other vegetable oils for edible use or for the manufacture of edible fats was reduced to 4,000 metric tons.

III. Some Effects of These Policies.

(a) *Prices and Consumption.*

The above instances provide a few striking examples of the extreme agricultural protection which is now maintained by almost every continental European country. Rates of duty by themselves, however, do not give an accurate measure of the degree of protection enjoyed by the domestic producers of different countries, particularly when they are supplemented by the other more direct forms of restriction which are now prevalent.

The actual protective effect of a given country's policy is best indicated, where the necessary figures are obtainable, by the divergence of prices inside that country from prices on a free market for the same commodity. Such data as are available for the chief commodities affected are presented in *Tables 3 to 6*.

It has to be remembered, of course, that an exact correspondence between prices in different countries is not to be expected even under conditions of completely free trade, particularly where (as in most cases) there is some difference between the qualities of the products to which the different quotations relate. However, it is clear that the divergences actually recorded, especially in the cases of wheat and butter, are greatly in excess of any which could be explained by such considerations as this.

Table 3.

GOLD PRICES OF HOME-GROWN WHEAT IN GERMANY, FRANCE AND ITALY, EXPRESSED AS PERCENTAGES OF THE GOLD PRICE ON IMPORTED WHEAT IN ENGLAND.

Average	Germany (Berlin)	France (Paris)	Italy (Milan)
1928	104	118	132
1929	106	116	135
1930	155	148	169
1931	253	291	226
1932	261	276	270
1933	250	243	269
1934 ^a	276	300	268

^a Nine months.

(Gold price quotations from *International Agricultural Institute Year-Book*. The English price of imported wheat taken as 100 is the average of the London and Liverpool prices of Canadian, Argentine and Australian wheat).

Table 4.

AVERAGE MONTHLY PRICES OF BUTTER AT BERLIN, PARIS AND HASSELT, CONVERTED TO STERLING AT CURRENT RATES AND EXPRESSED AS PERCENTAGES OF THE PRICE IN LONDON OF NEW ZEALAND SALTED BUTTER.

Average	Berlin	Paris	Hasselt
1931	117	143	115
1932	150	206	150
1933	194	260	207
1934 ^a	271	283	233

^a Eleven months.

(Price quotations from *Dairy Produce Supplies*, 1932 and 1933.)



Table 5.

AVERAGE MONTHLY PRICES OF BEEF IN GERMANY, FRANCE AND THE NETHERLANDS, CONVERTED TO STERLING AT CURRENT RATES AND EXPRESSED AS PERCENTAGES OF THE AVERAGE PRICE OF HOME-PRODUCED BEEF AT FOUR MARKETS IN ENGLAND AND WALES.

Average	Germany (Berlin)	France (Paris)	Netherlands
1929	123	93	113
1930	120	106	114
1931	113	113	109
1932	120	111	109
1933	134	107	107
1934 <i>a</i>	144	111	155

a Six months.

(Price quotations for Germany from *Statistisches Jahrbuch für das Deutsche Reich*; for France, from publications of International Institute of Agriculture; for the Netherlands, from *Maandschrift van het Centraal Bureau voor de Statistiek*; for England and Wales, from figures published by the Ministry of Agriculture and Fisheries.)

Table 6.

AVERAGE MONTHLY PRICES OF PORK IN GERMANY, CONVERTED TO STERLING AT CURRENT RATES AND EXPRESSED AS PERCENTAGES OF THE AVERAGE PRICE OF HOME-PRODUCED PORK AT FOUR MARKETS IN ENGLAND AND WALES.

Average 1929	100	Average 1932	123
" 1930	81	" 1933	121
" 1931	85	" 1934	
		(six months)	115

(Price quotations for Germany (Berlin) from *Statistisches Jahrbuch für das Deutsche Reich*; for England and Wales, from figures published by the Ministry of Agriculture and Fisheries.)

The comprehensiveness of the German protective system is illustrated by *Table 7* which gives a comparison of German and world prices for a representative list of agricultural commodities in December 1934. Similar figures for other countries would no doubt in some cases show an equally complete divorce between domestic and world prices.

Table 7.

PRICES OF AGRICULTURAL COMMODITIES IN GERMANY AND ON WORLD MARKETS, DECEMBER 1934.

Commodity	Price in Reichsmarks per 100 kg.	
	Germany	World market
Wheat	20.55	10.41
Rye	16.55	6.58
Oats	14.88	5.29
Fodder barley	15.45	8.17
Maize (Plata)	15.50	5.84
Cattle	82.00	23.87
Pigs	96.00	28.37
Butter	260.00	121.77
Lard	181.00	66.86
Eggs (per 100)	11.50	4.97
Sugar	44.00	9.17

(Quoted by *The Economist*, January 5th, 1935, from the *Frankfurter Zeitung*.)

The available information regarding recent changes in the consumption of various foodstuffs in different European countries is summarised in *Tables 8 to 10*. Consumption of meats is probably too greatly affected by differing national habits to enable definite conclusions to be drawn from the figures given, but the recent fall in German consumption deserves notice. In the case of butter, the contrast between recent changes in the United Kingdom and Germany is both striking and significant. In both countries there was a substantial increase in consumption between 1924-1927 and 1930. Since 1930, the British consumer has taken advantage of the fall in the price of butter to increase his consumption by a further 27%, at the same time markedly reducing his consumption of margarine; but German consumption fell off by 8% between 1930 and 1934. It is clear that the operation of the German monopoly has resulted in a considerable all-round decline in the consumption of fats.

Table 8.

PER CAPUT CONSUMPTION OF FATS IN THE UNITED KINGDOM, GERMANY AND THE NETHERLANDS.
(Lb. per head.)

	United Kingdom				Germany				Netherlands	
	Butter	Margarine	Lard	Total	Butter	Margarine	Lard	Total	Butter	Margarine
Average 1905-1909	^a 15.8	^a 5.0			15.0	6.6				
Average 1924-1927	^a 15.4	^a 12.4	^b 8.1	35.9	^c 13.4	^c 15.2	8.1	36.7	^b 12.5	^b 17.7
1928	17.0	13.2	8.1	38.3	15.7	16.4		40.2	12.8	18.3
1929	17.8	12.9	8.6	39.3	15.9	17.3		41.3	12.8	20.1
1930	18.5	11.8	8.3	38.6	16.7	17.5		42.3	14.0	19.1
1931	20.9	10.3	8.3	39.5	16.3	16.2		40.5	15.9	17.6
1932	21.8	9.2	8.2	39.2	16.3	17.6	7.6	41.4	18.9	13.3
1933 ^d	23.5	8.4	9.1	41.0	17.6	13.0		38.2	16.6	11.1
1934 ^d			9.1		15.3	12.3	6.7	34.3		

^a Great Britain. ^b 1927. ^c 1925-1927. ^d Provisional.

- Sources: (i) United Kingdom, butter and margarine figures for 1905-1909 and 1924-1927, *The Agricultural Output and Food Supplies of Great Britain*, Ministry of Agriculture and Fisheries, 1929; for later years, estimates of the Imperial Economic Committee. Lard consumption computed on the basis of the import balance in each year plus the recorded production in 1930.
- (ii) Germany, butter and margarine consumption 1913-1930, *Survey of Oilseeds and Vegetable Oils*, Vol. III, *Ground-nut Products*, Imperial Economic Committee, 1934; 1931 and 1932, *Dairy Produce Supplies in 1933*, Imperial Economic Committee; 1933 and 1934 calculated from data regarding supplies in *Foreign Crops and Markets*, October 8th, 1934. Lard consumption from *Foreign Crops and Markets*, October 8th, 1934.
- (iii) Netherlands: figures calculated from data published in *Jaarcijfers voor Nederland* and *Maandschrift van het Centraal Bureau voor de Statistiek*.

Table 9.

PER CAPUT CONSUMPTION OF EGGS IN THE UNITED KINGDOM AND GERMANY.
(Numbers.)

	United Kingdom	Germany
1924	116	117
1931	160	130
1932	150	120
1933	152	101

(Figures supplied by the Imperial Economic Committee.)

Table 10.
PER CAPUT CONSUMPTION OF MEATS IN CERTAIN COUNTRIES.
(Lb. per head.)

	United Kingdom				Germany				
	Beef and veal ^a	Mutton and lamb ^a	Pig-meat	Total	Beef and veal	Mutton and lamb	Pork	Other meats	Total
1927	71	27	40	138	38.1	1.5	68.8	1.8	110.2
1928	71	28	43	142	40.1	1.5	73.2	1.5	116.3
1929	70	28	40	138	43.0	1.5	67.5	1.8	113.8
1930	70	29	41	140	39.0	1.5	69.0	1.8	111.3
1931	67	29	47	143	36.5	1.5	72.6	1.4	112.0
1932	64	31	49	144	37.2	1.4	68.1	1.2	107.9 ^b
1933	63	34	48	145	36.1	1.5	70.1	1.3	109.0 ^b

	France					Netherlands	Italy
	Beef and veal	Pork	Mutton and lamb	Horse	Total	Beef and veal ^c	Beef and veal
1927	46	16	6.0	2	70	41	22
1928	48	17	6.0	2	73	40	23
1929	49	17	5.7	3	75	43	21
1930	45	18	6.3	3	72	39	19
1931	41	20	5.6	3	70	35	18
1932	42	19	5.6	3	70	39	18
1933	45	9	5.6	3	72		

^a Twelve months ending May 31st of year stated. ^b Provisional. ^c Including fat and sausages.

(From *Cattle and Beef Survey*, Imperial Economic Committee, 1934.)

Figures of average per caput consumption of course do not disclose the full effects of high food prices on the economic welfare of the population, since the burden of high prices is necessarily borne to a disproportionate extent by the poorer classes. Detailed statistical information regarding changes in consumption in different social classes is not available, but there can be little doubt that protection has seriously aggravated the effects of economic depression on the standards of living of the industrial population of European countries.

At the same time, the artificially high level at which prices have often been maintained tends to encourage production, and to necessitate either the abandonment of price control or the adoption of elaborate and sometimes expensive measures for the disposal of surplus stocks. Such difficulties have been a conspicuous feature of the French wheat situation in several successive years. They have resulted in a surplus which has had to be denatured or disposed of in the world markets at prices far lower than the domestic price. It should be added that the present French Government has taken steps to prevent a recurrence of these difficulties by moderating the protection accorded to wheat.

A somewhat similar situation has recently arisen with regard to dairy products in Switzerland, according to an article in the *Frankfurter Zeitung* of December 7th, 1934. In spite of the steps taken by the Federal Government to encourage consumption—for example, by compulsory admixture of butter with margarine—this article reports the existence of nearly 250 wagon loads of unsaleable butter in the cold stores. Agricultural relief policies have already accounted, it is stated, for the expenditure of nearly 100 million francs, or about a quarter of the Federal budget, from public funds.

(b) *European and World Production.*

The course of agricultural production in Europe and the world as a whole is indicated by the following index numbers published by the League of Nations:

Table 11.
INDEX NUMBERS OF PRODUCTION.
(1925-1929 = 100.)

	1925	1926	1927	1928	1929	1930	1931	1932	1933 ^a
World: Crude foodstuffs	98	97	100	103	103	104	102	104	103
„ Raw materials of agricultural origin	97	99	97	101	105	103	103	96	100
„ All agricultural products	98	97	99	103	103	104	102	103	102
Europe: ^b Crude foodstuffs	98	92	98	103	109	104	106	112	110
„ Raw materials of agricultural origin	94	88	109	88	121	84	92	88	86
„ All agricultural products.	98	92	99	102	110	103	105	110	109

^a Partly estimated. ^b Excluding U.S.S.R.

These figures demonstrate that agricultural production in Europe since 1928 has been tending to increase faster than in the world as a whole. This tendency, as the raw materials and foodstuffs indices show, cannot be attributed to the decline in the production of agricultural raw materials in extra-European countries consequent on the depression since 1929.

Changes in the estimated production of beef and veal in European importing countries are shown in *Table 12*. The figures show that European beef production reached a peak in 1929; and part of the increase prior to that date is probably to be attributed, particularly in Germany, to spontaneous recovery from the abnormal pre-war situation. World production, on the other hand, has been falling since 1926. It is common knowledge that beef and veal are tending to be replaced by other meats in the diet of many countries, and European production has evidently been affected by this factor.

Table 12.
ESTIMATED PRODUCTION OF BEEF AND VEAL.
(Thousands of tons.)

	1909-13 average	1925	1926	1927	1928	1929	1930	1931	1932
Germany	963 ^a	886	924	931	1,038	1,141	1,066	1,047	1,074
France		^b	^b	786	889	894	810	705	755
Italy.		269	302	349	366	323	298	281	292
Belgium	165 ^c	95	132	109	119	126	114	107	126
Netherlands		103	117	127	130	147	117	106	130
Austria.		86	91	91	89	89	77	79	76
Total of above.		2,225	2,352	2,393	2,631	2,720	2,482	2,325	2,453
Great Britain	571	544	540	577	579	588	551	524	519
Total, all ^d principal producing countries (excl. U.S.S.R.) . .		9,679	9,838	9,619	9,275	9,212	8,863	8,537	8,840

^a Year 1913; present frontiers.

^b Not available; assumed same as 1927 in total.

^c Year 1912.

^d Includes others not shown separately.

(From *Cattle and Beef Survey*, Imperial Economic Committee, pages 323 and 324.).

Table 13.
NUMBERS OF PIGS AND CATTLE IN EUROPE.

Number of pigs in Europe		Number of cattle in principal European beef-producing countries ^a	
	(Millions)		(Millions)
Average: 1909-1913.	68	1913	59.3
1920-1922.	57	1925	59.3
1923-1925.	65	1930	61.8
1926-1928.	72	1933	64.9
1929-1931.	75		
1931	81		
1932	77		
1933	77		

^a Irish Free State, Denmark, Great Britain, Germany, France, Italy, Austria, Netherlands, Belgium.

(Pig statistics, 1909-1913 to 1929-1931, from *World Trade Barriers in relation to American Agriculture*; 1931-1933, *International Yearbook of Agricultural Statistics*, 1932-33. Cattle numbers from *Cattle and Beef Survey*.)

A further illustration of the expansion of the European live-stock industry is given by the figures of *Table 13*.

Table 14 shows the course of wheat production in Europe and elsewhere since 1925.

There has been a marked increase of production in European importing countries since 1929, the totals for 1932 and 1933 being 25 and 36% respectively above the average for 1925 to 1928. At the same time, production in the overseas exporting countries has been tending steadily downward from the high point reached in 1930. Production in European importing countries represented 25% of world production in 1925-1928; it represented 28% in 1932 and 29% in 1933. As regards individual countries, French production, compared with the average of 1925-1928, had increased by 19% in 1932 and 29% in 1933; Italian production by 25% and 34% in the same two years, and German production by 55% and 73%. Similar large increases occurred in some of the smaller countries such as Sweden, the Netherlands, and Switzerland. The reduction recorded for most countries in 1934 was, of course, a result of the severe drought experienced during that season.

(c) *European Imports of Foodstuffs.*

European trade in some of the leading foodstuffs has undergone drastic changes in the last few years as a result of the growth of restrictive policies and the reduction of purchasing power consequent upon trade depression. Imports of beef and veal into the six chief Continental importing countries amounted during 1932 and 1933 to about a third of the average quantity imported in the years 1925 to 1928, while imports of cattle have been reduced in about the same proportion (see *Tables 16 and 17*). Imports of wheat and wheat-flour into European importing countries other than the United Kingdom have over the same period dropped to half their former total (see *Table 15*). The decline of the trade in beef and veal is partly the result of a general shift of demand away from these meats which cannot be attributed either to depression or to protectionist policies. But the influence of protection has nevertheless been of great importance and there can be little doubt that it has been almost solely responsible for the fall of European wheat imports.

Table 14.

WHEAT PRODUCTION.
(Thousands of quintals.)

	1900-1913 average ^a	1925	1926	1927	1928	1929	1930	1931	1932	1933 ^b	1934 ^b
Germany	37,650 ^c	32,173	25,972	32,801	38,536	33,492	37,889	42,333	50,031	56,044	45,326
France	88,627	89,905	63,077	75,150	76,544	91,786	62,080	71,882	90,771	96,613	90,002
Italy	49,896 ^d	65,548	60,050	53,291	62,215	70,795	57,173	66,520	75,367	81,100	63,329
Sweden	2,205	3,636	3,307	4,169	4,989	5,174	5,666	4,636	7,212	7,948	8,050
Belgium	4,954	3,940	3,484	4,430	4,685	3,599	3,602	3,761	4,185	4,101	3,898
Netherlands	1,313	1,563	1,495	1,676	1,996	1,488	1,648	1,837	3,494	4,171	4,680
Switzerland	938	957	1,096	1,121	1,156	1,145	981	1,101	1,470	1,803	1,818
Czechoslovakia	^e	<i>f</i> 10,698	<i>f</i> 9,289	12,847	14,387	14,398	13,773	11,222	14,625	19,846	13,612
Austria	2,707 ^f	2,904	2,569	3,255	3,515	3,146	3,268	2,996	3,318	3,978	3,603
All European import- ing countries	370,530	299,525	249,354	272,716	283,779	312,443	274,326	290,022	345,244	375,432	343,382
Danubian exporting countries ^g		80,675	79,950	74,124	99,937	82,445	90,005	100,826	60,962	100,011	67,678
Four principal export- ing countries ^h	306,121	374,913	440,834	478,603	541,688	385,422	477,982	452,834	448,449	342,704	315,919
World	1,028,645	1,111,049	1,156,726	1,194,200	1,284,706	1,171,800	1,328,500	^e	1,245,900	1,285,729	^e

^a Present frontiers. ^b Provisional. ^c 1911-1913. ^d Not exactly comparable with later years. ^e Hungary, Roumania, Bulgaria, Yugoslavia, U.S.A., Canada, Argentina, Australia.

(From Publications of the International Institute of Agriculture.)

Table 15.

IMPORT BALANCES OF WHEAT AND WHEAT-FLOUR.
(Thousands of quintals.)

	1909-10 to 1913-14 average ^a	1925-26	1926-27	1927-28	1928-29	1929-30	1930-31	1931-32	1932-33	1933-34
Germany	18,599	15,506	24,931	24,099	21,166	13,039	8,475	6,311	1,366	^b
France	11,877	7,485	16,946	12,819	14,506	2,982	16,553	20,977	8,667	4,674
Italy	14,483	18,507	23,578	23,895	23,917	11,524	22,136	9,052	3,019	2,356
Sweden	1,917	1,662	1,632	2,280	2,177	1,979	1,322	1,858	879	327
Netherlands	5,980	7,292	7,582	8,261	8,018	8,210	9,461	8,453	7,402	6,128
Switzerland ^c	4,606	4,251	4,441	5,010	4,522	4,349	5,032	5,745	5,197	4,786
Belgium	13,732	10,681	10,763	11,398	11,430	11,522	13,212	12,670	10,686	11,382
Austria	2,871	3,898	4,463	4,331	3,845	5,171	4,238	3,670	3,605	2,807
Czechoslovakia		5,623	5,322	5,646	4,572	3,594	4,673	6,694	3,250	47
All European importing countries (excluding U.K.)	58,800	90,390	117,867	117,979	120,150	82,499	104,879	99,448	57,581	55,982
United Kingdom		51,799	58,793	57,870	54,480	55,753	61,147	65,280	58,575	59,216
Total European importing coun- tries	138,396 ^d	142,039	176,465	175,849	174,630	138,252	166,026	164,728	116,156	107,033
World total	161,803 ^d	192,675 ^e	207,680 ^e	223,192 ^e	209,508	156,332	184,961	182,260	139,398	115,587

^a Pre-war frontiers. ^b Export balance. ^c Wheat only. ^d Average of calendar years 1909 to 1913. ^e Average of totals of two calendar years.

(From Publications of the International Institute of Agriculture.)

In each case, the decline is very largely due to the reduction of imports into Germany and Italy. Germany's imports of beef and veal fell to negligible proportions in 1933, whereas until 1930 she was the largest European importer except the United Kingdom. Though she was still importing a small quantity of cattle in 1933, Germany in that year was dependent on foreign supplies for only 1% of her beef and veal requirements as against nearly 20% in 1927.¹ Italy retains the second place, which, according to the figures of *Table 16*, she took from Germany in 1930, among Continental importers of beef and veal, but her imports have declined continuously since 1929 and amounted in 1933 to only 60% of the average for the years 1925 to 1928.² Up to the season 1930-31, Germany and Italy were likewise the two largest Continental purchasers of wheat and wheat-flour; but Italy's imports in 1933-34 were little more than a tenth of her average imports for the seasons 1925-26 to 1928-29, and were less than the imports of Switzerland or Austria; while Germany has now actually achieved a small export balance and it is anticipated that an export balance will also be recorded for France during the current season.

Belgium, the Netherlands, and Switzerland appear to be the only important Continental countries which are not rapidly approaching self-sufficiency as regards wheat. The relative stability of British imports is in striking contrast with the fall in Continental imports; it has brought about a rise in the British share of the European total since 1928-29 from under a third to over half.

Table 16.
IMPORT BALANCES OF BEEF AND VEAL.
(Thousands of tons.)

	1909-1913 (average)	1925	1926	1927	1928	1929	1930	1931	1932	1933
Germany	23.6	160.3	146.3	150.9	104.3	81.5	49.3	2.6	2.5	0.6
Italy (includes other meats)	2.4	101.8	51.7	50.6	51.3	60.7	55.1	43.8	40.3	38.3
France	(Export)	97.9	70.1	52.9	8.0	11.8	37.8	64.1	30.7	23.0
Belgium	7.9	61.1	28.5	41.2	21.5	22.5	32.8	38.0	24.1	26.7
Austria (includes other meats)	^a	33.4	39.0	34.7	37.4	30.7	30.4	25.1	9.3	6.9
Netherlands	(Export)	10.0	7.3	(Export)			14.4	13.2	6.7	6.7
Switzerland (includes other meats, excluding pork)	7.4	1.2	1.4	1.3	1.6	1.6	1.6	1.7	1.2	0.8
Czechoslovakia (includes other meats, excluding pork)	^a	9.1	6.4	1.6	0.1	0.9	2.5	0.7	(Export)	0.1
Principal European importing countries, other than United Kingdom	^a	475.2	351.0	333.7	224.5	210.5	224.2	189.5	114.9	103.1
United Kingdom	407.8 ^b	695.7	726.9	722.3	665.7	634.6	640.9	661.1	613.0	607.7
Principal European importing countries, including United Kingdom	^a	1,170.9	1,077.9	1,056.0	890.2	845.1	865.1	850.6	727.9	710.8
All principal importing countries ^c	^a	1,191.7	1,117.2	1,122.4	974.2	936.3	915.4	883.1	751.4	742.6

^a Not available.

^b Includes essences and extracts.

^c Includes others not shown separately.

(*Cattle and Beef Survey*, Imperial Economic Committee, page 337.)

¹ *Cattle and Beef Survey*, pages 257 and 258.

² The Italian figures, however, include other meats.

Table 17.
IMPORT BALANCES OF CATTLE.
(Thousands of head.)

	1925	1926	1927	1928	1929	1930	1931	1932	1933
Germany	168	206	331	319	317	173	54	79	40
Italy	41	58	84	189	265	263	98	77	117
Belgium	9	5	35	17	26	58	60	44	27
Austria	136	132	125	142	98	88	54	11	19
Switzerland	36	20	8	3	7	10	22	(Export)	
Czechoslovakia	146	67	19	6	93	96	20	1	^a
Principal European importing countries, other than United Kingdom	536	488	602	676	806	688	308	212	203
Great Britain	893	800	721	855	884	972	861	763	761
Total, all principal im- porting countries ^b .	1,883	1,965	2,178	2,447	2,689	2,355	1,625	1,421	1,370

^a Negligible.

^b Includes others not shown separately.

(Cattle and Beef Survey, page 328.)

Continental European trade in butter has also undergone marked reduction in recent years, although it was steadily increasing until 1930. Germany, whose imports accounted for over 90 % of the total net imports of Continental Europe in 1929, took in 1933 less than half the quantity imported in that year. But other Continental countries increased their imports between 1929 and 1931 and, in spite of restrictions imposed since then, France and Belgium were still importing larger quantities in 1933 than in 1930. The great increase of British imports, amounting to 57 % between 1928 and 1933, has prevented any serious reduction in the European total from the high point reached in 1931. British imports in 1932 and 1933 reached a figure in excess of the total of world imports in the years prior to 1928.

Table 18.
IMPORT BALANCES OF BUTTER.
(Thousands of quintals.)

	1925	1926	1927	1928	1929	1930	1931	1932	1933
Germany	965	977	1,082	1,264	1,354	1,329	1,001	693	591
Belgium	38	14	^a	^a	30	91	176	205	121
France	^a	^a	^a	^a	^a	4	135	83	61
Switzerland	86	80	84	81	75	85	106	37	5
Italy	^a	^a	^a	9	1	6	22	14	7
Czechoslovakia	4	4	6	^a	1	^b	16	12	6
Europe, excl. U.K. . .	1,127	1,128	1,219	1,380	1,478	1,538	1,476	1,057	^c
United Kingdom . . .	2,789	2,833	2,828	3,016	3,183	3,372	3,912	4,131	4,440
Europe, incl. U.K. . .	3,916	3,961	4,047	4,396	4,661	4,910	5,388	5,188	^c
World	4,139	4,219	4,374	4,749	5,087	5,353	5,654	5,445	^c

^a Export balance. ^b Negligible. ^c Not available.

(From publications of the International Institute of Agriculture.)

European trade in cheese has remained rather more stable than the trade in the other commodities here surveyed. The reduction of Germany's imports by nearly 40% between 1929 and 1933 is again the outstanding feature of the period, but her place in the world's import markets has to some extent been taken by other countries; Belgian imports have been tending to grow, and French imports, though falling sharply since 1931, were nevertheless larger in 1933 than in 1929.

Table 19.
IMPORT BALANCES OF CHEESE.
(Thousands of quintals.)

	1925	1926	1927	1928	1929	1930	1931	1932	1933
Germany	730	631	706	598	643	599	513	474	395
Belgium	165	145	161	173	207	228	221	205	218
France	22	14	61	8	47	121	220	105	95
United Kingdom . . .	1,495	1,498	1,454	1,485	1,476	1,541	1,433	1,495	1,506
World	2,973	2,931	3,075	2,964	3,020	3,061	2,931	2,744	^a

^a Not available.

(From publications of the International Institute of Agriculture.)

(d) *The Position of Overseas Exporting Countries.*

It would of course be a mistake to attribute the economic difficulties of the agricultural countries outside Europe wholly to the protection of agriculture by industrial countries. The present economic position of many of the overseas exporting countries is also greatly affected by the decline in the demand for industrial raw materials which has been brought about by the general depression, and to some extent also by their status as debtors in a world in which the international movement of capital has virtually come to a standstill. European protection must be named with these other influences as one of the three major causes from whose joint operation there has resulted a significant change in the economic relations between these countries and the rest of the world.

European agricultural production, as the figures given in previous tables show, was expanding before the period of extreme protectionism commencing in 1929. In part, this expansion was due to the encouragement given by the tariffs on agricultural products, which, as has already been pointed out, were becoming increasingly prevalent after 1925; in part, it represents a spontaneous recovery from the abnormal post-war situation. To whatever cause it was due, its effect was to hinder the development of world trade in agricultural products, and to prevent them from sharing fully in the marked general expansion of world trade between 1925 and 1929.

The quantum of world trade, as measured by the League of Nations index numbers, increased by over 20% between these two dates. But the volume of trade in agricultural products, if we may judge from the quantity indices of exports from a number of agricultural countries throughout the world, increased over this period by only about 16%.¹ and virtually the whole of this increase had already been achieved by 1928, whereas the exports of European industrial countries showed continued progress between 1928 and 1929.

¹ V. P. TIMOSHENKO. "World Agriculture and the Depression", pages 112 and 113.

As far as the trading position of the agricultural countries was concerned, of course, changes in the value of trade were of greater importance than changes in its volume. In *Table 20* are presented figures showing the total volume of imports and exports for certain groups of countries. It will be seen that the exports of the group of non-European agricultural countries declined in value after 1925. The value of their imports on the other hand increased steadily until 1929. In that year, the value of their imports was 16% greater, and of their exports 8% less, than in 1925.

Up to 1929, the growth of imports into agricultural countries—to which of course the growth of world trade in manufactured products was itself in great part due—had been largely made possible by international borrowing. Of a total of nearly ten milliards of dollars worth of new foreign securities issued in the years 1924 to 1928 on the four chief capital markets of the world, 5,007 millions, or over 50%, were issued on behalf of agricultural countries outside Europe. The figures are given in *Table 21*.

Table 20.
EXPORTS AND IMPORTS OF CERTAIN GROUPS OF COUNTRIES.
(Millions of gold dollars.)

	Non-European agricultural countries <i>a</i>		European industrial countries (excluding U.K.) <i>b</i>		United Kingdom		World	
	Exports	Imports	Exports	Imports	Exports	Imports	Exports	Imports
1925	5,027	3,776	8,034	9,723	3,734	5,633	30,708	32,164
1926	4,426	3,944	7,828	8,753	3,173	5,421	29,770	32,117
1927	4,742	4,181	8,613	10,224	3,451	5,331	31,378	33,764
1928	5,025	4,225	9,180	10,573	3,521	5,233	32,839	34,742
1929	4,604	4,382	9,463	10,762	3,549	5,407	33,040	35,601
1930	3,346	3,293	8,129	9,057	2,778	4,658	26,495	29,087
1931	2,388	1,964	6,282	6,727	1,772	3,585	18,908	20,818
1932	1,869	1,396	3,886	4,632	1,280	2,276	12,926	13,996
1933	1,769	1,212	3,480	4,190	1,213	2,073	11,699	12,483

a Argentine, Australia, New Zealand, British India, Union of South Africa, Canada. The figures include the value of South African imports and exports of bullion and specie; and also Canadian exports of bullion and specie of domestic origin.

b Germany, France, Netherlands, Belgium, Italy, Czechoslovakia, Sweden, Switzerland, Austria.

(From *Statistical Year-Books* of the League of Nations.)

Table 21.
ISSUES OF FOREIGN SECURITIES IN THE UNITED STATES, UNITED KINGDOM, THE NETHERLANDS, AND SWITZERLAND, 1924-1928.
(In millions of dollars.)

Countries for which issued:

Non-European agricultural	5,007
European agricultural	816
All agricultural	5,823
European industrial	3,233
Germany (included above)	1,624
Japan	400
United States	38
All industrial	3,671
Other	238
Total	9,732 ^a

a The total excludes issues in Switzerland in 1924 and 1925.

(Source: TIMOSHENKO, *op. cit.*, page 54, compiled from figures published by the Institut für Konjunkturforschung.)

This abundant flow of capital, however, was brought to an end in 1929 by the severe international stringency of credit which resulted from the speculative boom in New York and the continuing import of gold into France. This by itself would have created considerable difficulties for countries which had come to rely upon foreign loans for the balancing of their international accounts. In the absence of fresh borrowings, the charges imposed by the service of the loans they had already raised could in the long run only be met by an increase in their exports of goods and services relatively to their imports, but in fact their trading position had seriously deteriorated.

The increase of agricultural production throughout the world had already produced symptoms of over-production in a number of important commodities. World stocks of wheat rose from 14.4 million metric tons on August 1st, 1925, to 19.2 and 26.4 millions at the same dates in 1928 and 1929. The price of No. 1 Northern Manitoba at Winnipeg fell from an average of 163⁷/₈ cents per bushel in 1925 to 133³/₈ cents in 1929. Similar movements occurred in the stocks and prices of a number of other food products and raw materials.

Finally, in 1929 there was a serious contraction in the favourable balance of merchandise trade of the most important non-European agricultural countries, partly in consequence of poor cereal harvests in the extra-European countries, coinciding with exceptionally good harvests in Europe. Thus the agricultural countries were faced with a situation of serious disequilibrium, while the world market for agricultural products was in a condition of instability which made it impossible for prices to withstand the shock of the financial crisis in the agricultural countries and their efforts to increase their exports on a falling world market.

The precipitate fall of prices which ensued intensified the financial problems of these countries and, after experiencing heavy losses of gold (see *Table 22*), a number of them were rapidly forced to abandon the gold standard. The Uruguayan currency was depreciated in terms of gold from the early months of 1929. The conversion office in Argentina was closed in December 1929, Australia left the gold standard early in 1930, and Brazil followed in the summer. The Canadian currency was at a discount during the latter half of 1929, though it returned to parity in 1930. By the end of 1930, the Argentine, Brazilian and Uruguayan currencies were each depreciated by 20% or more; the Australian by 8% and the New Zealand by 4%. By the end of the following year, the depreciation in Argentina was 40%; in Brazil almost 50% and in Uruguay 67%; the Australian pound was at a discount of 20% in terms of sterling, which was equivalent to a discount of about 47% in gold.

The assistance which currency depreciation gave in the task of restoring equilibrium in the balance of payments, however, was lessened by the continuing fall in world prices. In consequence, the agricultural countries sought to limit their imports by higher tariffs. Duties on manufactured goods were drastically increased in many of these countries during 1930 and 1931, beginning with the Australian tariff revision in the later months of 1929.

Table 22.

NET MOVEMENT OF BULLION AND SPECIE: FOUR AGRICULTURAL COUNTRIES OUTSIDE EUROPE. ^a
(Millions of gold dollars.)

(+ = net export; — = net import.)

1926	+ 91	1930	+ 119
1927	— 42	1931	+ 226
1928	+ 10	1932	+ 97
1929	+ 275		

^a Australia, New Zealand, Argentina, Canada, Union of South Africa and India are excluded from this table, since their trade in gold is predominantly of a merchandise character. The figures, however, include Canadian exports of bullion and specie of domestic origin, which are also included in *Table 20*.

(From *Accounts relating to the Trade and Commerce of Certain Foreign Countries and British Countries Overseas*, Board of Trade, 1928-1933; *Canada Year-Books*, and *Anuario Comercio Exterior de la Republica Argentina*. Dollar exchange rates from *League of Nations Statistical Year-Book*, 1933-34.)

This, in broad outline, is the situation to which the increasing agrarian protectionism of Europe already described was both the response and the further aggravation. The financial situation of the overseas countries could only be eased by an increase of their exports relatively to their imports, and a reversal of the unhealthy position which up to 1928 was concealed by their abundant imports of capital. But, if world trade were not to suffer in the process of reaching this readjustment, it was necessary that equilibrium should be restored by an increase in the exports of the overseas agricultural countries rather than by a diminution of their imports. This increase in their exports, however, was prevented in part by the deflation and industrial depression which credit restriction had set in motion throughout the world by the end of 1929, with a consequent diminution of the demand for industrial raw materials; and in part by the measures of agricultural protection introduced by European importing countries. Thus the fall in the prices of agricultural products continued without stimulating the necessary increase in the effective international demand for them; and the countries whose export trade was dependent on these products could only balance their accounts by reducing their purchases of manufactured goods from the industrial countries.

By this means, the centre of gravity of the world depression was shifted from the agricultural countries to the industrial countries themselves. The direction in which the depression was moving can be seen by comparing the changes in the gold value of exports from the different groups of countries, for which data are presented in *Table 20*. Exports from the non-European agricultural countries declined considerably faster in the earlier years of the depression than exports from European industrial countries, but after 1931 this tendency was reversed. Similarly, the proportion of the total decline in world exports which was accounted for by the decline of exports from European industrial countries rose from 32% between 1929 and 1930 to 37 and 48% in the two following years. The share of the total decline of exports borne by the group of non-European agricultural countries was 19% between 1929 and 1930, falling to 13.9 and 8% in the succeeding years.

The shrinkage of the market for industrial products in the chief agricultural countries may be studied in the tables regarding the distribution of trade which are given in *International Trade Statistics* (1931 and 1932), published by the League of Nations. From these tables it can be calculated that the gold value of exports from industrial countries to agricultural countries outside Europe declined between 1928 and 1932 by about 70%. More important than the decline in absolute values, however, is the change in the proportion of the exports of industrial countries which were taken by the agricultural countries outside Europe. The industrial countries as a whole were selling a markedly smaller percentage of their exports to the non-European agricultural countries in 1932 than in 1928. Further, the decline of the total imports of the non-European agricultural countries between these two dates appears to have been substantially less than the decline in their imports from the industrial countries. Thus, not only are the industrial countries being forced to rely on other markets for the disposal of an increasing fraction of their exports, but industrial products generally are forming a diminishing proportion of the imports of the overseas agricultural countries.

The counterpart of this development is the growing industrialisation of many of the countries hitherto largely specialised in agriculture. To the stimulus given to the development of local industries by higher tariffs on industrial products has been added the influence of the severe fall in the prices of agricultural products relatively to those of manufactured goods. This has brought about a marked decline in the quantity of imported manufactures obtainable in return for a given quantity of agricultural exports, and has therefore involved a pronounced adverse change in the terms of trade of almost every agricultural country. Thus the depression has served to accelerate the industrial development already evident in a number of agricultural countries for many years.

The industrialisation of Japan, for example, has been quickened, especially as

regards textile manufacture, by the decline in the export trade in raw silk to the United States. China has been similarly affected by the decline of the export of silk and tea and is undergoing extensive industrial development, again most notably in the manufacture of textiles. The wool textile industry in Australia and New Zealand has grown rapidly during the depression, while in certain South-American countries, particularly Chile and Peru, the textile and other industries are becoming increasingly important. Similar developments are occurring in some of the agricultural countries of Europe, such as Denmark and certain Balkan countries. Turkey has followed the Russian example in adopting a five-year plan, in which the cotton industry figures prominently.

Many other such examples could be quoted. They illustrate a widespread tendency which is obviously of the greatest possible significance for the industrial countries. The industrialisation of undeveloped regions is of course to some extent the inevitable result of technical progress and the diffusion of knowledge. But it is also in part the logical answer of the agricultural countries to the agrarian policy of the industrial countries themselves.

IV. Conclusions.

In conclusion, the developments which this memorandum attempts to analyse may be summarised as follows:

(1) The principal industrial countries of Europe have been engaged since 1925 in stimulating the domestic production of agricultural commodities at artificially high prices. These high prices prevent consumption from expanding and absorbing the increased production.

(2) In order to maintain high prices, the imports into these countries from the more economic agricultural producers have been restricted. The latter have to force their produce on the restricted world markets, with the result that world prices fall, and, in an effort to recoup themselves for lower prices, they also tend to expand production, thus accentuating the fall of world prices.

(3) In view of the resultant decline in their income from exports, the agricultural countries have rectified their balances of payments by reducing their importation of manufactured products from the industrial countries of Europe (and also in many cases by depreciating their currencies and in some cases by defaulting on their debts).

(4) The shortage of manufactured products in the agricultural countries stimulates the development of local industries in those countries. These local industries then claim protection against the competition from the more efficient industrial producers in Europe and, in the course of time, tend to invade their export markets, thus forcing down the prices of industrial products in the world market.

(5) The distress created for the efficient agricultural producers by the loss of their markets for agricultural products in the main European industrial countries accordingly ends in distress for the efficient *industrial* producers of Europe, owing to the loss of their markets in the agricultural countries, to the general impoverishment of the whole world.

The present world crisis is the composite result of many different causes; but one of the measures which would indubitably promote world recovery would be the gradual relaxation of the present intensive agrarian protectionism of the industrial countries of Europe and its replacement by a system comparable with that which prevailed before the war. No time, however, must be lost; each year that passes creates vested interests which become more and more difficult to uproot and drives more deeply into the economic structure of the world the tendencies summarised above. It is surely in the interests of all countries to promote as rapidly as possible a more economic system of production and interchange of commodities between the industrial and the agricultural countries.

ANNEX II.

THE GENERAL EVOLUTION OF AGRICULTURE AT THE END OF THE NINETEENTH CENTURY AND BEFORE THE WORLD WAR IN RELATION TO THE GROWTH OF AGRICULTURAL PROTECTION.

The Agricultural Competition of the Overseas Countries.

Until about 1870, the agricultural market of the old European countries was able to maintain itself in comparatively favourable conditions. It had only to reckon seriously with a certain number of more or less neighbouring markets, whose output capacity remained within known limits, and it had no need to worry about what was happening overseas; a world market, and consequently a world price, in the present meaning of the terms, did not yet exist. But, during the 1870's, an economic revolution took place in Central and Western Europe.

In the course of a few years, the barrier of distance, which had isolated the more distant markets and prevented them from bringing over their foodstuffs, was broken down. For the first time, Europe became an outlet for these products; new and rapid means of communication were established from continent to continent and their utility was considerably increased by the reduction of tariffs. The cost of transport fell considerably; after 1872, it declined in a few years by over half for wheat sent by rail from Chicago to New York.

By the convenient ocean route, American wheat arriving in Europe cost less than the wheat grown in the neighbouring countryside. The enormous decline in sea freights made it possible "to bring a sack of wheat more economically from America to Europe than from Dijon to Paris". The slowness and small capacity of carts made it impossible to sell most of the agricultural products at any distance. The growth of railway transport in the newly colonised overseas areas is in the nature of a prodigy. Previously, railways had only been built when an area was beginning to find markets, but now they were being constructed even before agriculture had a market, and, in order to create outlets, production was anticipated on and extended to wider and wider territories. The more railways multiplied the greater became the danger to the agriculture of Europe, which became the market for the farm products of the whole world: particularly cereals, various vegetable products, and even animal products. All markets became dependent on one another.

The consequences of this economic upheaval were entirely to the advantage of the new countries, possessing a virgin and often fertile soil, not burdened by rents or taxes inherited from the past, where the cost of land was very low and where it gave a crop without arduous toil, without fertilisers and without great cost, much in excess of the requirements of a sparse population. Old Europe was in no position to stand up against such competition from worldwide production, the abundance and cheapness of which precluded any resistance. The tilling of the soil ceased to be remunerative to European farmers and no longer provided the rural populations with a livelihood; they deserted the countryside and crowded into the towns. The same movement took place throughout the whole of industrialised Europe.

Wheat.

One after the other, when they had equipped themselves and developed land of superlative value, the new countries suddenly stepped upon the stage with their wheat.

The first focus of all eyes was the United States, owing to the immense increase in their agricultural production as a result of the railways built after the War of Secession. The number of farms rose from 2 millions in 1860 to 4 millions in 1880, and to 5.7 millions in 1900. In the same years, the area under cultivation was successively 66, 115 and 168 million hectares. Connected with the continent of Europe by railways and transatlantic lines, the immense prairies of the Far West, which were rapidly becoming populated, were able to pour into Europe millions of quintals of wheat on exceptionally advantageous terms. A simple ploughing of fertile land gave high yields. Accordingly, imports of American wheat, which from 1861 to 1870 had represented only 30 % of British imports, constituted 65 % in 1881. United States wheat and maize penetrated as far as Bohemia. The surface under wheat rose in the United States from 1870 to 1880 by 7,700,000 hectares and, after the ten years' stoppage caused by the fall in prices, it rose from 1890 to 1900 by 7,020,000 hectares. Altogether, the area sown amounted to 20,000,000 hectares in 1903, and the production of wheat rose from 425 million bushels in 1876-1885 to 477 millions in 1886-1895, and from 633 millions in 1896-1900 to 700 millions in 1901-1905.

The United States were joined by Canada in the 'eighties, by the Argentine in the 'nineties and, with somewhat smaller quantities, by Australia. The areas under wheat in Canada rose from 925,000 hectares in 1881-1885 to 1,307,000 hectares in 1896-1900 and 1,787,000 hectares in 1903. In the Argentine, they amounted to 1,592,000 hectares in 1891-1895, 2,762,000 hectares in 1896-1900 and 3,919,000 in 1901-1905. In Australia, they covered 1,304,000 hectares in 1876-1880, 1,535,000 in 1886-1890 and 2,177,000 in 1896-1900.

But, as regards wheat, all the overseas countries were left behind by the Russian Empire, which, with the development of its railways, became the greatest exporter of cereals in the world and the principal supplier of Europe. In 1903, 21,135,000 hectares of wheat were cultivated in European Russia, which exported 42 million quintals.

The Agricultural Depression of 1875-1895.

The competition of the new producers caused a fall in prices and a glut on the market. From 1875 onwards, wheat quotations fell continually. During the 'eighties they fell by over a quarter. Chiefly owing to Russian and Argentine competition, they fell in 1894 and 1895 to low levels unprecedented in England for a century and a-half, being then only 43 % of the average level of the prices prevailing between 1851 and 1875. The prices of other cereals—barley, oats, rye—although showing a marked decline, remained more profitable than that of wheat.

In the face of such a fall in prices, the value of land declined considerably. In 1895, farm rents in England had fallen by half in twenty-five years. In France, in the middle of the century, every plot of land was eagerly bid for at high prices by numerous buyers; but henceforth capital became gradually diverted from investments in land.

While agriculture was expanding in the overseas countries and Russia, European agriculture went through a period of severe depression which lasted for some twenty years, from 1875 to about 1896. There can be no doubt that this long and intense agricultural depression had numerous causes, and that the currency contraction that occurred in all

countries of the world powerfully contributed to the general fall in prices. But the influence exercised by the competition of the new countries was predominant.

It was at this period that the first International Agricultural Congress was held in Paris, in July 1889, with Jules Méline, of the Vosges, as President. He founded the International Commission of Agriculture, which henceforward organised periodical international congresses, the solemn assizes of the agricultural world. These congresses saw the appearance and discussion of ideas which had, and still have, a long road to go; an international agreement on wheat production, Customs preference for European agriculture, a European Customs Union.

"The agricultural crisis", said a French speaker at the 1889 congress, "is a much more serious matter for us than a successful or an unsuccessful war". In many countries, Parliamentary and other Commissions held enquiries into the state of agriculture.

Effects of the Agricultural Depression.

(1) *Industrialisation of Agriculture.*

The agricultural depression accelerated the transformation of agriculture. Under the influence of this tidal wave, countries found themselves obliged to intensify their production: to produce cheaply you must produce on a large scale. Spurred on by a ruthless competition, farmers abandoned the traditional routine and followed the general current by which industrial progress was being swept along. Strenuous efforts were made to do better. Fallow land disappeared. Processes were perfected; the yield of cultivated land rose: on some big German estates, it has doubled since the middle of the century.

Farming was industrialised gradually; the old methods of reaping with a scythe, threshing with a flail and winnowing by throwing the wheat into the air with a shovel were abandoned. Mechanical mowers, reapers, threshers and corn drills came into use. Improved ploughs and iron harrows took the place of the rudimentary instruments which barely scratched the soil. Agricultural machinery made astonishing progress, stimulated by the dearth and scarcity of labour, which was absorbed by industry. For it was mostly after the departure of the labourers that machinery made its appearance on the farms. Agriculture became closely akin to industry.

The use of chemical fertilisers to rejuvenate old land was intensified and popularised. Imports of guano, which had grown since the middle of the nineteenth century, fell off, but were in large measure counterbalanced by the great increase in saltpetre from Chile. The production of potassium salts rose considerably. The use of phosphates and phosphated slag led to higher yields.

A scientific technique was brought into rural labour side by side with traditional experience. Up-to-date farmers were trained by schools of agriculture. Studies begun in the laboratory were completed on the farm. The big estates gave practical demonstrations of the theories concerning the nourishment of plants and the improvement of the soil by means of special fertilisers.

Cross-breeding with superior strains improved the population of the stables and poultry yards and diminished mortality. Thanks to selection, new varieties of wheat, potatoes and beetroot suitable to the soil and climate, more prolific than those previously harvested, led to greater yields. Testing stations and experimental farms enabled the best seeds to be discovered.

Agricultural exhibitions multiplied, promoted by the State which encouraged the efforts of farmers and steadily increased its subsidies, while agricultural credit institutions grew apace.

The progress of production in the agriculture of the civilised world became a matter of rule. It was particularly swift in certain countries where the necessary plant was more generally adopted, where the consumption of fertilisers was greater and where the methods of selection applied to plants and animals were better observed.

The peasants gradually abandoned their ingrained habits of isolation and adopted a system of co-operation whereby the advantages of agrarian individualism could be enhanced by those of large-scale cultivation armed with all modern appliances. Passing from the state of a more or less closed economic society to that of a trading economic society, they found in co-operative credit and supply societies an effective weapon of defence against usury and the fraudulent practices of traders in fertilisers. In the countries of small-holdings, the syndicates informed growers of the most suitable fertiliser, guaranteed its quality and gave them the benefit of wholesale prices; at the same time, they encouraged the joint purchase of machinery. Mutual insurance and credit societies multiplied, and co-operative societies for production were organised. Rural associations developed, slowly in some countries (in 1884, France still had only five agricultural associations), faster in others, such as Germany and particularly Denmark and the Netherlands, where co-operative societies for the transformation and sale of farm products made it possible to adapt the agricultural system to the exigencies of disposal on large and distant markets.

(2) *Agricultural Protectionism.*

The agricultural world saw its chief hope in a return to the bygone protectionist policy. The old free trade optimism had been crushed by the economic depression. The interests affected joined hands to secure a privileged position for themselves in the home market. The farmers and their champions, who arose on all sides, laying down the law in parliament and in the Press, appealed to national security: we must, they said, in case of war be able to obtain from our own soil the means of covering the requirements of national consumption.

Every country in which agriculture still occupied a predominant place in the general economy was impressed by these arguments. It was anxious to provide its agricultural workers with the weapons needed to enable them to compete on equal terms with the foreigner and to prevent a rural exodus. It saw only one means of checking the influx of foreign products: to surround itself with a protective tariff wall. Those who were still hesitating were soon won over by the prospect of equalising production costs by means of countervailing duties.

The agricultural crisis caused by transatlantic competition thus led to an efflorescence of Customs tariffs. At first, the chief benefit was felt by farmers, but protection was very soon extended to production as a whole; this was all the more natural in that the agricultural crisis was followed by an industrial crisis mainly due to over-production and aggravated by a decline in the purchasing power of the rural classes who restricted their consumption of manufactured articles.

The growth and improvement of means of transport brought about a reaction in favour of protectionism. Henceforward, Europe, which in the 'sixties had inclined towards free trade principles, following England's lead, put on a heavy protective armour. This *volle-face* became very marked after 1878 and protectionist doctrines steadily gained ground. They spread by a sort of contagion, since protection invites protection. High duties began to be established as a weapon for use by negotiators against the protectionist systems of the foreigner. The possibility of balancing heavy budgets by means of the Customs revenue, and thus making good the deficit caused by the economic depression, contributed towards the growth of protection. Each time a tariff was revised, heavier duties were imposed for the benefit either of industry or of agriculture.

The economists sought for and developed new formulas for protectionism and, in the United States in particular, Patten demonstrated, in 1890, "the economic foundations of protection". The technique of protectionism was improved. Tariffs began to embody minute specifications—an excellent lever of protection, since they made it possible, on the one hand, to levy heavier duties on certain products which had hitherto been included with others of less value and, on the other, to prevent the concessions granted to one country from being extended to nations that merely enjoyed most-favoured-nation treatment.

Protectionism in Germany.

The impetus of Germany—and of Bismarck—was not unrelated to Europe's return to a protectionist policy.

Bismarck was a keen agriculturist. He had for a long time led the life of a gentleman farmer; he took a genuine interest in the land, grain, fodder and potatoes. "I am more moved by a beetroot", he said, "than by the whole of politics."

For Bismarck, the trend of economic policy was still determined by the agricultural situation of Germany. The Chancellor was an ardent protectionist; he was convinced that free trade was not in accordance either with contemporary requirement or with German interests.

After Rudolf von Delbrück's departure in 1876, he took charge of economic questions himself. He decided to adopt protective duties and won over the Conservatives to his view. Like the other parties, the latter had long neglected economic questions, but they put agricultural interests above everything else. They were opposed to the establishment of protective duties for the metallurgical industry, as they would have done harm to agriculture by increasing the price of agricultural machinery. In the early years of the Empire, Germany still exported grain, mainly to England. German agriculture was suddenly deprived of the English market by American competition, and imports of Russian wheat into the Reich were increasing. The Conservatives at once clamoured for protection. In July 1879, they voted to a man in favour of the new Customs tariff, in which the duties were greatly increased and new duties were levied on products such as grain, live-stock, iron, etc., which had previously been admitted free.

After the protectionist tariff of 1879, Germany steadily increased her Customs duties. After Bismarck's retirement, high duties were maintained, but a large number of long-term commercial treaties were concluded. German industry, which had made gigantic strides during the last fifteen years needed new outlets; it had acquired a vigour so robust that it could do without ultra-protectionist tariffs. It was necessary for it to obtain advantages for its manufactured products in foreign markets. An attempt to do so was made in 1891 by means of the Caprivi treaties; Germany's output then covered all branches of activity, but she was appearing more and more in world markets as an industrial State. In return, certain concessions had to be made as regards import duties on agricultural products. Nevertheless, agricultural protection was retained. As agricultural prices continued to fall it was increased. Thanks to the efforts of the Farmers' Union ("Bund der Landwirte"), which preached the necessity for a healthy agriculture, the duties were increased, even though prices rose again. In 1879, Germany introduced a duty of 1 mark per 100 kg. on wheat and rye; this very low rate was gradually raised to 3 marks in 1885 and 5 marks in 1887. It was reduced on several occasions when the harvest was particularly good to 3.50 marks in 1893 and 1906, but was increased to 5.50 marks in the 1902 tariff which came into force in 1906.

However, from an agricultural nation Germany was rapidly changing into an industrial nation, and the balance between agriculture and industry in the national economic

system was upset. While the agricultural population remained stationary and even dropped slightly (26,500,000 inhabitants in 1880, 25,800,000 in 1890, 25,700,000 in 1900), the total population rose from 45,200,000 inhabitants to 49,000,000 and then to 56,500,000. This enormous increase in population was absorbed in trade and industry, which were attracting larger and larger armies of workers. From 1895 onwards, the urban population exceeded the rural population.

The Customs revision undertaken in 1902 came to the relief of agriculture. In order to restore the economic equilibrium of the Empire, industry was obliged to agree to an increase in the protective duties on agricultural products, although it, too, was granted increased protection.

Protectionism in France and in Other European Countries.

This protectionist trend was not confined to Germany. France was the more keenly attracted by protectionism in that the Treaty of Frankfort ensured most-favoured-nation treatment to her adversary for an indefinite period. In France, the erroneous belief was firmly held that this clause had been imposed by Germany and was of a one-sided character. The only means of obviating the consequences of this clause and at the same time excluding imports from Germany was to yield to the pressure of the protectionists.

As early as 1878, protectionist tendencies, which are traditional in France whenever the power is in the hands of a representative regime, were present in the Chamber of Deputies. At the instigation of Méline, a vigorous champion of agriculture, the Chamber rejected the Franco-Italian Commercial Treaty negotiated by the Duc Decazes. France wished to be free to increase her tariffs. The Customs Law of 1881 instituted a definitely protectionist regime, although the duties were very moderate. The farmers protested that they had been sacrificed. In view of the collapse of prices, they succeeded in 1885 in inducing the Government to increase to 3 francs per 100 kg. the duties on wheat which, since 1861, had amounted to only 0.60 franc. In 1887, the same duties were increased to 5 francs and in 1895 to 7 francs. The duties on other cereals, flour, live-stock, meat, were also raised. Even the vine-growers, whose interests and traditions led them to favour free trade, demanded tariffs as a protection against the effects of the terrible plague of phylloxera. Lastly, industrialists considered inadequate the protection they enjoyed.

Protection was increased by the Customs Law of 1892 introducing the "Méline system". In addition to a general tariff applicable to countries which had not concluded a commercial treaty with France, it included a minimum tariff fixing the lowest rates which could be granted in future commercial conventions. In order to "give courage and confidence to French producers", the rates fixed in the tariff could not in principle be reduced. These duties were often high and, in the case of certain products, they appeared to be prohibitive.

The movement towards a protectionist policy was also gaining ground in *Italy*, which was anxious to extend her industries and to protect the cultivation of cereals. It favoured Northern Italy, whose industries were going ahead, and Milan became the economic capital of the Kingdom. Protection in a mild form was introduced in 1878; it became thorough-going in 1887.

Austria-Hungary also enacted protectionist legislation and in 1882 began with agricultural protection which acquired real vigour in 1906.

Pursuing the dream cherished in all countries, a reduction of imports in favour of exports, *Russia* granted a large measure of protection to her national agriculture and industry.

Under the influence of the Catalan industrialists and agricultural circles, *Spain* was also won over to protectionism.

In 1892, *Portugal* adopted an ultra-protectionist tariff under which the duties on certain articles were made twenty-seven times heavier than under the previous regime, which was already marked by a constant increase in protectionism.

In *Switzerland*, the general trend towards protection acquired speed from 1884 onwards. The farmers induced the Government to increase import duties on live-stock, meat, butter, etc. Swiss industries specialising in the production of luxury articles—such as embroideries, clocks and watches, silks, etc.—were particularly hard hit by the crisis. They were strongly in favour of protectionism and duties were increased. In 1891, the Swiss people approved by 220,000 votes to 159,000 an increase in the general tariff.

In 1890, the protectionists obtained a majority in the *Swedish* Diet and tariffs were accordingly revised.

Duties were also increased in *Greece* and *Roumania*.

European agriculture became converted *en masse* to the most rigorous protectionism. It supported the dogma that each country should be able to obtain from its own soil everything required for the national table. Most European States were placing themselves on the defensive, but the various national protectionist policies were beginning to clash, thus leading to a breakdown of trade relations.

In 1887, France and Italy engaged in a Customs war. For several years, they levied heavy surtaxes on goods and vessels from the neighbouring country; next, they applied to each other the mostly prohibitive rates of their general tariffs. The return to preferential treatment on both sides did not take place until November 1898. After a struggle lasting more than ten years, trade relations once again resumed their normal course. The producers of Southern Italy who were anxious to sell their dried herbs, fruit and wines suffered severely from this long rupture of economic relations with France. In less than two years, consignments of Italian produce to France had fallen off by 61 per cent. The economic war deprived France of half the business she had formerly done in the Peninsula.

From 1893 to 1895, Switzerland and France waged a Customs war, Switzerland levying surtaxes on French imports, while France applied her general tariff to Swiss imports.

Nevertheless, the progress of protectionism did not check the expansion of international economic relations, which enjoyed the benefit of Customs stability. A large number of long-term commercial treaties had finally been concluded, often after protracted bargaining. Their very duration afforded a guarantee and enabled traders to plan ahead. Compared with the ferocious protectionism which was to prevail throughout the world after the war, the Customs tariffs at the end of the nineteenth century were very moderate on the whole, their steady upward tendency being checked by the application of the most-favoured-nation clause, which was included in the majority of contractual agreements. This clause played a predominant part in the expansion of international trade, and thanks to it the development of political and economic nationalism was able to go forward *pari passu* with the enlargement of the world market.

Protection in the United States of America and in the Dominions.

The general protectionist tendencies which predominated in Europe were also to be found in the United States, which, after the Civil War, had achieved economic unity and suppressed all the economic systems peculiar to the various States. Once freedom of

trade had been established between the States within the Union, the United States systematically adopted protective measures on a constantly increasing scale of severity which closed the country to the rest of the world. They did not admit the most-favoured-nation clause except conditionally. In 1890, they adopted the tariff submitted by a Republican leader, MacKinley; protective duties, in particular on wool and woollen goods, were considerably increased. The Democrats, who came into power in 1892, desired to decrease protection, but the Senate prevented any considerable reduction; their mutilated draft became law in 1894.

When MacKinley was elected President of the Republic, he returned to a policy of extreme protection; like Méline, he was the bane of the liberal economists. In 1897, the Dingley Tariff made further increases in the Tariff of 1890. Though the duties on metallurgical products remained on the 1894 level, and were even reduced in the case of steel rails, the American metal industry could henceforward face any foreign competition, since the rates on most of its other products were higher than in 1890; in order to satisfy the agrarians, protective duties were imposed on hides and skins, flax, etc. Foreign competition had become impossible on the home market, which was reserved for the industry of the country.

Like the United States, the British overseas territories decided for a narrow protectionism.

Commercial Policy in England.

The return to Customs protection was almost general. England stood out, with some other countries such as Belgium and the Netherlands, which persevered in free trade. In England, a strong current of opinion asked in vain for a change in the Customs policy and condemned unilateral free trade with increasing force. In the first few years of the twentieth century, the name of Chamberlain became connected with a similar movement. In September 1903, he left the Cabinet in order to be free to preach Imperial protection. Though 70 years of age, he entered into the campaign with ardour. England was roused by the keen discussions between the defenders of free trade and the champions of a return to protection, but she did not allow the principles of free trade to be shaken.

Yet the agricultural crisis raged as severely in England as on the Continent and precipitated the decline of national agriculture. The low prices of foodstuffs caused a scarcity of labour. The country districts were rapidly depopulated by emigration into the towns; in 1891, the rural population had dwindled to 18 per cent of the whole from 53 per cent at the beginning of the century. From 1891 to 1901, the number of agricultural labourers declined from 1,695,000 to 915,000.

The cultivable area of the United Kingdom decreased by more than a quarter; from 1891 to 1901, it fell from 8,244,000 to 5,866,000 acres. Sowings were reduced to such an extent that national production became insignificant as compared with consumption, while the production had almost satisfied the demand in the first half of the nineteenth century. Even at the beginning of the 'seventies England was still producing as much wheat as she received from abroad; at the beginning of the twentieth century, she did not produce more than a tenth of her consumption.

Although the farmers said they were doomed, England left them without protection. They only formed a small minority. The United Kingdom, Mistress of the Seas, saw no difficulty in obtaining supplies. It had no thought of self-sufficiency and refused to change an economic system which had given so dazzling an impetus to industry and trade. It merely imposed an insignificant import duty on wheat in 1902 (1s. per quarter).

Moreover, certain categories of agriculture remained comparatively prosperous.

Wool.

Besides wheat, the crisis affected in particular wool and consequently sheep-farming. Wool, with its very high commercial value, had long brought large returns to European agriculture. But South America, the Cape and Australia, where immense areas were devoted to the breeding of sheep which, thanks to the climate, could usually be put out to graze the whole year, began to send their wool in considerable quantities; more than 146,000 tons came from Australia in 1892. The number of Australian sheep rose from 23 millions in 1861 to 106 millions in 1891. Then, as a result of drought which recurred for several years, it fell to 57 millions in 1903. In the Argentine, the number increased from 41 millions in 1870 to 74 millions in 1903.

From 1860 to 1890, wool prices fell by more than a third. This drop in value caused European agriculture to regard the sheep as a source of supply of meat rather than wool and to turn exclusively to the breeds preferred by butchers. Until then merinos had been bred with a view to improving the fleece. When a change-over was made to the raising of sheep for the table, English breeds were introduced on account of the excellent quality of the meat. These breeds do not prosper in countries with poor pasturage and they dislike drought, heat, dust and walking long distances. They are not driven out by the advance of cultivation, which is, on the contrary, necessary in order to provide them with ample supplies of clover, lucerne, mangel-wurzels, oilcake and sugar-beet pulp.

As the breeders of the Southern Hemisphere caused the wool-bearing sheep to disappear from the Old World, flocks dwindled rapidly in Europe. From 1870 to 1910 the numbers fell in Germany from 25 millions to 6 millions; in France, from 24 to 17 millions. This brought about an immense change in European agriculture, for wool-bearing sheep were replaced by cattle and pigs, which increased considerably in numbers. Cattle cannot, like flocks of wool-bearing sheep, be satisfied with poor pasture of sparse short grass and live on straw and fallow land; they need well-kept pastures maintained in a state of fertility. Suitable manure became a necessity. Agriculture was modernised. Breeding was intensified. The waste matters of the sugar and alcohol industries were employed. It became customary to keep cattle permanently in the stable. The breed was improved. The output of each animal in meat and milk increased considerably. Artificial pastures were created with lucerne, clover and sainfoin. The soil was enriched by fertilisers and nitrogen because the long tap-roots of leguminous plants penetrate deeply into the soil and exhaust it. As a result of these modern processes of cultivation which tend to the production of fodder and the development of cattle-breeding, land lies fallow for a shorter time or not at all. It no longer requires such long periods of rest. When land under fodder has been cleared, it is able to produce an abundant crop of grain.

Cattle-breeding and the Dairy Industry.

In spite of the increasing use of cold storage, it is more difficult to export overseas cattle, meat, milk, butter, fruits and fresh vegetables than wheat. Moreover, the consumers do not regard frozen foodstuffs with favour. The consumption of meat and dairy produce, which are less exposed to transatlantic competition, went on increasing with the growth of population and industry. True, rates dropped along with the prices of wheat, but the contraction was much less marked. In England, the minimum was reached for beef in 1887 with a price corresponding to 84 % of the price from 1851 to 1875, and for butter in 1895 with a price corresponding to 82 % of the price from 1851 to 1875. Prices soon began to rise considerably for meat, milk and butter.

European agriculture therefore turned towards cattle-breeding and the dairy industry. In many districts, cattle had long been used merely for supplying the family table, for the production of manure and for farm work; they occupied a purely secondary position. But in the 'nineties we find the same districts devoting wide pasture-lands to cattle. Great Britain became a vast meadow; its peasants had disappeared, but it had its parks and flocks. It replaced cereals by fodder, cattle and all the products derived from them, such as butter and cheese. The neighbourhood of large towns provided a ready sale for dairy produce and for garden products and poultry.

The English market, however, was gradually invaded by butter from Denmark and the Netherlands. These countries underwent a highly productive change and adapted themselves completely to the new conditions of the world market. Denmark achieved quite fantastic results. The country was covered by a network of co-operative societies for the manufacture of butter and cheese and for their sale on foreign markets. Joint manufacture could alone ensure exceptional quality and cheapness, while joint selling gave Danish products the advantage on foreign markets. Thanks to its exports of butter, eggs and bacon, the Danish countryside filled up again and became rich.

Holland borrowed from the Danes their excellent co-operative method together with their spirit of unity and joint work. Frisian farmers went to Denmark to study the co-operative system which had given such good results. In 1886, they founded the first Dutch dairy co-operative society in a Frisian village. The peasants of the district undertook to deliver all the milk which they did not themselves require. The rural population, abandoning their isolation, taught one another and acquired better knowledge of their business. This was to the benefit of the whole of Netherlands agriculture, which found a fortune in cattle-breeding and the sale of dairy produce.

The dairy industry has made greater progress than any other agricultural industry. In Western Europe, grain cultivation is decreasing, while the area under grass is increasing. In 1892, the relationship between grain crops and fodder crops in France was 15 to 10; in 1903, the two groups were equal; in 1913, grain only covered 13,500,000 hectares, while the area devoted to the production of fodder covered 15,400,000.

There are two causes for this regular and continuous change: the low remuneration obtained from grain cultivation and, in particular, the difficulty of finding and retaining the necessary labour. The farmer was impelled to produce meat rather than wheat because stock-raising paid better and did not require so much labour. Besides, thanks to the increased yield, wheat production continued to grow in spite of the decrease in the area under cultivation.

It was about 1870 that margarine appeared for the first time on the market as a substitute for butter and lard. It had been introduced as the result of a competition instituted by Napoleon III. Twenty years later the struggle of the agriculturists began against the margarine industry, which at the time mostly used animal fats, but came to employ vegetable oils and whale oil in increasing proportions. After 1890, the consumption of margarine—which later grew to such enormous proportions—made its first effects felt on the agricultural system as such. Up till then animal fat had been more valuable than meat, and stock-raisers aimed accordingly at the production of fat. Fat prices began to fall below the price of meat, and the producers were forced to change their methods and to concentrate mainly on the production of young animals for meat.

The Evolution of Agriculture.

The effect was not merely to industrialise agriculture in a number of regions, but to a certain extent to commercialise it—the conditions for the sale of produce being revolutionised by foreign competition.

In some cases, the agriculturist turned to easy trade returns and rapid profits. But rural property is not subject to the same "laws" of concentration as other fields of economic activity, since it cannot command the investment of capital as readily as industry or trade, for the reason that the chances of quick profits are smaller. In many respects, moreover, and particularly in connection with the labour element, small agricultural undertakings are less exposed to disappointment than large undertakings. Hence, generally speaking, small properties are not crushed by the big estates. On the contrary, small properties tend to increase in number and in area, while the position of big properties is shaken.

In the overseas countries, agriculture took the form of precipitate and speculative exploitation of new vacant lands. Even in Europe, the tendency was away from production for the consumption of the producer's family and in the direction of sales on small local markets. Agriculture became less self-reliant and worked increasingly with a view to the sale of its products, in some cases producing for the wholesale trade run by industrial establishments, mills, distilleries, sugar refineries, jam factories, etc.

Horticulture—*i.e.*, the intensive culture of fruit and even flowers—increased, while poor crops such as buckwheat and rye declined. The position of old industrial crops, which formerly prospered, was endangered largely as a result of competition and over-production.

Viticulture.

The agricultural crisis coincided with an acute viticultural crisis which dried up the income of grape-growers at the source. But the viticultural crisis was accidental, and the capitalist system could not be held responsible for it. In 1878, the phylloxera began its ravages. Anxiety was general, and in the presence of this continually increasing plague, the cultivation of the vine was rapidly disappearing. This unknown plague first made its appearance in 1865 in the south of France. It spread to Spain and Portugal in 1872, to Italy in 1879, to Algeria in 1885 and to the Cape in 1886. With very few exceptions, it made its appearance in every country where the vine was cultivated.

The causes of it have been known from the year 1868. The minute insect was discovered in the south of France, and the remedies against its ravages were clearly understood. Under the Berne International Convention of September 1878, Germany, Austria-Hungary, Spain, France, Italy, Portugal and Switzerland took the requisite measures to ensure effective common action against the introduction or propagation of the phylloxera. But the issue of the campaign against it was still in doubt; and it was not until 1880 that the plague ceased to grow worse.

From 1885 onwards, progress was rapid and victory was assured. The resistance of the American vines made it possible to reconstitute the vinelands of Europe. The United States were scoured for plants specially resistant to the phylloxera, and European viticulture was saved from disaster by the plantation of American vines.

The French vinelands had been halved by the phylloxera, and the Spanish and Italian vineyards had been hard hit. The production of French wine had fallen from 83 million hectolitres in 1875 to 25 millions in 1879.

The reconstruction of the vinelands was so rapid that it was not long before the requirements of consumption were exceeded, technical progress having increased the yield. Accordingly, viticulture experienced a new crisis which, though less tragic than the crisis produced by the phylloxera, nevertheless became disastrous at the end of the nineteenth century and the beginning of the twentieth century. A long slump prevailed on markets. Prices fell to almost nothing, and in the south of France it was not uncommon for wine to be poured into the gutter in order to salvage the cask.

Sugar.

In the case of the sugar crop, the perpetual struggle between the producers of cane sugar and the producers of beet sugar continued. In the second half of the nineteenth century, cane sugar was threatened, while beet sugar made progress. At the beginning of the twentieth century, the production of beet sugar represented more than half the total production of sugar. But this threat only served to give a vigorous impulse to the culture of the sugar cane. The planters resorted to scientific methods, and new varieties were introduced which considerably increased the yield of this form of sugar.

But the culture of the beet was so profitable that it led to over-production. It was extended in all countries, fostered by the producing States which increased the protection of this crop to the maximum, instituting bounties, direct or indirect, on the culture of the beet or the export of beet sugar, all at the expense of the public funds. Behind the shelter of the protective duties, the sugar industry, organised in cartels, increased its prices for national consumers, while with the profits thus made on the home market it was able to sell its surplus production to foreign countries at reduced rates. Competition exceeded all limits and profoundly upset the market without any advantage to any side. In the end this exaggerated dumping served to supply the principal consuming market, Great Britain, at a price below the cost of production. Sugar was sold in Great Britain at absurdly low rates, the bounties given by the exporting countries serving to offset the losses of the producers. On the other hand, sugar was sold at a very high price in the producing countries, which, in order to sell at a low price to foreign consumers, were forced to impose a heavy burden on their own population; and these high prices operated considerably to restrict consumption.

In spite of the advantages which Great Britain had long derived from this state of things, it did not remain deaf to the complaint of the British sugar-producing colonies; for the artificial reduction of prices in Great Britain was prejudicial to the production of cane sugar in the British West Indies. After difficult negotiations, an International Conference met at Brussels. Faced with a threat from Great Britain to put a countervailing tax on bounty sugar, the Conference signed in 1902 a Convention which settled the sugar question and was ratified by the majority of producing countries. It abolished all bounties, direct or indirect, whether on production or export. It fixed a low maximum for the Customs duties which each country was entitled to impose on sugar coming from the States adhering to the Convention. Provision was made for action against countries not acceding to the Convention. Their sugar was to pay, in addition to the ordinary Customs duty, a countervailing duty equal to the bounty given. The Brussels Convention led in certain European countries, especially in France, to a contraction of production and to the disappearance of a certain number of factories.

Industrial Crops.

Europe gave up the cultivation of agricultural raw materials. The raising of sheep for wool was first abandoned, and the cultivation of the silkworm also fell off. On the Mediterranean littoral, especially in the south of France, the mulberry, widely grown for the raising of silkworms, gave place to orchards, gardens and pasture. It could scarcely withstand the crushing competition of the cultivation of silk in the East, with its abundance of cheap labour afforded by an extremely dense population. In Southern China, in Tonkin, in India, the climate enables the mulberry tree to produce several crops a year, which

constitute the main food of the silkworm. This in itself affords a further advantage to Oriental labour, which is enabled to cultivate the silkworm the whole year through.

Since the opening of the Suez Canal, the silk of Asia has flooded the European market. It supplies the manufactories of Europe, as also the silk factories newly established in America, with the great majority of the silk threads they employ.

Similarly, the growing competition of cotton and ground-nut oils has gravely injured the production of olive-oils, and the cultivation of the olive-tree has been seriously affected.

The cultivation of the colza has been largely reduced since sesame and ground-nut seeds have been imported into Europe, and mineral oils have been used for lighting. Oleaginous seeds from the tropics are the subject of a vast trade.

The culture of flax and hemp has greatly diminished in Western Europe under the influence of the growing imports of foreign textiles.

The cultivation of madder, formerly a very prosperous form of culture in the South of France, is to-day entirely abandoned. Since 1869, coal-tar dyes have supplied at a very cheap rate the red colouring matter formerly derived from madder roots.

End of the Agricultural Depression.

The crisis of European agriculture ended in the latter years of the nineteenth century. From 1896 onwards, the prices of cereals began to rise, at first hesitatingly, but after 1904 in a marked degree. In 1900, the prices of the principal foodstuffs were at least 10% more than 1895. In 1913, the average price of the quintal of wheat in the United States ports was 18.20, as compared with 12.75 francs in 1892; in Liverpool, it was 17.60 French francs, as compared with 14.60. Prices continued to mount in spite of the enormous development of world production, which from 583 million quintals in 1876-1880, rose to 647 millions in 1886-1890, to 742 millions in 1896-1900, to 881 millions in 1903, and on the eve of the World War to over 1,000 million quintals.

But the international wheat market appeared to have reached some sort of equilibrium. The demand had increased faster than the harvests. Consumption grew, not merely in conjunction with the increase in population, but above all in conjunction with the general expansion of industry and trade and the increase of wealth and prosperity which tended to eliminate lower-grade cereals. The consumption of meat and butter also increased, and prices rose rapidly.

At the same time, in the overseas countries, agricultural development was less rapid than it had been in the 'seventies. The land available for settlement in the United States was now occupied. From about 1890, the limits of settlement were fixed. The call of the West, to which so many generations had responded, was no more. The age of the pioneers was at an end. Since 1900, there was a shortage of land, and speculation drove up land prices. Production was intensified and the exploitation of dry regions was developed; but there were no more new lands to bring under cultivation, and from 1890 onwards the growth of population was greater than the extension of areas under cultivation. Internal needs increased considerably. The United States turned more and more rapidly to industrialisation, and the rural element of the population quickly assumed smaller proportions in comparison with the elements living on industry and trade. Exports of agricultural industries (with the exception of cotton) became relatively less important. From 66% of the total exports in the period 1881-1885, they fell to no more than 44% in 1906-1910. Nevertheless, the quantities exported were still large, and until the beginning of the twentieth century the United States were exporting a quarter of the wheat they produced: they were still a world granary.

Western Canada and the Argentine were the next countries to be exploited, and Australia was developed in spite of rigorous restrictions on immigration. The year 1891 saw the beginning of the construction of the Trans-Siberian Railway, which opened up Siberia to the Russian peasants. Between 1896 and 1907, it was settled by 1,600,000 persons. In the vast countries outside Europe, millions of hectares were made available for the culture of wheat; but the progress made in this connection did not lead to agricultural development on the same scale as in the United States after 1870.

The difference between the agricultural systems in Europe and the non-European countries is no longer what it was. The immigrants who came into Siberia after 1890 found the best parts of the land already occupied. In Canada, the land near the railways was rapidly acquired by private owners and was the subject of feverish speculation, to such an extent that in the 'eighties the price of land was relatively high. In Australia, the land passed mainly into the hands of large owners, and the efforts made after 1890 to develop small-holdings were doomed to part failure as a result of the scanty influx of immigrants. The Argentine, like Australia, is a country of vast estates, and the peasants are dependent on the big landowners. Stock-raising is accordingly the principal branch of farming. The land at the Government's disposal which is available for settlement is in the more remote districts.

For working large areas of land, modern equipment is indispensable. The overseas countries were specially suited to exploitation by modern mechanical methods, as a result of which extensive cultivation is made possible. The development of cultivation is dependent on the possibility of recourse to modernised agricultural machinery—a gradual process. The defects of the equipment available explain the relative slowness of the progress accomplished at this period.

Many economists of the end of the nineteenth and beginning of the twentieth centuries wondered whether the world would be able to supply the harvests necessary for the increased demand. The last thing they foresaw was a marked rapid increase of the production of wheat. In general, they held pessimistic views as to the provision for the future. They were concerned with means of avoiding the contingency of famine to which (it appeared to them) the world was doomed, as the population increased faster than the available means of subsistence. In 1898, the English chemist Sir W. Crookes predicted universal famine for 1938.

The imports of Central and Western Europe increased continuously. They came as to about half from Eastern Europe, and as to the rest from the United States, the Argentine, Canada and Australia. Two countries had begun to play a considerable part as exporters—the Argentine and Canada.
