

L.5.2. CONFIDENTIAL

RFD. 114

Board of Governors of the Federal Reserve System Division of Research and Statistics International Sections

REVIEW OF FOREIGN DEVELOPMENTS

June 7, 1949

International Aspects of a Recession By Albert O. Hirschman	3
Stability	
U. N. Report on Employment and Economic Growth By Caroline Lichtenberg	3
The Spanish Economy - I. Stagnation in Agriculture and Industry By Barbara Hinrichs	3

This review is intended primarily for internal circulation and should in no case be cited or quoted. It consists of personal and informal contributions by the authors, which in many cases represent tentative analyses of the subject considered.

INTERNATIONAL ASPECTS OF A RECESSION

Albert O. Hirschman

The present paper is concerned with the possibility of an international recession and with its implications for the "dollar shortage". In its first part, the stability of foreign economies will be examined, with particular reference to those of Western Durope. The second part deals with the probable consequences of a downturn for international economic equilibrium.

I. The Stability of Foreign Economies

Up to the middle of 1949, signs of a recession are fewer and less conclusive in foreign countries than in the United States. More and more countries, however, appear to achieve stabilization regardless of whether they have been suffering from the "open" or the "repressed" variety of inflation and also regardless of the kinds and the degree of control under which their economies have been functioning.

Incentives to invest have been particularly strong in all war devastated countries not only because of the large backlogs of consumer demand and the need for reequipment in capital goods, but because relatively small amounts of investment (repairs of houses, railroads, replacement of damaged or outworn machinery) were sure to yield an exceptionally quick and high return. Once this abnormal demand for investment comes to an end, a rather severe readjustment ought to be expected. This type of readjustment did take place in 1947-48 in Italy where the completion of the most urgent repairs coincided with restrictionist monetary policies which killed the speculative, inflation-induced type of investment. The other marked instance of a postwar recession is Belgium 1/where war destruction had not been important and where the Government followed a policy of giving primary attention to the filling of consumers demands.

Spotty evidence of slackening consumer buying is available in France, Germany, the Netherlands, and the United Kingdom. Investment pressures have eased considerably in Sweden and Switzerland, and a number of large-scale reconstruction and reequipment programs particularly in the field of transportation (shipbuilding in England, railways in France and Italy, and truck production in Western Europe in general), are nearing completion.

In many countries the public authorities have elaborated investment plans which so far they have had the greatest difficulty in financing without inflation and which, therefore, might be expected to prevent any tendency toward a depression. It is by no means certain, however, that everything will work out in this way. Many European countries have now made a considerable fiscal effort to create the savings necessary to offset the planned investment. But this investment, to a very large extent, is carried out by the private entrepreneur. At some point, it may simply not be forthcoming in the volume expected and then, provision having been made for it by budget surpluses, selectively restrictive bank credit policies, etc., there would be an ideal setting for a deflation. What needs to be pointed out, therefore, is that the present semi-planned economies of Western Europe have by no means achieved a reliable coordination of savings and investment decisions. Of course, in the past inflation-ridden years, investment projects have repeatedly been subjected to cuts which

would presumably be restored as demand recedes. But the feeling of security induced by this consideration may well prove to be illusory, for an entrepreneur who very much wanted to undertake an expansion of his plant a year ago may feel quite differently about such a project when the inflation around him has subsided or turned into deflation.

Even the nationalized industries cannot be entirely relied upon to undertake investment programs when a recession has started to set in. In the first place, these industries have already invested at a very high rate during the recent inflationary phase, so that all that might be expected from them is the continuation of the present rate. Moreover, the managers of these industries have been told so insistently over the past years that they should use ordinary business judgment and criteria that, at least during the initial phase of a recession, they may well postpone investments when business in general adopts a wait-and-see attitude.

Another uncertainty affecting business activity in European countries is the level of individual savings. The general inflationary climate and the uncertainty about the prospective level of private savings has led, in a number of countries, to an extremely limited reliance on personal savings as an offset to the planned level of investment. All the other forms of savings, such as corporate savings and budget surpluses, seemed far superior in that they were more enforceable, i.e., they were less forecasts which may or may not be come true, than targets which can consciously be aimed at by economic policy.

Thus, in France the "inflation ry gap" was calculated in 1947-48 on the assumption of zero personal savings. In Great Britain, the current estimate of private savings for 1949 is 200 million pounds but this consists, to the extent of 214 million, of direct taxes on capital. In countries like Norway and the Netherlands the national accounts were actually drawn up on the assumption that there would be a certain amount of net dissaving by private individuals

It goes without saying that a zero or negative level of personal savings is an anomaly caused by exceptional backlog demands or by inflation. When the backlog demands are filled, when the inflation is stopped and excess liquid holdings have been reduced, a sudden reappearance of private savings on a substantial scale is possible; it is quite likely to take the official planners by surprise.

What policy will or should European countries follow when they are faced, despite planning for full employment, by a recession resulting from overestimates of private investment and underestimates of private savings? As long as inflationary tendencies prevailed, the task of the authorities was clear enough, though by no means easy to carry out. The weapons to be used were the familiar ones of restrictive fiscal and monetary policy, supplemented if necessary or advisable, by the use of negative or veto controls over private investment.

Novel problems arise, on the other hand, when individuals are suddenly found to save again, and when private investment ceases pushing incessantly against the limits which have been assigned to it in the total investment program, but starts to fall short of these limits. For a number of reasons it appears unlikely that foreign countries in general, and those of Western Europe in

particular, will be able or ready immediately to counteract such developments. In the first place, a mere reversal of the policies followed during the inflationary phase such as, e.g., the lifting of credit and investment controls, may be ineffective in reviving demand. Secondly, in countries where inflations have been protracted and violent, the authorities may prefer to err on the side of disinflation, at least for a while. This may be sound policy also because such inflations presumably have given rise to considerable misdirection of resources which ought to be corrected. Finally, and most important, the trend toward recession brings almost automatically a certain improvement in the foreign exchange position of the countries concerned and their authorities will therefore hesitate to take "compensatory" measures which are likely to re-create the same degree of dollar shortage as existed prior to the onset of the adjustment process. Clearly, the loosening up of the labor market and of resources in general ought to be taken advantage of in order to carry out a recrientation toward export industries (or toward activities providing domestic substitutes for imports).

Economic policy therefore will not be concerned solely with the restoration of a sufficient aggregate of effective demand. Balance of payments preoccupations will probably rule out indiscriminate "reflation" with its reliance
on the automatic working of the multiplier but rather will point to the necessity
of specific direction of the re-expansion process. But the official investment
planning seems to be efficient mainly in expanding the so-called basic sectors
of the economy (energy, transportation, iron and steel). With the exception of
some large-scale industries, such as petroleum refineries and shipbuilding, the
official planners do not seem to have been very successful in planning directly
for the expansion of exports not to speak of their direction. This may be a
field where exchange rate adjustments, which would render exporting attractive
to business, could play a useful role not only in immediately producing greater
balance of payments equilibrium, but also in generating and guiding a new investment wave.

The present uncertainties about the future course of business activity in European countries makes it necessary to reexamine ECA policy concerning counterpart funds. Hitherto the United States power over the use of these funds was used primarily to fight inflation either directly by withholding them from current spending or by making release dependent on effective anti-inflationary action. With deflationary tendencies outweighing inflationary pressures a reversal would consist in stopping debt retirement programs which are followed in a number of countries and in supplementing releases by additional expansionary action by the foreign governments. But in view of the undesirability of a policy of indiscriminate reflation, such a simple about-face would in general not be adequate; it will be necessary for the ECA to make sure that spending of counterpart funds does not promote short-run recovery from recession at the expense of impeding longer-run recovery from the dollar shortage.

II International Repercussions of a Recession

In examining the implications of a recession for international balance of payments equilibrium we shall assume at first that a downturn occurs only in the United States while other countries continue to enjoy a high level of economic activity.

Effects of a Recession in the United States only

This is almost a classical case by this time, for most discussions about appropriate post-war international economic policy have taken this situation as their starting point. It generally was assumed that a fall in U. S. demand would produce balance of payments difficulties abroad, and an international equivalent to the theory of internal compensatory fiscal and monetary policies was elaborated by such writers as Nurkse and Triffin. In such a situation, it was propounded, it would be wrong for the affected countries to "play the rules of the gold standard game" and to contract money and incomes. On the contract, international currency reserves ought to be freely spent and the contractive domestic effect of the outflow properly counteracted so as to avoid spreading the deflation and intensifying it in the United States.

Unfortunately this type of analysis is not too relevant to the present situation, because the starting point is so strikingly different from what it was assumed to be in the earlier analyses.

Here, as in several other areas of economic policy, we have already for several years been acting as though we were fighting a depression. For by maintaining a large export surplus we were bolstering domestic income; moreover, our export surplus is now financed very largely by government aid, and since we generally authorize the release of the local currency counterpart of our aid, the offsetting policy recommended by Nurkse is already in effect.

In this situation a reduction in U. S. demand would still mean, of course, less U. S. foreign purchases at lower prices, but it would also mean cheaper foreign purchases in the United States. Assuming that the foreign country's volume of imports is controlled either directly or through exchange rate adjustment, the dollar savings accruing to it from the fall in import prices could well exceed the loss sustained by the fall in the price and volume of its exports. This is the direct result of our starting point, i.e. the large U. S. export surplus. When we start from a position of balance there can be little doubt that a depression in a leading trading country will create balance of payments problems for the other countries; but if that country maintains a considerable export surplus at the time a recession sets in, the same proposition does not necessarily hold.

This reasoning applies in particular to the countries participating in the European Recovery Program which in 1948 still exported to the United States only about one fourth of their purchases in this country. As a result of their unbalanced trade position, the rise in world prices since the war has meant for them - quite apart from any deterioration in the terms of trade- a larger absolute dollar gap. A decline in dollar prices would correspondingly improve their position and they probably would still retain a net gain even though the volume of their exports to the dollar area were to be somewhat reduced.

The unstabilizing impact of a U. S. recession is therefore likely to be felt mainly in those countries that do not receive substantial amounts of aid from the United States. These countries, however, are quite unlikely, under present circumstances, to apply the policy of freely spending their dollar reserves. Over the past years, all countries have become conscious of the dollar problem and of the desirability to husband their dollar resources. A country

that sees its dollar deficit increase in the wake of an American slump would immediately take defensive measures. Kindleberger argued several years ago that increased dollar earnings of foreign countries may give rise to an even greater increase in current dollar payments. In the present situation the inverse reaction could occur: for every dollar lost as a result of a shrinkage of the American market, the foreign country may well retrench its purchases in an amount larger than one dollar. Such a process could occur even if at first, the affecte country decides on an immediate retaliatory import cut that is no more than equivalent to the loss in exports; for a secondary reduction in imports may take place as a result of the decline in incomes that would follow upon reduced economic activity in industries dependent on American raw materials and equipment. 1/

In conclusion it is clear that the countries which are most likely to suffer from an American recession are those that receive the ir dollars primarily through trade channels rather than in the form of U. S. aid. It would seem, therefore, that, in the event of a continuation of present business trends, we would have a special responsibility with respect to these countries. Moreover, it may be in our own interest to see to it that immediate curtailment of their imports from the United States in retaliation for decreased exports to the United States is avoided or minimized.

The continued existence of sizeable foreign aid programs is a substantial safeguard against an international spread and deepening of a recession at this time just as the abrupt end of private U. S. lending at the onset of the Great Depression had then an important intensifying effect. However, there are certain limitations to the extent to which we may rely on the foreign aid outlays as a stabilizing factor.

In the first place, the emphasis on the real or commodity aspect of our aid tends to provoke curtailments of the dollar amount of aid made available when prices fall. Secondly, it is already apparent that a recession in the United States may bring about a decreased willingness to maintain our foreign aid programs although at least a slowing down of the progressive reduction in these programs may be called for from an objective point of view. If it is assumed, of course, that the Federal Budget ought to be in balance under all circumstances then it is possible to argue, as has been done during the recent Congressional debate, that our foreign aid programs are not inflationary - the contention of last year - but deflationary since they make necessary a greater tax burden than would be required otherwise. This argument would be particularly strong if it is found that the recipient countries do not actually spend all of the aid

I/ This explanation of the inverse "Kindleberger effect" is quite different from that used by Kindleberger in his original argument. Here it is assumed that imports from the United States are non-competitive for the foreign economy, that on the contrary they are important in sustaining production and investment in the receiving country. A cut in those imports is likely to be followed by a contraction in economic activity and incomes that, whatever the repercussions of the drop in incomes earned in export industries, may lead to a further curtailment of purchases in the United States. I believe that by reversing this argument one obtains a rationalization of the original Kindleberger effect that is logically unassailable and more realistic than reasoning in terms of the multiplier and negative propensities to save.

received, but accumulate an important fraction of it in the form of additional reserves. To tax the American consumer in order to permit foreign Central Banks to hold idle dollar balances would indeed be purely deflationary action. This combination of circumstances actually occurred with respect to several countries during the past months. But, normally, a great deal of confidence can be placed both in the difficulties of maintaining the Federal Budget in balance during a recession and in the eagerness of foreign countries to prove their need for aid by promptly using it for the purchase of American goods.

At best, however, our foreign aid outlays will serve to cushion a domestic recession and to inhibit its propagation. The fact that the United States is entering into a period of domestic readjustment with a still huge export surplus which it alone sustains by its aid programs, automatically rules out any large-scale reliance on foreign transactions actively to restore our domestic position. In order to be able to carry out any "beggar-my neighbor" type of policy, we would first have to make additional gifts to our neighbors. Actually we are pushing ahead with plans to reduce foreign aid appropriations progressively and this policy serves to place almost exclusive reliance on domestic rather than international policies in the active combatting of a depression.

Effect of a Recession in Foreign Countries

It was found in the preceding section, that under present circumstances a recession arising only in the United States would have less unbalancing effects on foreign economies than was generally believed. If it is assumed that simultaneously there is some disinflation in foreign countries the conclusion follows that the dollar shortage will almost certainly be alleviated.

For the purpose of this analysis it would be tempting to distinguish two components of the dollar shortage; a "monetary" one which would designate the external consequences of the condition of open or repressed inflation which has characterized European, South American and other economies since the war; and, secondly, a "structural" component which would express the needs for temporary outside financing required to attain a certain level of productivity while maintaining a socially necessary standard of living. Unfortunately the line of distinction between the two components cannot be drawn with any precision Inflation brings in its train a special balance of payments drain caused by capital flight, by wasteful investment, and by failure to export; but it is impossible to tell how big this burden is in relation to the total deficit.

Moreover, it is likely that a prolonged inflation cannot be stopped without provoking a downturn and without thereby doing away with part of the "structural" component of the dollar shortage, in addition to the monetary one.

In such a situation the need for aid dollars will probably decrease suddenly and situations may arise in which a foreign country is actually unable to absorb foreign aid in the amounts available.

Conditioned as we already are to a general dollar shortage, such inability to absorb aid almost strikes us as something against nature, but it is of course not any more perverse than the inability of an economy to make reasonably full use of its manpower and machinery. A very striking example of this

kind of situation has been given by Italy which has accumulated in the form of additional reserves of gold and foreign exchange close to one half of the aid received over the past year. This has been done indirectly, of course (i.e. by not using the dollar proceeds of its exports), since ERP dollars are necessarily tied to commodity imports, even though not to imports from the United States. The accumulation of reserves has been largely the result of the stabilization of the Italian internal situation combined with the adoption of a more realistic exchange rate than prevailed elsewhere in Europe.

Similar instances of inability to absorb aid and of accumulation of foreign exchange reserves have been encountered in other countries where symptons of a recession have appeared, i.e. Germany and Belgium. There has also been a failure on the part of many OEEC countries to utilize substantial amounts of intra-European aid in the form of drawing rights under the Payments Scheme.

Such failure to utilize aid brings us face to face with the fact that our basis for apportioning aid still is the dollar shortage as conclusively demonstrated by foreign countries themselves rather than their need as established on the basis of valid and unambiguous criteria, defining the "structural" component of the dollar shortage. Vis-a-vis foreign countries receiving aid from us, we are in a position similar to that of the national planning authorities vis-a-vis the private investors; we can tell a country that it is over-extending its resources with respect to the financing that we can make available while we would find it difficult to push it into absorbing more dollars than it does. 1/ Every reduction in the use of dollars by a particular country we are almost bound to interpret as proof that we had overestimated actual needs. A generalized recession would force us to do more thinking than hitherto on defining need for aid, a task that had been taken care of so far for us by physical shortages, inflationary pressures, and social unrest.

The Italian example also serves to show that our view of a gradual and regular tapering off of the need for aid may be based on the assumption of a world where planning is perfect and business cycles are non-existent. After the immediate reconstruction period when war damage is largely repaired, when pipelines are refilled, when some of the most important deferred demands in both consumption and investment are satisfied, and when the monetary overhang has been worked off in one way or another, many foreign economies are likely to pass through a period of adjustment during which their needs for foreign aid may be smaller than in a subsequent period when a new cycle of investment is undertaken. But the very fact that we have not made any provision for cyclical changes in the need for aid may help in the overcoming of foreign recessions. For the accumulation of dollars on the part of a foreign country experiencing a recession and the realization that it may well face a cut in aid if the accumulation continues may yet cause it to throw caution overboard and to undertake vigorous anti-deflationary action.

^{1/} We have come remarkably close to doing this recently with the message of Mr. Hoffman to Mr. Zellerbach, ECA mission chief in Italy, commending the Italian Government for its achievement of financial and monetary stability, but urging it at the same time to undertake and encourage an "aggressive" investment effort.

Thus it becomes possible to distinguish three postwar stages in the interaction between internal and external disequilibrium. It cannot be denied that to a certain extent during the immediate postwar period an inflation carried with it a dollar premium. 1/ In a second period, as the volume of our aid shrank, anti-inflationary policies gained in attractiveness since they permitted foreign countries to absorb the decrease in our aid with a minimum of internal stresses. In a third period the competition for the dollars made available by us may yet become a powerful factor in avoiding any prolonged recession of foreign economies. This would be a new and possibly quite valuable mechanism: so far every country that in a depression made faster progress than the rest toward recovery was penalized by experiencing a strain in its balance of payments and a loss in reserves. Now, with the resulting deficit being made good by dollars contributed by the United States out of a limited amount of aid, the penalization would be changed into reward.

The Devaluation Issue

It may be in order to add a few words on the devaluation issue in the light of the foregoing remarks. The case against devaluation in the postwar period rested primarily on the following arguments:

- 1. Devaluation will not decrease imports since imports are already held in check by direct controls.
- 2. Devaluation will not increase exports (a) because the elasticity of supply is very low, and (b) because prices do not impede exports the only competitive element in obtaining orders being prompt delivery.
- 3. Devaluation will be upsetting for any degree of internal stabilization that may have been achieved because it may result, either through the influence of rising prices for imports or through psychological influences, in a general rise in prices which will make for claims for higher wages, etc.

This mere listing shows that the situation has sufficiently changed to render most of the arguments against exchange rate devaluation obsolete. While the effect of devaluation on imports may still not be decisive because of the existing quantitative controls, the effect on exports cannot be doubted. Price is again a compelling consideration. Furthermore, alghouth countries do not yet wish to insulate themselves against a fall in the U. S. price level, they need be less concerned than previously about a devaluation imperiling internal stabilization both because of their own progress in achieving stability and because of the fall in the U. S. price level.

Today, the only valid consideration militating against an exchange rate adjustment would be the contention that sufficient progress is already being made toward external balance at existing exchange rates. The opponents of devaluation will, therefore, tend to prove today the contrary of what they

I/ It is not implied that foreign countries have wilfully engineered inflation in order to become "eligible" for U. S. aid. An inflation is far too much fraught with social and political dangers for it to be provoked lightly by any government. Insofar as inflations have resulted from positive action, rather than from omissions, on the part of national governments, they have been due to overambitious investment and development programs, rather than from any conscious attempt to capture a larger share of U. S. aid than would have been obtained otherwise.

proved yesterday; while the principal argument so far has been that devaluation would not improve the balance of payments, today concern will be voiced about devaluation helping too much, deepening the depression in the United States and curing the dollar shortage at precisely that cost in real income which it was the intention of the Marshall Plan to avoid. As we have seen there is a distinct possibility that a serious recession would do that. But excessive effectiveness of devaluation alone, i.e. unaccompanied by a cyclical downward movement abroad, could always be corrected by combining it with a considerable relaxation of existing quantitative import controls. Moreover, it devaluation takes place in the midst of a recession, it is apt to have a pump-priming effect and by initiating a new cycle of investment it may well create an additional balance of payments strain, as happened in a number of instances during the Great Depression.

U. N. REPORT ON EMPLOYMENT AND ECONOMIC STABILITY

Caroline Lichtenberg

The third session of the United Nations Sub-Commission on Employment and Economic Stability 1/2 was devoted to a consideration of the problem of the maintenance of full employment. In July 1948, the United Nations Secretariat had requested member countries and those non-members participating in regional economic commissions to answer a series of questions on national and international action to achieve or maintain full employment and economic stability and to prevent a future decline. The replies to this questionnaire provided the frame of reference for the Sub-Commission's discussions and Report.2

Both the domestic and the international aspects of full employment plans are considered in the Report. The Sub-Commission put special emphasis, however, on the international aspects, after a review of the answers to the questionnaire revealed that countries' full employment plans involved measures which "in the event of a depression...may defeat, or adversely affect to quite an important extent, the plans of other countries". The Sub-Commission reached three major conclusions as a result of its study of this phase of the problem:

- (1) In the event of a downturn in the business cycle, countries propose to take a nationalistic approach in solving balance-of-payments difficulties which arise as a result of full employment policies;
- (2) Countries will resort to unilateral action because existing international financial agencies, particularly the International Bank for Reconstruction and Development and the International Monetary Fund, do not provide adequate machinery for international collaboration; and
- (3) To ensure international concert of action at the onset of a recession or depression, the United Nations should call a high-level conference to consider overhauling the International Bank for Reconstruction and Development and the International Monetary Fund and to make an attempt to reach some agreement on other major problems, including currency convertibility, commodity arrangements, and the dollar shortage.

^{1/} Document E/CN.1/66 - 26 April, 1949. The following members and alternates of the Sub-Commission attended the session:

Mr. P. Chernyshev (alternate for Mr. A. Danilov), Mr. R.F. Harrod,

Mr. R. Frisch, Mr. E.A. Goldenweiser (alternate for Mr. W. Riefler),

Mr. G. Leduc (alternate for Mr. J. Belin), Mr. L. Melville. The members of the Sub-Commission are technical experts and are not official government representatives.

^{2/} See Document E/1111 and E/1111 Add. 1 - 5.

Not all the members of the Sub-Commission approved either the conclusions contained in the Report or the approach to the full employment problem which the Report represents. 1/ The discussions brought out that the members of the Sub-Commission held essentially different conceptions of the function of the Sub-Commission and of the problems which it should consider. Mr. Chernyshev wanted the Sub-Commission to engage in a general discussion of the relevant problems and to submit a Report consisting merely of the various views expressed. Furthermore, on the assumption that full employment can be ensured through strictly domestic programs, Mr. Chernyshev felt that the Sub-Commission should concentrate its attention on internal measures only. Mr. Frisch, on the other hand, felt that the Sub-Commission should initiate fundamental economic research from which practical recommendations for action could be evolved. His memorandum on Price-Wage-Tax-Subsidy Policies was submitted as an example of this approach. 2/ Mr. Frisch recommended that the Sub-Commission attempt a systematic analysis of the measures which governments proposed to take to ensure full employment in order to show "how the correct balance between the opposing effects" of these measures can be reached. In the international sphere, he felt that the crux of the matter was to "solve simultaneously the balance of payment and balance of trade problems for several countries".

The Report itself, however, reflects the majority opinion that the task of the Sub-Commission is "public relations" and that the Sub-Commission should act in an advisory capacity to the member governments. High priority was given to an analysis of recent economic trends in order that the Sub-Commission "might make appropriate recommendations to governments which might influence their course of action".

Domestic Measures for Maintaining Full Employment

The section of the Report concerned with the strictly domestic aspects of full employment plans is simply a review of the measures which governments propose to take in the event of a downturn as indicated in their replies to the questionnaire.

^{1/} Mr. Chernyshev dissented from the adoption of the report. His views are contained in document E/CN. 1/Sub. 2/SR. 52. Mr. Frisch, while agreeing to a number of specific points contained in the report, dissented from the report as a whole. His views are contained in document E/CN/1/67.
2/ Price-Wage-Tax-Subsidies Policies as Instruments in Maintaining Optimal

Employment. (E/CN. 1/Sub. 2/13)

7/ The section on balance-of-payments difficulties is essentially an edited draft of Mr. Harrod's memorandum Preliminary Considerations on the Need for an International Economic Conference. (E/CN.1/Sub.2/W.5)

These answers disclosed that, in the face of an imminent recession, governments would take measures designed to expand government expenditures and to stimulate consumption and private investment. The Sub-Commission approved these measures as means of bolstering effective demand, but stressed the point that governments must be prepared to implement their plans without delay as soon as the situation calls for action.

Comments on the domestic problems connected with these measures were brief and general. While financing may necessitate recourse to budget deficits, it would be preferable to rely on funds accumulated during the period of prosperity or on such methods as deferred payments. In any case, countries should not resort to measures that would be likely to result in a renewed outbreak of inflation. Governments are advised to explore possible modifications of their tax systems for new ways of stimulating consumption or investment, to keep interest rates at low levels during a depression, and to include in their plans provision for the building of low-priced homes and for slum clearance.

The Sub-Commission had been requested by its parent body, the Economic and Employment Commission, "to study the problem of recognizing incipient downturns in economic activity". The Report notes this request, but makes no attempt to fulfill it except to mention that in the United States there has been "some contraction in employment and production over the past three months, accompanied by declines in all groups of prices. These events have been accompanied by corresponding changes in the economies of some other countries." In view of these trends, the Sub-Commission recommends that the United Nations Economic and Social Council discuss counter-recession measures to be adopted if and when found necessary.

Problems of Balance-of-Payments Difficulties in the Maintenance of Full Employment

While agreeing that "the first line of defense against unemployment must be on the domestic front", the Sub-Commission devoted a large part of the Report to an examination of how countries will solve the external problems arising in consequence of their full employment policies.

Many countries, in the event of a recession or severe depression, will be burdened with balance-of-payments deficits. Even if full employment were maintained (which the Sub-Commission considers unlikely), there is no assurance that major balance-of-payments difficulties will not arise, owing to shifts in relative prices, disturbances as a result of innovations in technology, and changes in the structure of demand.

All indications are that to meet these problems governments will resort to unilateral action and nationalistic policies rather than put their main reliance on international collaboration. In reviewing the replies to the

questionnaire concerning international action to be taken in the event of a downturn, the Sub-Commission noted that most governments intend to resort to the use of import restrictions to redress balance-of-payments disequilibria. Other manifestations of the growing trend towards a nationalistic approach to international economic problems are the growth of multiple currency systems, black and grey money markets, currency inconvertibility, and the need to balance trade bilaterally.

Existing Institutions Inadequate

The acceleration of nationalistic policies signifies to the Sub-Commission that nations regard existing international institutions as inadequate for meeting the balance-of-payments and other international economic problems which will be encountered in a recession period. It is of interest to note that the Sub-Commission included in the Report a statement of the Fund to the effect that it cannot assure sufficient financial assistance to all nations simultaneously in the event of a crisis and also a statement of the International Bank that its purpose is to provide for "a smooth and continuous flow of international investment" and that it "cannot conserve its resources simply in order to release more funds in times of incipient depression". These statements probably were influential in determining the Sub-Commission's conclusion that the Bank and the Fund are not capable of sub-stantially helping to prevent international economic disaster.

At the time of the Bretton Woods Conferences, many prominent persons envisaged a set of international institutions which would prevent the spread of deflationary forces and safeguard "the world economy from being once more disrupted into nationalistic areas". To ensure the achievement of these aims, many hoped that the international machinery created would accomplish the following objectives:

- (1) International synchronization of national full employment programs at the onset of a depression.
- (2) International collaboration on balance-of-payments difficulties so as to give countries the assurance that they could meet their balance-of-payments problems without resorting to drastic deflation of a nature leading to unemployment or to the use of import restrictions which would result in the exporting of unemployment. "It was considered that the Fund should be drawn upon to help cover adverse balances which occurred in consequence of nations' continuing domestic full employment policies during a world recession."
- (3) Elimination of "discriminatory methods in commerce and credit and loan policies".

- (4) Creation of an International Investment Board that would "step up the rate of inception of development projects at the onset of a depression".
- (5) Conclusion of satisfactory arrangements between countries on the problem of primary products.

The present condition of the agencies established at Bretton Woods is characterized by the Sub-Commission as "somewhat frustrated"; and the plans made there as "largely unrealized". The Bank and Fund, "although they are doing their honest best have not been adequate...for preventing nationalistic action or for giving governments the necessary assurance against the impact of deflation". As a consequence, nations are "not now regarding the aims of the Fund as an integral part of their own aims" and the International Bank is "a useful but a minor addition to existing financial machinery at a time when world uncertainty makes venture capital extremely unventuresome".

Meanwhile, the world is on the brink of recession. It is at this critical stage that governments should be apprised of "the fact that the plans have gone awry, that this coming year is the proper time for taking stock of the situation anew, for declaring the transition period closed and for considering what modifications are required in the original international plans in order that they may be brought into operation, in the near future, in time to cope with a severe depression, should one eventuate".

Therefore, the Sub-Commission recommends an international economic conference and suggests the following points as an agenda for consideration:

- "(a) To re-establish the multilaterality and convertibility of currencies. This might be subject to decisions under 'f' below (the dollar problem).
- "(b) To reconsider the charter of the International Monetary
 Fund in the light of developments, and to consider whether
 the size of the Fund is adequate and its procedures and
 policies are such as to enable nations to proceed through
 a depression without resorting to deflation or import
 restriction.
- "(c) To reconsider the charter of the International Bank, with special reference to its functions in a trade depression and the adequacy of its finance to perform those functions. There is also the question: What is the prospect of the Bank's relying to a greater extent than at present on funds other than those of the United States?

- "(d) To resume discussions on the International Buffer Stocks proposal.
- "(e) To consider whether the growth of government interventionism requires any modification in the international plans previously agreed to.
- "(f) To consider whether the dollar is likely to cease to be scarce within the ERP period and, in the event of a negative answer, to consider on what lines the dollar problem should be tackled when that period is over.
- "(g) To interchange information on domestic full employment policy, consider whether plans now entertained are likely to be adequate and, if not, whether some additional international measures, other than those envisaged under the above headings, will be needed."

The Sub-Commission's Report has considerable merit in one respect: it focuses attention on the current trend towards recession and on the tendency towards an accelerated growth of economic nationalism in the solution of balance-of-payments difficulties. It was the emergence of these trends that led the Sub-Commission to a consideration of the International Bank and Monetary Fund in terms of their usefulness for international countercyclical policies. It seems clear from the Report that the intention of the Sub-Commission was not to criticize the policies of the Bank and Fund, but rather to warn that existing international machinery is not adequate to the task of preventing the spread of deflationary forces from country to country.

While the sounding of such warnings is useful in stimulating thinking, a more valuable contribution might have been made if the Sub-Commission had concentrated on analyzing a few of the specific issues and had then offered practicable suggestions for their solution. The Sub-Commission had, in fact, been specifically requested by its parent body to study the problem of recognizing incipient downturns in economic activity, but the Sub-Commission made no constructive suggestions on this important question. Instead, the Sub-Commission contented itself with proclaiming in very general terms that a change in business conditions may lie ahead. As remedy for a depression, it merely offers a list of anti-depression policies elaborated or advocated during the 'thirties instead of considering how these policies would be applicable to the presently emerging situation. Responsibility for consideration of such problems was shifted to other bodies, including a high-level conference of government advisers which the Sub-Commission urged the United Nations to convene.

The net result of the Report was that, instead of giving serious consideration to the proposal of its Sub-Commission, the Economic and Employment Commission recommended that the existence of the Sub-Commission itself should be terminated.

^{1/} New York Times, May 25, 1949, p. 13.

CONFIDENTIAL June 7, 1949

THE SPANISH ECONOMY - I. STAGNATION IN AGRICULTURE AND INDUSTRY

Barbara Hinrichs

The Spanish economy has found it extremely difficult to recover from the Civil War. Agricultural production has never regained pre-Civil War levels, and, in addition to fundamental malajustments, it has had to contend with particularly unfavorable weather conditions through the past few years. Coal mining and electric power production have shown satisfactory increases, but other industrial sectors have been held back by a lack of raw materials and machinery. On the whole, the picture presented by the Spanish economy is one of stagnation, if not of slow deterioration.

A. Agriculture

Spain is primarily an agricultural nation. Forty per cent of the total area of the country is under cultivation and 55 per cent of the population is employed in agriculture. Productivity depends heavily on irrigation and imported fertilizers, for, on the whole, the land is poor and the climate is dry. Agricultural methods are backward. Nevertheless, in normal years, production supplied the needs of a steadily growing population and provided 65 per cent of the country's exports. The agricultural commodities which are important to Spain are wheat, olive oil, potatoes and meat for domestic consumption; and oranges, olive oil and pickled olives, almonds, wines, and cork for export.

Spanish agricultural statistics are not up to date. Official figures are available through 1946 and estimates have been made for 1947 and 1948 by the United States and British Embassy staffs.

Figures published in 1946 show a general decline of 20 per cent in agricultural production since 1935, with the largest drop in the production of wheat, which fell 30 per cent. Acreage under wheat cultivation had fallen 20 per cent below the 1935 figure, mainly because wheat growing, which at best yielded 9 to 10 metric quintals per hectare before the war, became unprofitable due to a lack of fertilizers and to price control of wheat during the war. This situation to some extent continued through 1948 and acreage which had been used for wheat was turned to pasture and industrial crops which were more profitable.

Acreage increased slightly for vegetable, olive, fruit and industrial agricultural production through 1946, but corresponding production figures show a decline from average pre-war figures for olives, almonds, oranges and most vegetables. Cotton production increased, but still amounted only to around 5,000 tons or 5 per cent of domestic requirements.

The year 1947 was an excellent one for olives, yielding an abundance of olive oil for home use and export through 1948. It was a bad year for wheat, sugar beets, and potatoes.

In 1948, food production in Spain improved, as elsewhere in Europe, with respect to wheat and other grains, potatoes, oranges, and sugar. Meat is also believed to have been more plentiful in 1948 due to better pasture conditions. Sugar beet production, with an increase of 77 per cent over 1947, was the largest harvest since before the Civil War.

The past year was a poor one for olives, olive oil, wine, almonds and pulses. The drought and a shortage of fertilizers were largely responsible for the drop in these items. However, olives and olive oil were probably at a cyclical low. There were large reserves of olive oil available from 1947, helping to maintain export and consumption levels through the year.

At present, the agricultural outlook is uncertain because of the long winter and spring drought. Crop prospects are at best only fair compared with 1948. Production this year in terms of 1948 output is estimated at 75 per cent for wheat and other grains, 85 per cent for lentils, 90 per cent for oranges, almonds, sugar, potatoes and rice, and 130 to 150 per cent for olives and olive oil. If rains are below normal for the months of April and May output will fall below these estimates.

Looking at the picture as a whole there are several basic reasons for the decline in agricultural production which operate independently of the present drought.

- 1. The first and most serious is a shortage of fertilizers. This shortage was world-wide in the immediate post-war period, but it has been aggravated for Spain by the lack of foreign exchange and by the interruption of trade with France which is Spain's principal supplier of potash and phosphates. France and Spain resumed trade by an agreement in December 1948, which should ease the situation in the next year.
- 2. Another factor is the control of prices for essential food commodities. This has caused a shift away from the production of cereals, potatoes and pulses.
- 3. There has been a general shift of population towards the cities which has caused a shortage of labor in the central wheat-growing districts.
- 4. A shortage of working animals and tractors has become serious since the end of the war. Farmers cannot afford to buy animals they need. Tractors are also unavailable due to a deterioration of pre-war equipment and a lack of imports to replace worn-out equipment. Annual imports of tractors, which have top priority in agricultural machinery imports, have been limited to a few hundred per year.
- 5. Irrigation has long been a problem for Spain. The yield of irrigated land is three times that of unirrigated land. Spanish products would be more accessible for domestic consumption and the products could compete more readily in international markets if costs and prices were reduced. It is estimated that less than 100,000 hectares

of new irrigated land have been brought into use since the end of the Civil War, though a yearly irrigation of 50,000 hectares has frequently been advertised as the Government's goal.

As was previously mentioned, food products and beverages accounted for 65 per cent of the value of exports in 1935 and 27 per cent of the aggregate export tonnage. In 1948 the figures had declined to 46 per cent and 11 per cent, respectively. However, the decline in absolute quantities shows more clearly the seriousness of the export picture for Spanish food stuffs. In 1935 food stuffs exported amounted to 1,719 thousand tons; in 1948 this figure had fallen to 593 thousand tons. The peseta value of exports does not reflect the fall in physical volume owing to the general rise in prices. At the same time the share of imports of foodstuffs in total imports increased from 13 per cent in 1935 to 33 per cent in 1948.

Reasons for the decrease in food exports are attributed to:

- 1. Shortage of fertilizers, which affects potatoes, onions, tomatoes, oranges and other exportable fruit.
- 2. Import restrictions in consuming markets affecting semi-luxury products such as lemons, vegetable preserves, sherry and grapes.
- 3. High prices of Spanish products, especially during the last two years due to inflation combined with the maintenance of unrealistic exchange rates.
- 4. Some increase in home consumption of certain export items, such as olive oil.

B. <u>Industry</u>

The structure of Spanish industry has not been greatly changed since before the Spanish Civil War. Though the government announced plans for Spain to become increasingly self-sufficient in industry, a lack of technical skill and of imports of machinery and raw materials made it difficult to start new industries or even regain old levels of production. The textile industry remains the largest industry, with cotton textiles comprising 90 per cent of textile production. The chemical and iron and steel industries remain at pre-war levels of production. Most machinery and transportation equipment have to be imported. However, there has been considerable expansion in the production of electric power and some increase in the production of artificial fibers, plastics, paper, electrical equipment, machine tools, and miscellaneous light industries.

In general, Spanish industry is handicapped by high costs of production, inadequate technical training, a shortage of foreign exchange necessary to procure essential raw material imports.

Data on the level of industrial production are scarce and contradictory. An index of industrial activity elaborated by the Superior Council

SPANISH EXPORTS OF FOODSTUFFS

(Includes Possessions)

Per cent of total	Food items exported	Total exports	Value - '000,000 Pesetes	Per cent of total	Food items exported	Total exports	Quantity - 1000 Tons
66%	կ77	712		27%	1,719	6,322	1931-35 average
78%	253	521		22%	511	2,224	1941
49%	436	874		23%	572	2,398	1945
57%	514	719		20%	457	2,193	1946
43.9%	388.9	886.5		9.8%	458	4,675	1947
% 46•1%	457.8	984.6		11.4%	593.7	5,203.9	Eleven months 1948

- 3b
ACREAGE AND OUTPUT FOR SELECTED AGRICULTURAL PRODUCTS

Item	1926 - 1935 average	1940 - 1945 average	1946	1947	1948
Wheat area	4,461	3,604	3,808	n.a.	n.a.
production	4,124	2,416	3,623	2,700	2,800
Barley	ם פרו	3 K80	1,487	n 9	n.a.
area production	1,854 2,224	1,582 1,392	1,913	n.a. 1,213	1,500
Rice		1.5	1.0		
area production	48 300	49 223	49 205	n.a. 217	n.a. 220
Potatoes	29.2	420	356	n.a.	n.a.
area production	383 4 , 335	3,130	2,275	3,495	3,700
Oranges	75 0/	80 b/	n.a.	n.a.	n.a.
area production	75 a/ 1,044 <u>a</u> /	865 5/	n.a.	730	771
Olive Oil	1 01 <i>0</i>	3 056	n.a.	n.a.	n.a.
area production	1,817 351	1,956 300	n.a.	525	200

Area in thousands of hectares Production in thousands of tons

a/ 1931 - 1935 average b/ 1940 - 1944 average

Source: Anuario Estadistico de Espana, 1947.

American Embassy, Madrid. Spanish Food Supply, 1948.

November 8, 1948. No. 193.

SPAIN

Selected Indexes of Agricultural Production - 1929-1947

(1929 = 100)

1939 1940 1941 1942 1943 1944 1946 1946	1929 1930 1931 1932 1933 1934 1935	Year
72.5 60.5 70.5 69.3 111.2 86.7	100.0 99.8 90.2 121.7 93.9 121.1	All Cereals
55.0 67.0 67.0 67.0 67.0 67.0 67.0 67.0 67	100.0 95.1 87.2 119.4 89.6 121.1 102.4	Wheat
78. 8 77. 6 77. 6 77. 6 71. 1 57. 6 51. 2	100.0 90.9 101.2 108.7 103.4 102.0 101.7	Potatoes
75.9 75.9 75.9	100.0 145.2 178.6 127.3 124.0 143.9 98.6	Sugar beets
108.0 94.0 88.0 74.0 62.0	100.0 96.0 88.0 114.0 96.0 112.0 104.0	Vege- tables
78.88 80.0 80.0 88.8 88.8 92.5	100.0 87.5 97.5 91.3 95.0 98.8 91.3	Fruits
49.0 66.7 89.9 55.7 97.2 64.7 14.3 91.2 127.6	100.0 27.0 82.5 81.9 72.9 73.5 103.3	Olive Oil
81. 8 82. 0 87. 1 87. 1 80. 3	100.0 74.8 77.5 86.5 78.4 89.2	Grapes
# 3 8 4 1 5 0 5 2 6 0 5 4 6 0 5 6 0	100.0 83.3 83.9 81.6 67.6 67.6	Oranges
74.7 70.1 78.3 75.1 70.7 73.9 78.6 71.4	100.0 90.0 92.0 109.5 93.0 108.9 97.3	General Index

Source: La Renta Nacional de Espana en 1947, Consejo de Economia Nacional, Madrid, 1948, pp. 36-37.

of Chambers of Commerce, Industry and Navigation shows a drop of 13 per cent between 1935 and 1940 and a rise of 11 per cent between 1940 and 1947; another index elaborated by the Consejo de Economia Nacional shows a fall of 5 per cent and a rise of 28 per cent for the corresponding periods. One reason for the discrepancy is the inclusion in the former index of imports of industrial materials which probably have fallen off, with respect to 1930, more than industrial production as a whole. Finally, research department of the Bank of Spain calculates an index of industrial production that shows an increase of 34 per cent in 1947 in relation to 1940. This index is reported to have an upward bais. In view of these contradictory data the actual level of Spanish industrial production can only be sumised. The decrease between 1935 and 1940 may tentatively be put at 10 per cent and the increase between 1940 and 1947 at somewhere between 15 and 25 per cent.

The Bank of Spain index shows a decline of four points in 1948 from the 1947 level. It is likely that production figures have declined since September due to power restrictions and an increased restriction of imports, especially of raw cotton.

Indorpo of Industrial Activity in Chain

	Indexes of Industrial Activity	7 in Spain	
	$\binom{1940 = 100}{1}$	2.	3.
Period	Chamber of Commerce, Industry & Navigation	Consejo de Economia Nacional	Bank of Spain
1930	141	105	-
1935	113	107	
1940	100	100	100
1945	105	121	115
1946	115	127	133
1947	111	128	134
1948	110 a/		130

a/ January - September average.
Sources: 1. Commercio, Industria y Navigacion de Espana,
June - August 1948, p. 49.

There are no recent official figures for occupational distribution in Spain, but it is estimated that 27 per cent of the total labor force of 8 million workers are employed in industry and services. In general the industrial labor force expanded during the war. Higher wages, special incentives and increased training drew workers to industrial centers. Industrial unemployment has been at a low level, but has increased in the past six months due to the power restrictions and restricted imports.

^{2.} La Renta Nacional de Espana en 1947, p. 51.

^{3.} Report of the Bank of Spain, March 1947, p. 33.

Investment

Available date do not permit the construction of an accurate picture of the amount of investment in Spain. Several indicators of investment activity are available through 1947, however; capital issues, imports of machinery and other basic materials for industry, and the general level of basic industrial activity.

Capital Issues in 1946 and 1947 (In millions of pesetas)

Group	1946	<u>1947</u>
Government Municipal Monopolies Electricity Banks Construction Iron and steel Textiles Various	4,696 734 50 1,219 366 918 197 227 660	5,297 845 900 341 148 147 116 92 355
Total	9,067	8,241

The greatest burst of activity occurred in construction and electric power development in 1946. Average stock market quotations for 1946 stood about 50 per cent higher than in 1945. The greater part of the activity was speculative in nature and fixed interest securities tended to weaken.

Government issues were nearly half of the total issues in 1946 and were over half in 1947. It is impossible to know the extent of productive investment made by the national and municipal governments, but a large part of the proceeds no doubt served to finance army or administrative expenses not covered by tax revenues. Government plans to rehabilitate ports, highways, and transportation equipment, and to develop irrigation facilities and new industries have fallen far short of expectations. The most notable development has been the increase in electricity generated.

The speculative boom in construction activity declined at the end of 1946 when the general feeling was that the luxury market had been satisfied and prices were too high for low cost housing and construction work.

Since Spain produced little capital equipment, imports of capital goods provide some information about the level of replacement and investment in industry and agriculture. Figures are available for these imports through the first half of 1947, and show that capital goods formed 11 per cent of the total value of imports. This percentage is equal to the 1935 level and shows an increase over the figures of 1945 and 1946.

Value of Spanish Imports (In thousands of gold pesetas)

Capital equipment Total imports	1935 98,889 875,173	1945 50,660 862,596	74,278		- June)
Per cent of total	11 d.	6 <i>e</i>	80,	111 %	

The decline of specific imports from 1935 levels can be seen in the following table.

Imports of Principal Items in Spain (In numbers or metric tons)

In metric tons Diesel engines Textile machinery Agricultural and dairy	1 <u>935</u>	1945	1946	1947
	431	35	168	198
	590	36	69	268
	231	9	224	193
machinery Electrical goods and apparatus Telephone, telegraph, etc	317 c. 88	158 40	1,084	834 79
Numbers Motor cars and chassis Motor lorries and chassis Ships	4,579	22	125	408
	5 439	52	274	941
	-	-	-	-

Source: Spain Overseas Economic Survey, London, 1948

The following sections on specific industries indicate the need for development and replacements in all lines of industrial activity.

Electric Power

As in other countries, there has been a growing demand for electric power in Spain, accounted for in part by electrification of railways, rural electrification, and substitution for coal and oil. Though the expansion of power facilities has been rapid the supply is lagging behind needs. The official index, using 1929 = 100, reached 211.0 in 1947. This was a peak year for Spain and it was expected that production would surpass the 6,420 million KWH mark and reach 7,000 million KWH in 1948. But in spite of record production during the first quarter of 1948 the drought, which has been unusually long and severe, has kept the total figure below the 1947 level.

Eighty per cent of the power generated in Spain is hydraulic and 20 per cent thermic. Because of the shortage of coal and of the unevenness of the supply of hydroelectric power it is hoped that all existing thermic stations consuming high grade coal may eventually be placed in reserve and that they will be used only in an emergency. The country normally faces restrictions during winter months until the spring rains and melting snows. During 1948, however, an abnormal drought caused restrictions to be started as early as July in the northern areas. In August restrictions were extended to all Spain and power cuts for two or three days were not uncommon, especially in the industrial centers of Bilbao and Barcelona. The restrictions became increasingly severe toward the end of the year, with industry having priority and household use confined to four hours a day. Industry is reported to have profited by the 1945 drought experience and managers had generally an auxiliary supply which, though not adequate, helped to carry them through the winter months.

The potential demand for power in 1948 was estimated to be 7,500 million KWH. Plans for 18 hydroelectric stations to be completed last year were not met, and only 8 had been put into operation by the third quarter of 1948. The Bilbao district anticipates a greater power supply with the completion of the Villalcampo plant in the spring of 1949. The production of this plant will be 360,000,000 KWH annually.

Other projects are planned to help relieve the shortage, but it is now estimated that needs will not be met even by 1953 as a result of the shortage of raw materials, electrical plant import delays and the shortage of foreign exchange.

Mining

Mining has for many years been an important source of foreign exchange for Spain. Many types of minerals are produced, the principal ones being iron ore, pyrites, coal, copper, tin, mercury, zinc, lead, manganese and wolfram. However, many minerals which were previously exported are now consumed domestically, and, in the case of copper, exports have given way to net imports.

The index for mineral production in 1947 stood at 26.1, using 1929 as a base year. However, 1929 was a year of exceptionally high production for iron ore, copper, lead and zinc. Production of these minerals fell during the depression and never recovered entirely in the thirties. In 1947 production of iron ore, copper, lead and zinc was approximately one-third below the depressed level of 1935. Coal is the exception to the general decline in mineral production. In 1947 the index was 156.8 and production is reported to have increased in 1948.

The mining industries are handicapped by a lack of modern equipment and transport, and periodically by droughts causing a shortage of power. In addition, recovery of production is hampered by a shortage of labor in the mines and low productivity.

Nearly all minerals are now subject to government control. Allocation and price controls are established by the Instituto Nacional de Industria and imports of minerals are also controlled. The I.N.I. in 1946 absorbed the special war agency (the Consejo Ordenador de Minerales Especiales de Interes Militar) which had been set up to deal with products of interest to national defense.

Coal

Spanish coal production in 1948 was at a high level. Figures are not available for the whole year, but the production of anthracite, bituminous and lignite coal amounted to 7.8 million tons for the first eight months of 1948. This shows a slight improvement over the same period in 1947. The production of coal for the past five years has averaged 11.6 million tons, with 1945, when 12 million tons were mined, as the best year in the history of Spanish coal mining. Though coal production is now approximately 55 per cent higher than in 1935, a shortage still affects heavy industry, transportation and power production. This is due primarily to the almost complete elimination of imports of coal and coke which fell from 1,110,192 m. tons in 1935 to the nominal amount of 7,224 m. tons in 1947.

Deterrents to further increases in domestic production are a shortage of labor, poor machinery, low official prices, and lack of transportation facilities.

In 1947 a total of 87,000 workers were employed in coal mining. Output per worker, however, was as low as 530 kilos per day, owing to outmoded machinery and difficult working conditions in the mines. Special incentives, such as exemption from military service and premiums for daily attendance and length of service were offered in 1948 by the Government to increase the labor force, but the shortage of workers is still great and is expected to continue.

Iron Ore

Production of iron ore has fallen from 6.5 million tens in 1929 to 2.4 million tens in 1947-1948. The sharp drop occurred in 1930-31 with the fall of world prices and there was little or no gain in production before the Civil War. It is thought unlikely that iron ore mining will again become profitable or will regain its former export position. Demand for ore shipments increased in the last year with Holland and Bizone importing from Spain. However, it is not expected that demand will increase further since Spanish prices are high and the quality of iron ore is generally low. Iron ore remains important for the domestic iron and steel industry.

Production of Iron Ore (In millions of tons)

1929	6.5	1935	2,8	1946	2,4
1930	5.5	1939	2.4	1947	2:4
1931	3.2	1945	1.9	1 948	2.4

Source: La Renta Nacional De Espana En 1947. p. 45
Sources: Coal Industry in Spain, American Embassy, Madrid, Jan. 19, 1949, No. 15.
Annual Economic Review, American Consulate, Bilbao, Feb. 3, 1949, No. 1. Spain,
Overseas Economic Survey, April 1948, London, His Majesty's Stationery Office, 1949.

Non-Ferrous Metals

Production of copper, zinc and lead have all declined well below 1935 levels only. Manganese and wolfram have shown a marked increase since that year.

Mineral Production (Thousands of tons)

<u>Year</u>	Copper	<u>Zinc</u>	Lead	Manganese	Wolfram
1929	4,270.1	144.8	180.9	17.9	.255
1930	3,903.6	160,4	163.8	16.8	.235
1931 1935	3,111.7 739.3	111.9 83.1	151.4 88.2	17.9 3.8	.131 .194
1939	196:4	81.7	40.9	4.7	•194 •368 ·
1945	205.4	52.9	39:4	24.8	•293
1946	384.9	65.7	52.5	29.6	•393
1947	108.3	70.9	42.7	22.4	.426
1948	(prov.) 168.3				.621

Source: La Renta Nacional De Expana En 1947.

Mining of copper ore in 1948 increased over 1947 by 60,000 tons, but 1947 was a poor year due to the flooding of the Rio Tinto mining area. Wolfram mine production was 621 tons for the first eleven months of 1948 compared with 426 in 1947. Wolfram had experienced a tremendous boom during the war with as much as 4,038 tons mined in 1942 being supplied to the belligerents. But this expansion was unusual, and at the end of the war the general trend of gradual growth was resumed. Figures for lead and zinc closely approximated those of 1947 for this past year.

Iron and Steel Industry

The Spanish iron and steel industry is concentrated in the northern coastal area around Bilbao and in Barcelona and Valencia. Five companies (the biggest of which is the Altos Hornos de Viscaya, S. A.) produce more than 90 per cent of the total annual output. The Bilbao area developed as a center due to the increasing dependence upon imports of British coal and to the presence of high grade ore deposits in the north. The industry employs 35,000 workers.

The year 1929 was the peak for the industry and production fell to almost half the 1929 level in the 1930's and has never regained its former position.

Production (000's of tons) 1929 1935 503 Pig iron 771 344 559 Steel 1,021 595 495 439 575 541 Rolled products 747 451 381 418 323 1,390 2,539 1,496 1,298 1,484 1,367 To tal

Source: Spain, Overseas Economic Survey, London 1948, p. 53.

Spain has been an importer of manufactured iron and steel products and an exporter of raw materials and pig iron.

The industry operated at only 50 to 60 per cent of capacity during 1948, due principally to a lack of adequate scrap imports and the insufficiency of domestic coal production. It is operating at 1935 levels, but this is inadequate to meet postwar demands. It appears unlikely that the coal shortage will be relieved, and the coal being used in steel plants is of a poor qualtiy. The chief hope for relief of this situation lies in increased coal imports from Great Britain.

Scrap iron has presented an even more serious bottleneck. In 1945, 1946, and 1947 imports were 163, 1,006, and 3,464 metric tons, respectively. Collection of scrap within Spain has increased but it has reached its limit at around 100,000 tons a year.

In the long run Spain will be confronted with a declining supply of iron ore in the Bilbao region. The remaining deposits are located in southern Spain and are of poorer quality. Transportation costs and low grade ore would increase the price of iron and steel products considerably should the northern industries have to rely on the southern supplies.

Textiles

The manufacturs of textiles is the most important industry in Spain, and cotton textiles are by far the most important section of the industry. The main part of the industry is located in Cataluna, with the center in Barcelona. The cotton industry employs 162,000 workers.

The textile production index, in which cotton has the greatest weight, fell from 146 in 1945 to 73 in 1947 (1929 = 100). A shortage of raw cotton and power restrictions were largely responsible for this decline.

No figures are available for production of cotton goods, but it is estimated that approximately 500 million meters are produced in a normal year. The spinning capacity of the industry has declined since the Civil War, while weaving capacity has increased by 15 per cent. Many old weaving machines have been put into operation to increase capacity. However, output and capacity will decline if new equipment is not installed in the near future. There has been an improvement since the end of the Civil War in the quality and finish of cotton goods and also in the dyes.

The cotton textile industry requires approximately 100,000 tons of raw cotton in a normal year for full operation. Since the end of the war, no more than 80,000 tons have been imported on the average each year, and Spain has produced an additional quantity of only 4,000 to 7,000 tons per year. Clearly Spanish grown cotton is not enough to bridge the gap between needs and actual imports. It is also 40 per cent more expensive than imported cotton.

Imports are ordinarily obtained from the United States, Brzail, Egypt, India and the Belgian Congo. The shortage of dollars forced a reduction in imports beginning in 1946, as may be seen in the table below.

The following table shows imports of raw cotton and cotton waste for the years 1935, 1945, 1946 and the first half of 1947:

Metric Tons

		1		
Total imports United States of	1935 101,394 57,849	1945 115,463 76,074	1946 70,154 31,082	<u>1947</u> 57 , 188 700
America Brazil		20,900	30,255	25,808

 Egypt
 24,612
 1,202
 1,539
 7,908

 India
 11,401
 6,646
 5,206
 22,741

 Belgian Congo
 4,257
 2,051
 n.s.

Source: Spain, Overseas Economic Survey London 1948, p. 150.

Construction

Housing conditions have always been quite poor in Spain and have worsened over the past 20 years because of the lack of building activity both before and after the Civil War, and of the shortage of materials since the war. The demand for houses is estimated at 150,000 a year if Spain is to solve her worst housing problems in the next 10 years.

Construction activity began to decline in November 1947 and new construction remained at a low level through 1948. The year 1946 was a peak year for investment in construction. Factors causing the boom were civil war destruction, plant deterioration, increased population, and capital seeking a profitable outlet. By early 1947 the speculative housing market was generally satisfied and in November 1947 credits were suddenly restricted by government decree. New borrowers were required to repay loans in full by the end of 15 months and were to produce evidence that the loan was sound. This was the greatest deterrent to speculative activity in real estate and construction which had driven prices to very high levels on both official and black markets. Buildings which were started before the slump were generally finished through 1948, but new permits issued dropped by approximately 50 per cent.

Monthly Arraya	Construction Data 1940 1948	Other days and a second
Monthly Average	Permits issued	Structures completed
1940	1,178	
1941	1,294	
1942	1,201	
1943	1,141	
1944	1,018	815
1945	2,040	802
1946	2,807	881
1947	2,855	1,144
1948: March	990	1,281
October	1,812	1,761

Chemicals:

The chemical industries which are concentrated in Barcelona, Santander and Bilbao produce mineral acids, alkalis, potash, soap, superphosphates, explosives, essential oils and tanning materials. The newer branches of the industry are plastics, rayon and drugs.

The chemical industry is said to have developed considerably since the Civil War. However, the index of chemical production published by the Consejo de Economia Nacional shows the level of production for 1947 at 59.5, using 1929 - 100. The industry suffered from a lack of raw material imports during the war, and since the war from a shortage of coal and heavy equipment. There also has been a lack of technical knowledge which has handicapped the newer industries. Almost the only big projects which were started during the war years were those prepared by the Instituto Nacional de Industria and private industry for the manufacture of nitrogenous fertilizers and for the distillation of coal.

Cement

The cement industry has grown continuously since 1935 and production reached an all time high in 1947. Monthly reports show further increase for 1948.

Production of Cement (In thousands of tons)

1935	1,463
1940	1,558
1945	1,926
1946	2,145
1947	2,186

Though factories are working at only 60 per cent of capacity, difficulties such as shortages of cement bags, coal, electricity, and transportation prevent further rapid increase which would satisfy pent-up demand.

Machinery

In an effort to increase national self-sufficiency Spain has tried to develop a machine and machine tool industry. However, shortages of raw materials, coal, power and technical skills have kept production at a low level.

The machine tool industry is new and has grown considerably since 1940. The industry employs approximately 2,500 workers. Turnet lathes, milling machines, planing machines, shaping machines, boring and grinding machines and light electrical equipment are among the items produced. However, despite advances made in the industry, production costs remain about double those of other countries. Virtually no heavy motors or electrical equipment are domestically produced due to a lack of technical skills and high quality materials.

Sewing machines can be produced at a rate of 65,000 a year, but production is now considerably below capacity due to a lack of materials. Exports of Spanish sewing machines have started to some South American countries and to Holland in spite of high prices.

Agricultural equipment was imported before the War and efforts are now being made to produce tractors and other equipment in Spain. But progress is slow and present production is not of high quality. There is no local manufacturing of mechanical ploughs, disc harrows, combines or thrashing machines. Production of simpler equipment for the poultry and dairy industry is reported to be adequate.

SPAIN

Indexes of Industrial Production - 1929-1947

(1929 = 100)

1947 1946 1946 1943 1944 1943 1944 1945	1929 1930 1931 1932 1933 1934 1935	Year
90.8 125.7 126.9 136.9 141.3 154.8 159.7 159.7	100.0 99.6 98.7 95.6 83.9 83.1 96.8	Coal
105.7 131.3 118.5 156.9 166.2 150.3 193.7 211.0	100.0 105.8 110.3 116.2 114.9 119.9	Elec- tricity
25. 27. 27. 27. 27. 27. 27. 27. 27. 27. 27	38.5 38.1 41.1 90.0 90.0	Mineral
65,63,64,75 65,63,64,75 65,63,64,75	100.0 75.8 59.3 17.6 146.1 51.5	Metals
87.3 87.5 87.5 87.5 87.5 87.5	100.0 140.2 88.1 97.9 63.3 80.2 86.6	Agricul- tural machinery
65° 52° 68° 52° 68° 52° 68° 52° 68° 68° 68° 68° 68° 68° 68° 68° 68° 68	100.0 60.9 49.7 16.0 10.0 11.2	Trans- por- tation
68.0 89.0 92.9 94.6 103.5 119.5	100.0 101.6 89.8 78.1 77.0 75.1	Construc- tion materials
783.8 783.8 76.6 76.6 76.6	100.0 106.7 98.7 98.1 107.2 115.2 130.9	Chemical products
107.3 117.9 125.4 127.0 119.6 135.6 147.6 161.8 157.1	100.0 104.4 118.1 115.8 110.1 133.5 131.7	Food process- ing
94.5 66.3 84.4 111.8 106.4 89.0 72.6	100,0 126,6 122,3 135,5 124,9 131,6 128,7	tiles
72.3 96.3 92.2 103.5 112.5 112.5 122.7	100.0 101.2 98.7 94.7 91.0 98.6 103.3	General index

Source: La Renta Nacional de Espana en 1947, Estado Espanol, Consejo de Economia Nacional, Madrid, 1948, pp. 50-51.