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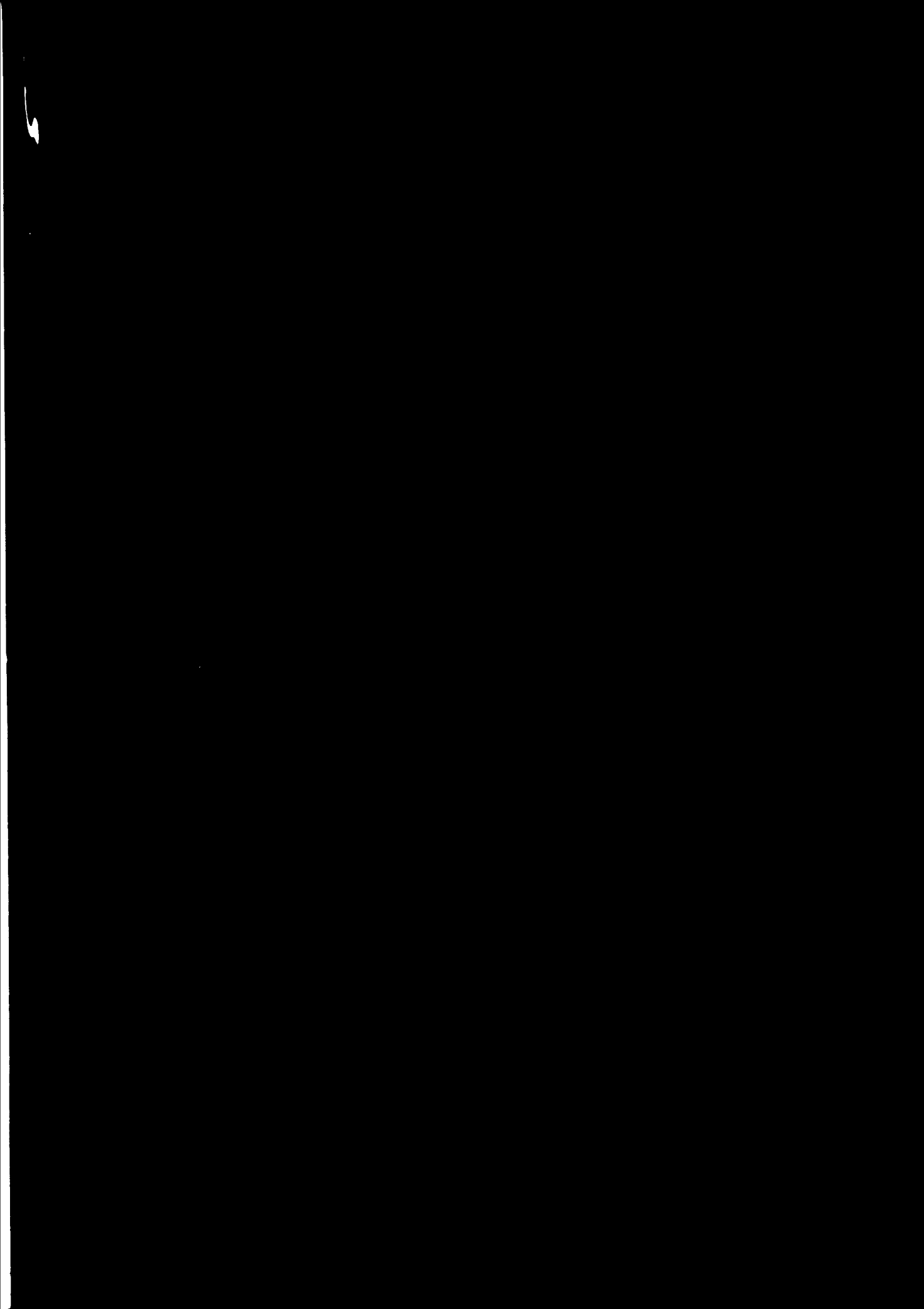
PART

SOCIAL ASPECT OF THE INDUSTRIALIZATION
OF THE DEVELOPING COUNTRIES

Proposed outline as a guide for country papers to be prepared
for the Second General Conference of UNIDO

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PROPOSED HEADINGS OF THE CHAPTERS :-

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SOCIAL ASPECTS OF THE INDUSTRIALIZATION OF THE DEVELOPING COUNTRIES

(Outline)

1. Whatever one's theory of development may be, there is general agreement in acknowledging that the stimulation of development requires the introduction of a certain number of social measures. The socio-economic structure of an under-developed economy is per se a major obstacle that must be overcome. This is almost a tautology, for if the situation were otherwise, there would be no under-development. On the other hand, industrialization has in turn a modifying effect on the socio-economic structure. However, the nature, extent and pace of the changes wrought depend on the strategy adopted. This being so, a study of the social aspects of the industrialization of a developing country must be divided into three distinct parts:-

- First part: The social preconditions of industrialization
- Second part: The social effects of industrialization
- Third part: The selection of an industrialization strategy and its social consequences.

First part: THE SOCIAL PRECONDITIONS OF INDUSTRIALIZATION

2. It is always possible to "graft" a certain number of modern factories on to an under-developed economy. History records cases of this. What one observes in such instances, however, is a kind of "rejection" phenomenon, as in the case of organ transplants. The economy as a whole fails to assimilate the activity thus implanted within it and the industry thus created appears as the appendage of an alien economy with very little impact on the national economy in its entirety which continues along its more or less traditional lines and in any event remains stagnant.

3. Only measures of a social nature bringing about appreciable changes in socio-economic structures can prepare the way for a genuine industrialization effort. These measures fall into two categories: the first includes economic aspects; the second relates exclusively to the social arena.

1. Redistribution of the national income

4. Social measures of economic relevance can ultimately be reduced to redistribution of the national income on new foundations. Agrarian reform, nationalization, highly progressive tax systems and the like have direct effects on the pattern of income distribution. From an economic point of view, it is precisely this aspect that promotes development, and especially industrial development.

(a) Savings and consumption

5. Very significant in this regard is the case of agrarian reform. Large landowners as a social group are distinguished sociologically by a very high propensity to consume, verging on wastefulness. The commanding position which this group enjoys in the society makes extravagance a status symbol and in this way influences other social groups which, in other societies, are more inclined towards saving (as, for example, the entrepreneurial class). By a drastic lowering of the landed property ceiling, a class with extravagant spending habits is cut off from an important portion of the national income. To be sure, land distribution under agrarian reform - especially when not accompanied by onerous financial obligations - leads to an increase in the income of the beneficiaries and consequently in their consumption. Nevertheless, if the holdings of the landed class are expropriated without compensation, while those to whom they are parcelled out are called upon to make certain payments to the State, some income is shifted from consumption to social saving (this was the case in Egypt). Moreover, the disappearance of the life style associated with large land ownership has a salutary effect on the propensity to consume calculated on a national scale. As to the increase in the consumption of the beneficiaries of land reform, this is favourable to industrialization since it contributes to the expansion of the internal market, which is indispensable for emerging industry.

(b) Mobilisation of national capital

6. By nationalising the more important enterprises, and especially those which exploit national resources, the State becomes able to retain within the country a portion - and often a very sizable portion - of the national

product which has heretofore been transferred abroad. The nationalization of major local enterprises, on the other hand, serves two purposes; the reduction of the highest incomes as a means of cutting back consumption, and the extension of direct State control over important financial assets in the interests of better reallocation.

(c) Sectoral investment allocations

7. By both direct means (allocation of public funds) and indirect means (fiscal measures, credit policies, etc.), planning should bring about a reallocation of resources, financial and otherwise, to make available the funds required for industrialization. It is clear that this cannot be accomplished until the structural reforms alluded to above have taken place. It is a known fact, for example, that it is extremely difficult to induce landowners to invest in industry; businessmen to finance major projects, and the subsidiaries of multinational companies to do anything than what is dictated by their centres of decision-making, located in some foreign country far removed from issues of local concern.

2. Social measures

(a) Education

8. Economists too often tend to limit their view of the problems of industrialization to the technical and financial aspects and not to accord sufficient importance to the human factor. This attitude implies two premises which are to say the least questionable:- First, that given the prevailing rate of under-employment, there is an unlimited supply of unskilled manpower, and, second, that the technicians and supervisory personnel can always be brought in from abroad. To begin with, the siphoning off of competent people from traditional occupations does not always take place automatically according to the mechanisms of the market (owing to excessive attachment to traditional pursuits, apprehensions regarding work in industry, and other factors). Additionally, there is always the problem of training, which is often difficult to solve where there is widespread illiteracy. Finally, education still remains the best import-substitution industry. Such countries

as India and Egypt benefited greatly, when industrial projects were launched, from the progress that had previously been achieved in the educational sector. In other cases, major outlays for education and training are needed from the outset of the development effort. Intensive campaigns to eliminate illiteracy among the population are indispensable.

(b) The emancipation of women

9. Another aspect of the comprehensive approach to development within which industrialization must take its place if the desired goals are to be achieved is the cultural aspect - the remoulding of social attitudes in a number of areas. Chief among these is the question of the status of women. The female labour force is recognized as being the best suited for certain industrial occupations. The importance of women's emancipation, however, reaches far beyond this rather minor point. When women are barred from an active role in today's productive vocations and restricted to a manifestly inferior status, this is in itself a sign of a state of cultural under-development which is inimical to any effort towards modernization. We might note at this point that the road to the emancipation of women leads through education and independent work; it is an illusion, in this area, to suppose that legislative measures alone will suffice.

(c) Labour legislation

10. According to classical economic analysis, the lower the wages and the longer the working day, the greater the profitability of an industrial enterprise will be. The historical record of today's advanced countries would appear to confirm this view. At the present time, however, the situation in the developing countries is different. On the one hand, working conditions in industry must be attractive enough to draw manpower from traditional sectors where extra-economic considerations (independence, family ties and the like) may tend to discourage relocation even if the material standard of living is low. On the other hand, workers in the new industries (particularly in the skilled categories) are quick to draw comparisons between their situation and that of the workers in the industrialized countries. For these reasons, a reasonable wage, a working day in accordance with inter-

national standards, job security and a social insurance system covering unemployment and health insurance, etc, are prerequisites for industrial development in a climate of social tranquillity. Housing and transportation facilities, cultural activities and the organization of leisure time are additional factors which contribute to the stability of the work force and the improvement of its productivity. Finally, by allowing the workers to share in the profits of the enterprise and participate in one way or another in its management, they can be given a sense of belonging to the organization for which they work and of being involved in the industrialization process.

(d) Regional development and urbanization

11. It is an error to permit the selection of sites for new industries to be guided solely by micro-economic criteria. The law that "industry attracts industry" may lead to excessive urban concentration, usually around the capital, thereby aggravating the dichotomy, in geographical terms, between modern and traditional sectors. Additionally, there is an awareness today of the environmental hazards implicit in any kind of uncontrolled industrialization. It is essential, therefore, that the location of new enterprises be sub-ordinated to an overall policy of regional development aimed at the balanced growth of the different regions of the country as well as at the most rational utilization of space.

Second part: THE SOCIAL EFFECTS OF INDUSTRIALIZATION

12. The introduction of industrial activity in an economy which previously was without such activity sets off a number of social and cultural repercussions which are in general beneficial. Certainly, by judiciously selecting the industrialization strategy, the positive effects of this process can be emphasized and its negative effects minimized. In any event, however, industrialization will entail certain social consequences which it might be well to enumerate before discussing the merits of the various alternative strategies. The following appear to be the most important.

1. Employment

13. The first effect to follow from the introduction of an industry is the creation of new jobs. The development of an industrial sector where none previously existed implies the creation of new labour markets capable of absorbing a part of the under-employment which is typical of most of the developing countries. This is an indisputable fact. The only possible area of contention concerns the cost, in capital, of a job in industry vis-à-vis jobs in other sectors of the economy. A number of observations come to mind in this regard. In the first place, immediate and intensive industrialisation should not be elevated to the status of a dogma; in certain countries, the priority during the initial stage of development should be given to agriculture. This should be the case whenever the country in question has a rich, unexploited agricultural potential coupled with a relatively small population (as in the Sudan); industrialization will follow the exploitation of the country's agricultural resources and will be based on the utilization of agricultural raw materials and on the production of the industrial supplies required by modern agriculture. Secondly, account must be taken of the high productivity of industrial labour and its effects on the growth rate of the gross national product. Thirdly, in any long-range planning, consideration must be given to the stimulating effect of industry on the other sectors and to the jobs that will be created in these sectors. Finally, the level of employment in industry will depend on the strategy adopted. We shall return to this point in the third part.

2. Standard of living

14. The initiation of an industrial activity means immediately a significant improvement in the standard of living of the industrial workers. The newly created jobs and wage levels that will always be higher than those found in agriculture or in the traditional occupations are advantages that require no commentary. Often, too, the implementation of industrial projects - particularly when they are located away from the urban centres - involves the construction of housing, medical facilities and the like. If the industrial effort gains momentum, its impact on the other sections of the population tends to spread. The increasing purchasing power of the workers is reflected in the form of greater demand for consumer goods and, above all, agricultural products. The result is an increase in the price of these products and a possible expanded supply. Furthermore, industry normally generates a demand for agricultural raw materials. By virtue, therefore, of this dual effect industrialization leads to some development of agriculture and to an increase in agricultural income. If the country in question has already instituted a programme of agrarian reform, the distribution of this new income should result in a rise in the standard of living of the peasantry. Similar consequences may make themselves felt in other sectors of the economy - transportation, commerce, the professions, etc. Finally, the products of the consumer goods industry make for better supplied markets at prices lower than those charged for imported goods, particularly in view of the marked upward trend in world prices for manufactured products. However, the success of industry in this area is dependent to a great extent on the strategy adopted. We shall return to this.

15. With regard to the effects of industrialisation on the distribution model for incomes in the industrial sector, it would be prudent to say that this model will ultimately depend on the form of ownership and the method of management. Political factors will play a major role here.

3. Education

16. The simple act of becoming an industrial worker implies the acquisition of certain new vocational skills. Moreover, new industries will feel the need to organize in one way or another a system of vocational training. They will frequently have to send their technicians, engineers and administrators on training courses or even on study missions. As the industrial sector expands, the demand for skilled manpower, foremen, technicians, engineers, book-keepers and the like will reach the point where political authorities will have to restructure and expand the system of technical and higher education, while at the same time increasing the number of training centres at all levels. In this way, industrialization, if pursued at all seriously, inevitably becomes a powerful stimulus to the development of education. Planners who fail at the outset to provide the necessary investments for this sector will not be long in perceiving their error.

4. Status of women

17. Another aspect of cultural development implicit in industrialization is the emancipation of women. Industry makes more and more jobs available to women; but what is even more important is that these are individualized jobs, paid for in money, and are not merged in a collective family activity. In this way, the woman industrial worker acquires an economic independence unknown to her sister in the fields, even if, the latter sometimes performs more demanding tasks. It is this material independence that provides a firm foundation for the liberation of women - with all that this implies in the social and cultural arena. In addition, advance in industry depends on vocational training and education. Consequently, industrial development is normally accompanied by marked progress in making education available to young women - and education is the second pillar of women's emancipation.

5. Family planning

18. Plenty has been written about the fact that a large number of developing countries suffer from too high a rate of population growth. Several of these countries have adopted family planning programmes, the results of which have to date been somewhat disappointing. The deliberations of the symposium on population and economic development organized by the United Nations at Cairo from 4 to 14 June 1973, as part of the preparation for World Population Year, brought out clearly the fact that the chances for success in any programme for controlling births lie essentially in the integration of this programme within a comprehensive policy of development. This reasoning is based on the historically and sociologically proven fact that birth rates tend to fall in industrialized societies.

6. Modernization

19. Industry is a modern mode of production. Its existence is a factor in the modernization of society. In the final analysis, however, the influence of this factor will depend on the closeness of the relationship between the industrial sector and the rest of the economy, as well as on the percentage of the total population directly or indirectly touched by industrialization. There is a danger of the industrial sector remaining an isolated island within a traditional economy, just as, on the other hand, it may have a revolutionary impact. Thus, here again we come face to face with the problem of the industrialization strategy.

7. The institutional framework

20. The social conditions required for economic development cannot be satisfied overnight. Rather, specific social, economic and political measures correspond to each phase of development. This is not an easy task to achieve since it is impossible to repeat the same industrialization stages of the developed countries; indeed, it must be admitted that the strategies adopted by developing countries have not had any significant results until today.

Third part: INDUSTRIALIZATION STRATEGY AND SOCIAL DEVELOPMENT

21. As we have underscored on more than one occasion, the nature and scope of the social effects of industrialization will ultimately depend on the strategy adopted in this area. Outlined below are some elements of this strategy which seem to us to be of major importance.

1. Industrialization and comprehensive development

22. It is a truism that no one sector of a country's economy should be developed indefinitely while the others are left to stagnate. The backwardness of the latter sectors will in the end inhibit the growth of the area favoured. A backward agriculture will be unable to supply industry with a sufficient quantity of raw materials or to keep the market satisfactorily stocked with food products in the face of growing demand by industrial workers. Similarly, a lagging educational system or infrastructure will prove a serious handicap. And more examples could be cited. It may thus be concluded that the success of industrialization itself will be determined by the degree to which it is made a part of a total effort aimed at economic, social and cultural development. What this means is that a proper strategy must take into account the social aspects from the outset. Moreover, the development needs of other sectors must be kept in mind when selecting the industries to be established. The guiding principle here should be to increase constantly the inputs from other sectors into industry along with the inputs from industry into these same sectors. In other words, the extent to which the effects of industrialization (including its social consequences) are spread will depend on the intensification of exchanges between sectors.

2. Modern technology and local techniques

23. Let us make the immediate point that it would be an error to fall into the trap of extolling antiquated technologies on the pretext that they are "labour-intensive" or that they do not call for a vocational training effort. Still more do we reject the repudiation of industrialisation in the name of combating unemployment. Genuine development demands industrialization, and, in principle, a new industry must also be a modern industry. On the other hand,

it would be wrong to make a clean sweep of all local production methods. On the contrary, the establishment of a modern industry embodying advanced technology must go hand in hand with the encouragement of already existing forms of manufacturing production. While requiring no major investments, this policy makes it possible to put large numbers of people to work and frequently fits in with the tastes of local consumers (a typical example here is local textiles). Support of crafts and so-called traditional small-scale industry should not be thought of solely in terms of social considerations - a better evaluation of their economic significance is needed. The measures devised to maintain these activities should not be aimed purely at conservation, but should be directed towards developing them.

24. Concomitantly with the establishment of major industrial projects, reasonable resources should also be allocated to the starting of small or medium-sized enterprises in such fields as the processing and transformation of agricultural products, repair activities, the manufacture of certain multi-purpose spare parts and the like. Here again, no very large investments are required, and at the same time the industrialization process is thus enabled to spread through the various economic sectors and regions. It will be clearly seen that the purpose of all these measures is to prevent the splitting of the economy into two sectors - the one modern but limited, the other encompassing all the remaining areas of economic activity.

3. Exports and the local market

25. It goes without saying that one of the purposes of an industrialisation effort must be to increase the export capacity of the country in question. Industrialisation at first places a heavy burden on the balance of payments because of the need to import capital goods. The search for medium-term and long-term equilibrium in foreign trade requires that part of the industrial output should be exported.^{1/} Additionally, export is a stimulus to technical progress and an incentive to improving the competitiveness of new industries. There are, however, two perils to be guarded against. First, any industry which relies on the export of all or most of what it produces will always be at the mercy of its foreign outlets and of fluctuations in the international

^{1/} Translator's note: the original reads "imported".

situation, both economic and political. A domestic market absorbing 50 to 60 per cent of the production is a guarantee of survival. Second, an industry which is not responsive to the desires of local consumers or to the development needs of the other sectors of the economy is not integrated with the national economy and will necessarily have limited effects on the standard of living of the population and on the rate of development in general.

4. "Labour-intensive" and "capital-intensive"

26. A wisely selected industrialization strategy must combine highly capital-intensive enterprises with those which employ a large amount of labour. The reasons are evident; one must reconcile the need for advanced technology with the need to minimize unemployment. The rule here should be that whenever the technology employed has a tangible effect on the quality of the product the most up-to-date technology should be selected. This is the case, for example, in the iron and steel and petrochemical industries. In other situations the choice should fall to technical methods which guarantee a high level of employment, a typical example here being the building industry, where the effects of mechanisation on the quality of construction are negligible. In the same order of ideas, certain stages of some production processes (raw materials preparation, assembly of finished products and the like) can be accomplished with a minimum of mechanization. Here we have a particular aspect of a more general problem, that of adapting imported technologies to local conditions. Finally, certain industries may even rely on handicraft labour, the part-time work of women or cottage workers using rather simple machinery - an example here might be the garment industry.

5. The "pace-making" industries

27. Mr. F. Ferroux uses the term "industries entrainantes" to describe those industries whose existence almost spontaneously triggers the emergence of other industries. These are for the most part basic industries. Instead of the strategy of producing import substitutes using imported intermediate products and raw materials, a more rational strategy is needed: the establishment of complete production cycles from raw material to finished product. To be sure,

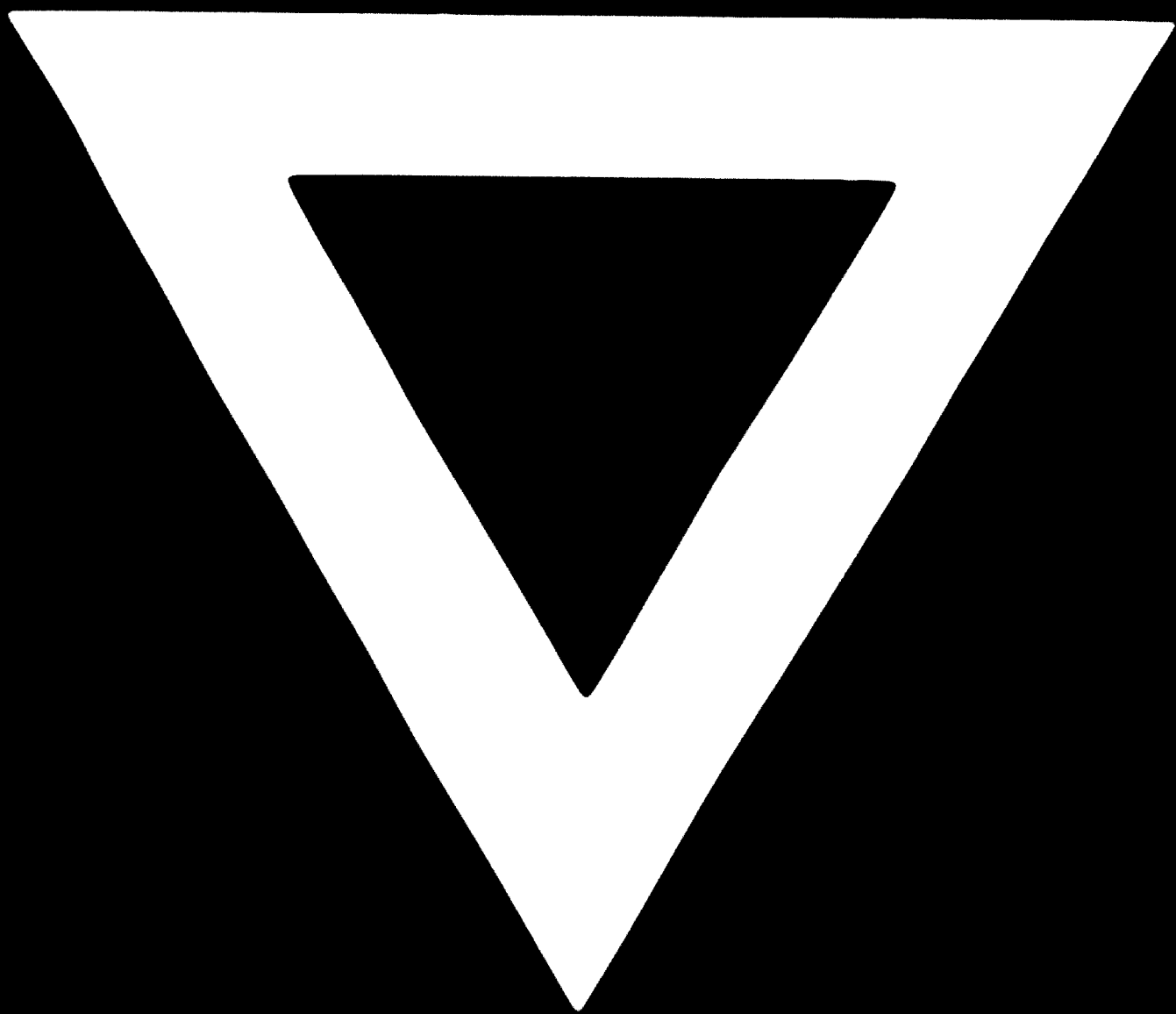
one country cannot produce everything; on the contrary, it is important to pay heed to the principle of the international division of labour and to specialise. But on what basis? On the one hand, there are raw materials and available or potential energy sources; on the other hand, there are the finished products necessary for local consumption and, possibly, for export. A strategy which permits the successive establishment of the production processes necessary for proceeding from the former to the latter will be a rational strategy, homogeneously integrated into the economy as a whole and destined to have a permeating effect at the social and cultural levels.

6. Forms of ownership and methods of management

28. Finally, in order to assess the true social impact of industrialization, one must know where the profits realized by the newly created industries will go. If these profits are exported rather than re-invested, or if they go to a wealthy minority to be spent in large measure for the importation of luxury items, the benefits gained from industrialization by the public at large will be minimal. Worse yet, a brake will be placed on industrialization itself for some time to come. On the other hand, when the workers have an interest in the profits and the bulk of these profits are re-invested, the development process will be accelerated and the social spin-off will be more tangible. Similar results can be expected from participation by the personnel in the management of enterprises.

29. In conclusion, the social effects of industrialization will be more numerous and more appreciable if its underlying strategy is integrated within a comprehensive programme of self-oriented and - over the long term - self-sustained development.





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