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Training Workshop on Small-scale Industry in the
Least Developed Countries of Asia, the Far East
and the Middle East

Kathmandu, Nepal, 1-12 April 1974

REPORT OF THE
TRAINING WORKSHOP ON SMALL-SCALE INDUSTRY IN
THE LEAST DEVELOPED COUNTRIES
OF ASIA, THE FAR EAST AND THE MIDDLE EAST^{1/}

^{1/} This report has been prepared, at the request of the UNIDO Secretariat, by Manir Uddin Ahmed, Chief Accountant, Bangladesh Small Industries Corporation, who participated in the Training Workshop. The report is based on notes taken by the author, on a report prepared by the participants at the end of the session, and on the discussion papers and background documents submitted by UNIDO to the meeting. The views and opinions expressed in this report are those of the author and do not necessarily reflect the views of the Secretariat of UNIDO. This document has been reproduced without formal editing.

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INTRODUCTION

1. The Training Workshop and Study Tour on Small-scale Industry in the Least Developed Countries of Asia, the Far East and the Middle East was held at Kathmandu, Nepal, from April 1, 1974. The seminar was jointly organised by the United Nations Industrial Development Organization (UNIDO) and the Centre for Economic Development and Administration (CEDA) of Nepal.
2. The seminar was attended by 12 participants from 8 countries and territories, two staff members and 3 consultants from UNIDO, a representative of the International Labour Organisation (ILO), an observer from the International Development Research Centre (IDRC) and 4 local consultants along with 2 local project associates. A list of participants is attached.
3. Dr. Ratna Shumshere J. B. Rana, Director of CEDA, presiding over the inaugural function, extended a hearty welcome to all the participants and stated that, in 1971, the United Nations General Assembly, in its resolution 2768 (XXVI), requested organs and programmes of the United Nations to initiate action-oriented programmes in favour of the least developed countries. Dr. Rana referred to the inefficiency of approaching development problems by adhering to certain models of economic development in the developed countries and advocated initiatives in ascertaining the economic reality of the developing countries and finding out new ways and means to overcome their constraints, to satisfy their special needs and to expedite economic development. The ultimate purpose of promotion was to foster self-help and self-reliance and the hope that United Nations agencies would come forward with action-oriented programmes and would utilize the expertise gained in developing countries. He expressed the view that programmes which are carbon copies of those carried out in more developed countries, or are based on their experience, are not likely to succeed in the case of the least developed countries. Though these countries may be poor, they have a rich social, cultural and traditional heritage which they wish to preserve. For this reason he felt that country representatives should be more involved in the formulation of programmes by various United Nations agencies relating to these countries. In the context of the least developed countries, the strategy for industrialization should seek to sustain agricultural modernization, rural development, employment generation, and international trade.

4. Inaugurating the meeting, Mr. Bhuvan Man Singh, State Minister of Industries and Commerce, H. M. G. Nepal, stated that the workshop was a timely event, especially as regards Nepal which had placed special emphasis on the development of small industries through an integrated programme, and had enacted a new industrial policy which was in the process of implementation. He hoped that the Workshop would result in practical suggestions which could be adopted for the promotion of small industries. He suggested that ways and means be found for regional co-operation in the field of small-scale industries, for instance through a pool of inter-regional expertise to undertake research and development, to disseminate information on indigenous technology and to provide consultancy services.

5. In his message to the participants, Mr. I. H. Abdel-Rahman, Executive Director, UNIDO, expressed his appreciations to H. M. G. of Nepal and CHDA which co-sponsored the Training Workshop in Kathmandu and to the Government of India for organizing and financing a study tour in India. He said that this was the first special project for the least and less developed countries of Asia, the Far East and the Middle East. Holding the training programme in one of the least developed countries and organizing the study tour in another developing country, he said, was a striking example of co-operation among developing countries. He said that, in the least or less developed countries, small-scale industry had a major role to play. There was much scope for the smaller industrial enterprises in countries confronted by special difficulties due to their small size, their isolation, their narrow market, their shortage of natural resources, the lack of diversification of their economies and generally, their poverty.

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I. THE ROLE OF SMALL-SCALE INDUSTRY
IN THE INDUSTRIAL DEVELOPMENT OF DEVELOPING COUNTRIES
WITH SPECIAL REFERENCE TO THE LEAST DEVELOPED COUNTRIES

What is a Small Industry?

6. The identification of small-scale industry in the industrial policy or in the industrial development programme of a country is a prerequisite for launching a successful development programme for that sector. The participants explained the definitions of small-scale industry that had been adopted by their respective countries. The basis for the identification of small-scale industry varied considerably from country to country and sometimes even within the same country (over a period of time). Such variations, it was felt, were mainly due to differences in the stage of economic/industrial development and also due to differences in the socio/economic/industrial objectives of different countries. There were a few countries, it was observed, which have not as yet adopted any precise definition of small-scale industry.

7. The commonly used criteria for identification of small-scale industry was a ceiling on investment in fixed capital and or on employment. The employment criterion has the advantage of simplicity but suffers from the defect that it may not reveal the real size and scale of operation, since some industries may require high capital investment but may require a small number of workers. This criterion may at times be a deterrent to labour-intensive industries. The investment criterion was more complex since investment had to be defined and its real value assessed. In some countries investment included only plant and machinery, in some others it included fixed assets and land, while in some others it included working capital also. The limit in terms of monetary investment in the countries represented varied from approximately one hundred thousand dollars to three hundred fifty thousand. The argument for fixing an investment limit in plant and machinery only is that this measures well production capacity of a unit and that there is an international price level for this.

8. The reasons for excluding working capital are: (a) the difficulty in making a correct assessment of working capital; (b) the fact that small-scale industries with small fixed capital investment but requiring very high working capital would be excluded from the benefits given to that sector; (c) control of working capital is more a managerial problem than an investment problem;

and (d) working capital is an operational requirement which becomes evident only after an industry has been established and not before.

9. In the context of developing countries and more particularly of the least developed countries the identification of small-scale industry in terms of machinery and equipment was found to be more practicable. The ceiling would depend on the stage of industrial development of each country and the socio-economic objectives of its industrial policy. The ceiling should be kept reasonably high to accommodate modern small-scale units. The ceiling should, however, be flexible and should be reviewed at periodic intervals to take into account rises in price level of machinery and equipment. It is not possible to have a definition of small-scale industry applicable equally to all developing countries.

10. Small-scale industry can be differentiated from traditional or cottage industries on the one hand and from medium-sized and large-scale industry on the other. A modern small-scale industry differs from cottage, artisan or traditional industry not only in volume of production but also in production techniques and organisational methods and management procedures. In cottage or artisan industry the entrepreneur generally earns subsistence-level income through self-employment or employment of family members, uses traditional techniques and tools and equipment and tends to shift to other jobs when he finds it more remunerative. A modern small-scale entrepreneur takes a calculated risk in organising and managing the unit on a whole time basis; he is profit-motivated and endeavours to produce quality goods at competitive prices by making the most efficient use of his plant and machinery, labour, raw materials and organisational skills. Thus the entrepreneur in a small-scale unit is an organiser who takes upon himself the entire management function with profit motive in a challenging situation. A small-scale industry differs from a medium-sized or large-scale industry in the scale of operation; it cannot match these in specialization of management function nor in volume of production. Thus, small-scale industry may have a lower limit on investment to differentiate it from cottage or artisan industry and a ceiling on investment - the point at which it does not require any more special assistance to compete in the market successfully - which will be a starting point for medium industry.

11. The ultimate objective of a modern small-scale industry is to produce goods and services of high standard and quality at competitive price through modern management methods and production techniques and by using up-to-date

plant, machinery and equipment. This objective, it was agreed, cannot be achieved in most cases without passing through transitions. In tradition-bound societies with a low level of technical education, adaptation to modern processes should be gradual and should normally start by adapting indigenous production techniques to the challenging needs of time. The technology to be imported should suit the capacity of the local people and be capable of meeting local demand. Where necessary, the imported technology should be adapted to suit the local needs. In each case, the technology adopted should be appropriate to the needs and should not necessarily be the most modern.

12. In the context of developing countries, small-scale industries should be broad-based; they should not be limited to units manufacturing consumer goods or capital goods only but should also include service units, crafts units and units engaged in the production of construction materials etc. Experience shows that many entrepreneurs normally enter small industry through service and other activities which are comparatively less complicated and less risky.

The Role of Small-scale Industry

13. The relative position of small-scale industry in the over-all industrial policy of a country is a matter of policy decision which should be taken by the policy-makers of the country. Such a policy decision, it was pointed out, is influenced by the availability of natural resources and the existence of skilled manpower, availability of capital - foreign and local - market prospects at home and abroad and other social, economic and political considerations. Small-scale industry, particularly in the developing countries, may have an advantageous position in the over-all industrial programme. It may play a more important role than is normally thought of and a careful scrutiny of its socio-economic effects, with particular reference to development of entrepreneurs and making the industrial growth broad-based, will reveal that its development may be a prerequisite for industrial growth in some of the least developed countries.

14. There are many goods and services which can be produced economically on a small scale and there are some goods which can be produced more economically on a small scale than on a large scale. In such cases smallness is not a handicap but is a distinct advantage.

15. In some developing countries, the absence of marketing facilities and the lack of effective transportation systems may result in isolated local markets of limited scope. In such cases production on a small scale is the only means in meeting the local demand.

16. In the least developed areas, small-scale industries may be the only means for tapping resources including entrepreneurship, capital, labour and raw materials which would otherwise remain unutilized or under-utilized.

17. Many small-scale industries are labour-intensive in their methods of production and are characterized by low capital-labour ratios, an important consideration in developing countries with scarce capital and abundant labour. Even where advanced technology is used in small enterprises and the capital-labour ratio is relatively high, the total amount of capital required is relatively small and can be raised out of private domestic resources, without recourse to loans and aid from foreign countries. Thus promotion of small-scale industry is an effective way for employing more people.

18. Small-scale industry offers a unique opportunity to a man of small means, with little knowledge of modern technology and management methods, to engage in industry and to participate in the benefits of independence and economic development. Thus a programme of small-scale industry in a developing country gives scope for engaging more local people in industry.

19. Small-scale industries may be set up in different areas and thus facilitate industrial decentralisation. This may bring socio-economic benefits by retarding the drift of population from rural areas to urban areas and by allowing the profit of industries to be shared by more people in different areas.

20. The development of small-scale industry may contribute to political stability since small industrialists have a stake in the continuity of the Government or the political system.

21. Small-scale industries offer a training ground for management and labour. They are one of the most promising means of promoting entrepreneurs, i.e. of inducing the participation of people from different walks of life with limited financial resources and scant technical and management experience in the

industrialization of their country. This role of small-scale industry is of prime importance in those countries where the industrial structure consists of a few large-scale and medium-sized industries, usually foreign or Government owned on the one hand and large numbers of traditional or cottage industries on the other. The lack of modern small-scale industries is not only a factor of imbalance in the industrial structure but one of stagnation for the economy as a whole. To promote small industry is essentially to promote domestic private enterprise. Thus, especially in countries where few small industries exist, the promotion of this sector is not only a means of strengthening and diversifying the economy and raising living standards but also, through the creation of a new class of local entrepreneurs, of achieving major social and political objectives.

22. Efficient small-scale industries may not only co-exist with larger undertakings or compete successfully with them but also, in some cases, be linked with them in complementary relationships in which they produce for them, as subcontractors, various parts and components or carry out certain processing or finishing operations. Small-scale industries have both supplementary and complementary roles vis-à-vis large-scale industries.

Are Small-scale Industries Handicapped?

23. Small industries, it was agreed, are not necessarily handicapped industries; they rather represent that stage or class of industries which faces structural weakness because of smallness of size and scale of operation. Smallness of size and scale of operation may have special advantages, particularly in developing countries, which give them a distinct role in industrial development. The special role which they can play in industrial development calls for special measures of promotion and assistance that are needed to offset or remedy the structural weakness or handicap due to smallness of size and scale of operation. They are unable to carry ^{out} self-help programmes and their Government should step in to assist them. The study of development of small-scale industries in developing countries reveals that, in many cases, their development has been the result of Government assistance. Small-scale industries can reasonably expect the Government to ensure that smallness does not perpetuate handicaps.

Development Policies for Small-scale Industries

24. It was agreed that the role of the Government was a very important factor in the promotion of small-scale industries. If the Government has to provide funds in the process, this will be outweighed by the results. A national Government, as distinct from a colonial Government, should take this risk.
25. The Government should assist small industries to overcome the disadvantages of smallness of size, to make better use of the advantages of smallness and to achieve higher levels of efficiency. A prerequisite for such action is the identification of industries which have the potential for development and which are in need of assistance.
26. The promotion of small-scale industries should, therefore, be selective. It should take into account their viability, competitive strength and growth potential. Government policies should not be aimed at giving rise to, or artificially sustaining weak, vulnerable and inefficient industries. The Government should therefore identify the types of industries which are economic on a small scale, which can sustain the competition of large firms or which can be linked with them by complementary relationships and which have prospects of expansion and diversification.
27. The selection of location of industries is equally important. As stressed earlier, small-scale industries may, on account of their locational flexibility, play a substantial role in decentralization programmes. In most developing countries, however, the lack or inadequacy of infrastructure in vast regions limits the choice of location of industries. The special advantage of small-scale industries is that most of them can be operated in locations where the supply of basic facilities is limited and where larger firms could not be economically set up. But even small-scale industries require a minimum of infrastructure facilities, skilled labour, raw materials and market outlets. The development of small-scale industries should be closely co-ordinated with the availability of infrastructure.
28. The identification of industries or locations without identifying the availability of entrepreneurs will not be of much help for the promotion of industries. The availability of prospective entrepreneurs in the particular field or area should be ascertained simultaneously.

29. The identification of industry, location and entrepreneur should have direct relation with the availability of infrastructure facilities, skilled labour, raw materials and market outlets. All of these will require surveys: the Government should ascertain the prospects of development of small-scale industries in various fields and in different parts of the country.

30. Since small-scale industries are in need of help in all aspects of their planning, establishment and operation, the various measures of promotion and assistance, i.e. financial, technical, management etc. should be provided by the Government in a package form. The Government should be ready to give all possible assistance and should extend it to those who need it. Individual measures may remain ineffective if not integrated in comprehensive assistance programmes. The slow progress of small industries in many developing countries despite willingness and effort of the Government to develop them rapidly can reasonably be attributed to the inadequacy of incentives and to the absence of a co-ordinated package-programme of assistance. Such incentives and programmes should include: (a) incentives such as tax holiday, tariff, differential excise and customs duty concessions; (b) establishment of industrial estates; (c) provision of liberal financing; (d) provision of industrial extension services, etc.

31. In developing countries, such integrated and sustained assistance can be provided only by the Government either through appropriate institutions devised exclusively for the development of small industries or through the department of industries. Whether or not to have an exclusive organisation for the development of small industries is a moot point; this will depend on the stage of economic and technical development in a country and the degree of emphasis laid on the development of small industries in that country. At the initial stages, such assistance may be provided by the department or organisation responsible for over-all industrial development but at a later stage an exclusive organisation for the development of small-scale industries with a co-ordinated programme of assistance will be found more useful. Then the regulatory functions and policy formulation would be assumed by the department of industry and the development functions by a single development agency.

32. The main purpose of all these measures is to support small industrialists through the initial stages and to lead them towards effective, self-reliant management, high-quality low-cost production and self-sustained growth. Government assistance should not however lead to the growth of a spoon-fed group which cannot survive without Government support. The Government's

role should be limited to the assistance required and to the extent and time required to help these entrepreneurs to stand on their own feet.

33. There is however, scope for some co-operation on the part of private and business associations. The Government should facilitate such co-operation and co-ordinate their action. In view of the shortage of industrial extension personnel, the Government might sometimes consider using the services of business associations and consulting firms and support in full or in part the cost of their operation. Similarly the Government may also induce commercial banks, through guarantee or insurance schemes, interest rate subsidization and similar supporting measures, to advance loans on liberal conditions to small industrialists. The Government should encourage private agencies or groups of entrepreneurs to take up at least some of the promotional activities in due course. The promotional role of the Government should be progressively reduced as the country advances and private agencies and institutions come forward to provide the services and facilities needed by industries.

34. While providing assistance, the Government or the developing agency should keep in mind that their role is to provide assistance to, and not to interfere in, the activities of small industrialists. The entrepreneurs should play the primary role and the Government should assist them to the extent required.

II. THE FUTURE OF THE TRADITIONAL SECTOR IN THE PROCESS OF INDUSTRIALIZATION

35. In all developing countries the future of the traditional industrial sector is an important policy problem. In some countries there is confusion between traditional and modern sectors and development policies focus on upgrading handicrafts and artisan enterprises rather than promoting modern manufacturing units. Sometimes modern small industry is being developed but little attention is given to the role and place of the traditional sector in a modernizing economy.

36. The distinction between small industries and traditional industries, as pointed out earlier, is based mainly on the types of organization, equipment and technique and also on the types of products involved. In all primitive traditional industries there is little or no division of labour and a minimum of machinery is used, hand-crafting being a predominant method of processing. In the case of hand-crafting, the artistic skill and the artistic and ornamental value of the products are the distinguishing characteristics.

37. In nearly all the least developed countries, artisan and traditional industries account for a sizable portion of industrial production and employment. In view of socio-economic conditions prevailing in these countries, these industries will continue to play an important role in their economy for considerable periods of time. The promotion of the traditional sector calls for programmes and measures of assistance different from those devised for the development of small-scale industry.

38. There are many traditional crafts which have become obsolete and wasteful through the emergence of modern technology, changes in social structure and rising income levels. In the least developed countries, it would be a wastage of scarce resources to attempt to preserve and develop them. The strategy in such cases, it was pointed out, should be to help the people dependent on such crafts to move on to alternative occupations as quickly as possible.

39. There are certain traditional industries which lend themselves to transformation into modern small-scale industrial undertakings in the same line of business. There are other fields where the artisan workshop can co-exist with the modern small-scale factory and even function in complementarity with it, i.e. through subcontracting. The participants felt that there is increasing scope

for artistic handicraft production, the demand for which seems to grow with the increase in affluence in many societies, the expansion of tourism and other factors. Such skills and crafts should be identified and assisted so that they develop further.

40. A development programme for these crafts and artisan undertakings should include modernization of techniques of production (through improved tools), expansion of markets, standardization of production, introduction of quality control, arrangements for the supply of raw materials of good quality at a reasonable price and practical training. The participants observed that the co-operative form of association would be ideally suited for this sector; this should be fostered through special assistance. Mini-industrial estates or clusters of workshop sheds for artisans, where there are large concentrations of such undertakings, will also contribute to their development.

41. Traditional industries, in most of the developing countries, are an important source of entrepreneurship. Their existence, therefore, may offer a basis for industrialization through gradual adaptation and modernization. They also account for an appreciable contribution to the gross national product. The assistance and extension services required by the traditional industries are quite different from those needed by modern small-scale industries. In view of this, the participants thought that there should preferably be a separate development organization for the promotion of traditional industries. At early stages, a single promotional organization may, in some countries, look after both traditional crafts and modern small-scale industries.

III. ORGANIZATION AND WORKING METHODS OF AN INDUSTRIAL
EXTENSION SERVICE CENTRE, RECRUITMENT AND TRAINING
OF EXTENSION OFFICERS

Functions of an Industrial Extension Service

42. The organization of an effective industrial extension service centre is of utmost importance to the development of small-scale industries. In some of the developing countries, the success of small industries can be traced to the extension services given them. Similarly, the reasons for slow progress of small industries in some countries can be traced to the lack or **insufficiency** of extension service facilities. While there may be some development even without an extension centre, the provision of adequate extension facilities is a pre-requisite for rapid and balanced development.

43. In order to be of effective help to the development of small industries, the extension service centres should be fully equipped with the necessary facilities and be prepared to offer every assistance required by the entrepreneurs. The achievement of economic, social and political objectives through a small industry development programme fully justifies the allocation of scarce resources for building up a permanent extension service machinery.

44. As already stated, the extension needs of traditional, handicraft and modern small-scale industries are different and there may be separate institutions to cater to the needs of each of these sectors. There should however be co-ordination amongst the different centres assisting each of these sectors.

45. The functions of an industrial extension service centre can broadly be divided into: (i) pre-investment study programme; (ii) assistance in the establishment of industrial units; and (iii) assistance in operating the units after setting them up. The centre should prepare, preferably in co-operation with the economic planning authorities of the country, and in consonance with the objectives, priorities and requirements of the over-all development plan, pre-investment studies which would enable the agency to identify those industries which offer the best prospects for small-scale undertakings in different areas. This will also enable them to determine the scope of extension service facilities and of industrial estates and common services, the needs for financing and other development aids. These studies will cover the following:

- (a) industry feasibility studies; (b) area surveys; (c) market surveys; and
- (d) model schemes or industry guide sheet for the guidance of entrepreneurs

wishing to enter the industry or expand their product lines. Many of these studies will be helpful to the prospective and existing entrepreneurs in reaching correct decisions about the establishment of new units or the expansion or improvement of existing ones. Such studies should be part of the planning action of an extension centre and should be carried out in advance of the establishment of industries.

46. The extension service centre should not limit itself to giving consultations only to persons approaching it. It should, as far as possible, seek out prospective entrepreneurs with a view to encouraging them towards industrial occupations and providing them with all necessary information and advice. Intensive development campaigns may be undertaken, groups of technicians may go from place to place with mobile demonstration vans, etc. This would be useful in countries where there is a dearth of entrepreneurs and where educated persons are reluctant to come to industry for lack of information as well as for lack of prestige.

47. Upon request from prospective or existing industrialists, the centre would undertake feasibility studies for specific projects and would evaluate projects already prepared by the entrepreneurs. It would assist prospective and existing entrepreneurs in formulating "bankable" projects for financing by credit institutions. It would also assist in elaborating projects for expansion and provide assistance in the selection and procurement of machinery and equipment. The latter would be a great help to entrepreneurs with little knowledge of technology.

48. The centre would assist entrepreneurs in all formalities relating to incorporation, licensing, acquisition of site or construction of building, import license, foreign exchange authorization, and other prerequisites for setting up, modernizing or expanding the industrial enterprises.

49. To an operational unit it would furnish continuing in-plant or in-enterprise advice and guidance on technical and management problems and provide or facilitate access to such technical and managerial training as is needed by the entrepreneurs.

50. Technical assistance covers advice and guidance on choice of materials, machinery and tools and their most efficient utilization in production. It includes advice on plant layout, installation, operation, maintenance and repair of machinery, techniques of production, testing, quality control pro-

cedures, packaging, storing, and on-the-job training of workers and supervisors.

51. Management assistance covers advice, guidance and training in all aspects of business. It also includes advice on sources of credit, loan regulations, taxes, bookkeeping, advertisement and publicity. It may also include promotion of subcontracting. The promotion of co-operative arrangements among small undertakings is also a relevant activity.

52. Training in technical fields would be provided to managers, supervisors and workers. As a rule, such training would be more in the nature of upgrading existing skills and would be more specialized than that given in business administrative courses, technical education and vocational training to students who have not yet entered into industrial employment.

53. Industrial research is an essential supporting activity. Technological adaptation or innovation in respect of processes, equipment and products is often of special benefit to small-scale industries. Some innovations in processes result in reductions in capital and materials; some changes in types of equipment make it possible to produce economically at relatively small capacity.

54. Common facility centres and access to financial institutions should also be a part of the activity of an extension centre.

55. The centre should furnish economic, technical and market information relating to small-scale industries.

56. The extension centre should be equipped to provide any or all assistance required by entrepreneurs, existing or prospective. Their needs should be properly assessed and assistance should be provided promptly and correctly. The centre should bear in mind that, as a development organisation, it should stimulate self-help and should not do for the entrepreneurs what they should learn to do themselves. Spoon-feeding does not produce self-reliant entrepreneurs.

Organisation of an Industrial Extension Service

57. An industrial extension service centre may be organized as a limited company with major share-holding by the Government and participation by financial institutions and private entrepreneurs, or purely as a Government

organization run and financed by a public authority, or as a self-financing business organization sponsored by financial institutions or by entrepreneurs. In the developing countries where its main purpose is the promotion of industry, it should be an autonomous organization within a Government framework and its expenditure should be met largely out of public funds. The executive functions should be assumed by executive directors who should be highly competent professionals with long practical experience. There may be a supervisory Board with members from financial institutions, representatives of industries and of Government offices directly concerned with development of small industries. The Board should be created through legislation and should be protected as far as possible from political pressures and evils of bureaucracy. It should have considerable autonomy within the Government framework. The service should be able to attract highly competent personnel, able to speak with authority on the relevant subjects, with qualifications in line with the services they are going to perform. It should be able to determine its salary scales and conditions of service.

58. The most difficult problem, it was observed, encountered in maintaining and expanding an extension service is that of finding competent personnel. People with the qualifications required are not readily available in developing countries. They should have a practical competence, be capable of impressing businessmen by demonstrating concretely the application of what they advise. Not less important than qualification and experience is their attitude towards their job and the people whom they advise. They should work with missionary zeal. Academically qualified engineers may be needed to make project studies, particularly for ventures of some size and technical complexity, but many of them may not be equipped to advise on practical technical production problems. Emphasis should be placed on the recruitment of good technicians with practical experience. The qualifications of extension officers should be adapted to the requirements of the entrepreneurs they are seeking to help.

59. When suitable candidates cannot be obtained, the vacancies should not be filled with incompetent personnel or people deputed from the Government who do not possess the required qualifications and experience. The post should be kept vacant until the right person is found. It is better not to advise than to ill advise industrialists.

60. The deficiency of the personnel can be made good by practical training. Such training can be provided within the country, if available, or from

countries where such facilities exist. Care should be taken to select for training such persons whose services would afterwards be utilized in the lines in which they have been trained. The training of Government and civil servants (generalists) in specialized lines should be avoided.

61. Experts from countries which have developed particular lines of industry may be utilized. These experts should be proven experts and should be capable of adapting to local needs and of training counterparts. Some of the participants referred to the uselessness of some so-called experts. They expressed the hope that UNIDO would play a positive role in selecting qualified experts and in providing their services to needy countries.

Working Methods of an Industrial Extension Service Centre

62. The initial scope of operation of an extension service centre should be determined on the basis of the availability of trained and capable personnel and of the prospects for the development of industry, sector-wise and area-wise. Initially the scope of operation should be rather modest. The service centre should be able to work intensively with those entrepreneurs that have potential for development. Personnel limitations and the need to test various methods of business promotion make it advisable to confine its operation to a manageable geographical area and to a limited number of business sectors.

63. Its operations should, however, be broad-based. Wherever possible, the centres should provide services not only in the main cities but also in places away from cities where there are potentials of industrial development. One of the important objectives of a small industry development programme - the industrialization of under-developed areas - remains unfulfilled in many countries where most of the small industries are located in the main urban centres. However, the servicing of provincial areas should be undertaken only when there are capable staff and the value of the services has been demonstrated in central areas. The expansion of the centre's activities for expansion's sake would hamper rather than serve the cause of development.

IV. ESTABLISHMENT OF NEW INDUSTRIES

Stimulation of Entrepreneurship

64. The promotion of business enterprises implies an ability to locate and identify entrepreneurial talent. In the least developed countries, the lack of entrepreneurs is a common complaint. The reasons are absence of industrial tradition, lack of knowledge of technique and management, shortage of financial resources. Low social prestige attached to industrial careers is also responsible in some countries for the lack of industrial entrepreneurs. It is not, however, correct to say that entrepreneurs do not exist in certain societies. Potential entrepreneurs do exist but they should be identified and steered towards industry.
65. As a first step for stimulation it is necessary to understand the essential characteristics of entrepreneurship. An entrepreneur should be prepared to take calculated risks, have the capacity to take prompt and correct decisions. He should know how to combine various factors of production and should have supervisory ability. He should demonstrate some capacity for innovation and be eager to search for means of doing things in a new and better way. He should also have a high sense of achievement, i.e. to derive a strong satisfaction from overcoming challenge and obstacles in his path.
66. It was agreed that it is easy to make an entrepreneur of a man who has the basic quality of an entrepreneur but it is difficult to make anybody an entrepreneur. There may be many applicants for setting up industries, but only a few of them may be real entrepreneurs. A study of failure cases would prove that most of the applicants for these units did not have the required qualities.
67. While entrepreneurial talent can be found among people of almost any background, surveys and experience in some countries suggest that those with certain backgrounds are more likely to be successful than others. Established businessmen, artisans, craftsmen have some record of experience from which the possession of or lack of entrepreneurial skill can be inferred, at least in broad terms. An entrepreneur who comes from a business family has the advantage that he has been reared in an atmosphere which emphasises initiative and achievement.

68. In the opinion of many, government service is not ordinarily conducive to entrepreneurship. But employees in industries, particularly where they are associated with management or are technicians, etc., can be good entrepreneurs. This is also the case of former military personnel.

69. Educational background by itself is not a substitute for entrepreneurial ability. But an enterprising educated man can be a better entrepreneur.

70. The source of financing and the businessman's concept of his own problems also throw light on his entrepreneurial ability.

71. In view of the general backwardness in education and the lack of opportunities for technical and other training in the least developed countries, it is difficult to identify any particular class of people as having potential for industrial entrepreneurship. In fact no group of people can be said to have any irredeemable disabilities for industrial entrepreneurship. The special advantage of small industries is that they can be started by people with little or limited background and experience in production and management but who have some money, leadership and risk-taking ability. The promotional agencies should on their own initiative try to seek out potential entrepreneurs from all groups and classes of the population. But there may, however, be certain classes or sections of the population, such as the Sikhs and Marwaris in India, who are more enterprising than others.

72. In order to attract people with entrepreneurial ability, the Government development authority should take the initiative and should, instead of asking people to come to it, go to the people, explain to them the alternative avenues and profitability of industries. They should forgo bureaucratic attitudes and convince people that they are helping friends. Radio programmes may be profitably used. Extension officers should try to create a social infrastructure and to build social prestige for industrial pursuits. The educational system may be reoriented with a practical industrial direction. National awards may be introduced for good entrepreneurs area-wise or sector-wise. The development authority should take all steps to minimize risks in small industry. The credibility of extension service centres will also work as a motivating force.

73. Stimulation without practical support would be the worst disservice to entrepreneurship. The development authority should provide all extension

facilities to entrepreneurs. These facilities should be decentralized and should be made available to the entrepreneurs in or near their premises. The facilities should be available in a package form, i.e. whatever is the need of the entrepreneur, assistance should be made available to him. The extension service should itself be able to attract and catch the imagination of entrepreneurs. Much will depend upon the success of extension centres. The extension centres should be provided with the right personnel with proper qualifications and attitudes for the cause of development.

Surveys, Feasibility and Marketing Studies and Assistance to Small Entrepreneurs at the Pre-investment Stage

74. Surveys and pre-investment studies have two broad objectives: firstly, they are aimed at providing a development agency with the basic data needed for drawing up and implementing a programme of development of small-scale industries; secondly, they should guide entrepreneurs in taking appropriate decisions on product lines, location, size of enterprise, manufacturing operations, financing methods and marketing techniques. Three types of surveys and studies are required to meet the needs of entrepreneurs as well as of the developing agency: (a) industry feasibility studies or industry surveys; (b) area surveys; and (c) market surveys.

75. An industry feasibility study collects data and presents them systematically with a view to evaluating the prospect of establishing or expanding a particular industry. The study attempts to evaluate and measure all the relevant factors: import, export, domestic demand, competition, raw materials, availability of capital, labour skills, production process, etc.

76. An area survey is the study of the industrial potential of a given area which may be the whole of the country, a region, a district or a town. This survey is a systematic investigation and analysis of the resources and markets of the area; it analyses its competitive advantages or disadvantages for each potential industry. An area survey would involve: (a) an analysis of existing or potential demand for industrial goods in the area; (b) an assessment of resources, human and material, available in the area and prospects of procurement from outside; (c) an appraisal of existing and prospective infrastructure development of the area and the extent to which it could support industrial development; and (d) recommendations on those industries which are feasible.

77. Market surveys provide information on the outlets for given products which are open to existing and potential entrepreneurs. The survey covers size and location of markets and distribution centres and marketing channels. Market surveys also provide information on the potential size of the market, the long-run effect of substitute products and the elasticity of demand, customer choice, etc.

78. When the area survey or an industrial feasibility study reveals favourable prospects for an industry or a given product, it is useful to prepare industry guide sheets for the guidance of entrepreneurs wishing to enter the industry or expand their product lines. The guide sheet should provide comprehensive data and a correct picture of the prospects of an industry.

79. While an over-all survey for fact-finding and programme formulation will be required before the inception of a development programme or in its initial stage, at a later stage it can be updated on the basis of available adjusted data. The organization of pre-investment studies on a continuous basis is vital for the success of any promotion programme.

80. In most developing countries, such studies should be organized under Government auspices, preferably through the development agency. In countries having well-organized chambers of commerce and industry, university departments of applied economics, industry consulting firms, some types of studies could be undertaken by these institutions under grants provided by the Government. The United Nations agencies, the participants observed, should, upon requests by Governments, train personnel for survey work and feasibility studies since, in most of the developing countries, there is a dearth of personnel qualified in this field.

81. The absence of comprehensive and accurate data should not be an excuse for deferring the preparation of feasibility studies. In many developing countries, the collection of accurate data will be difficult. Efforts should, therefore, be made to prepare feasibility reports on the basis of available data, making estimates and projections for non-available data.

Establishment of Small-scale Industries Initially Owned by the Government, Demonstration Plants (Turn-key Factories) and Joint Ventures

82. In developing countries where private entrepreneurs are not forthcoming

in certain projects, the Government may itself establish industries and run them for some time to demonstrate their profitability and then hand them over to private parties. This is a good idea but in practice, particularly in the least developed countries, it is confronted by certain difficulties.

83. Such a venture will be feasible only if it operates at a profit. In developing countries with a socialist programme, it may be difficult to transfer a profitable project from the public sector to the private sector.

84. In most cases, such units established by the Government do not run at a profit. Experience in some of the developing countries shows that the total project cost in the public sector is usually more than what it would have been in the private sector. The public sector projects are characterized by heavy overhead costs and bureaucratic attitudes of the management. As a result, the unit, in most cases, is a losing concern. When the Government wants to disinvest, the private parties do not want to take over the business even at cost price for the following reasons: (a) investment costs in most cases are more than market prices; (b) heavy overheads; (c) officers and workers under Government management develop certain characteristics which are not encouraged in the private sector; and (d) difficulties in doing away with existing personnel and workers of the project.

85. Where, under existing facilities and extension services, the entrepreneurs do not come forward for certain projects, the Government should be prepared to offer a cash subsidy to the entrepreneurs for establishing such projects. The extent of subsidy may be determined by taking into account the overhead cost and the cost of inefficiency in the public sector. In extreme cases, however, where no private parties are forthcoming the Government may, as a last resort, take up "turn-key projects". These should be organized in a business-like manner by deputing or employing honest, hard-working and efficient officers able to make them a success. Failure of a Government-sponsored project may discourage the private sector.

86. The Government may, in collaboration with private parties, establish joint venture projects. Such projects may be taken up in active collaboration with entrepreneurs where the entrepreneur alone would not be willing to assume the risk. The Government should try, if necessary by liberal assistance and subsidy, to have the units set up by private parties. Only in the case where

private parties do not come forward, the Government itself may arrange foreign collaboration to establish joint ventures. Joint ventures may be successful units if joint efforts are made in the right direction and the entrepreneur is allowed to work with full freedom, the Government assisting him where he has deficiencies and assuring him of its protection.

V. ASSISTANCE TO EXISTING INDUSTRIAL ENTERPRISES

Assistance in Management

87. Once an industry is established, much of its success depends on how efficiently it is managed. Management is the multiplying factor in the operational process of an industry. Productivity or profitability is equal to the result of management efficiency in the organization and use of factors of production. If management is weak, the factors of production alone cannot lead to success. Management is not an additional factor of production but is a co-ordinating element for the efficient use of factors of production and its efficiency has multiplying effects on factors of production.
88. Smallness in the scale of operation does not in any way mean that a small-scale industry has an inferior organization in respect of management. Management in small industries is specially important in view of the fact that small industries cannot afford to appoint specialists for each branch and depend much on the managerial ability of a single man. Unlike large industries, most of the small industries concentrate ownership and management in the same hand. The entrepreneurs in small industries lack managerial skill and need special assistance in this area.
89. Management assistance covers advice, guidance and training in all aspects of conduct of a business, including the raising of resources, organizational structure, production planning and control, inventory control, maintenance of accounts and cost control, personnel policies and industrial relations, marketing technique and management training. It also includes advice on sources of credit, loan regulations, taxes, promotion of subcontracting, etc.
90. The small entrepreneur-manager should be helped to take a global view of the management of his enterprise. In a small industry the profit motive is great but the accountability is deficient. The entrepreneur wants to get the maximum out of everything - plant, machinery, labour, etc. While he wants more from these, he cares little for them. He should be made conscious of the importance of proper maintenance of plant and machinery and of having a satisfied working force.
91. In addition to providing management assistance to entrepreneurs, the extension service centre should conduct management courses for entrepreneurs.

managers of small industries. Courses of short duration in which attention would be devoted to solving practical problems, especially those with which the participants are confronted, should be organized. The interest of a small industrialist should be kept alive through periodic plant visits by extension officers to help the entrepreneur solve problems himself and through periodic evening meetings of groups spread over a long period.

92. Some developing countries which have made progress in the development of small-scale industry may set up a separate institute for management training. They may use there the services of specialists in different fields. They may conduct courses of short and long duration.

93. On the question whether fees should be charged or services provided free, most of the participants favoured **charging** of fees (though at subsidized rates) for the simple reason that payment of fees evokes special interest in businessmen and induces them to take the courses seriously.

Assistance in Marketing

94. Marketing advice is required by an entrepreneur at the pre-investment stage in determining product lines and demand and, during operation, for the successful sale of his product. Market is often a limiting factor, particularly for small industries. A small industrialist cannot afford to have marketing specialists and venture into expensive sales promotion programmes.

95. The participants felt that assistance in the field of marketing was extremely important for small industries, especially in developing countries where there was a strong consumer preference for imported products and at times even unwarranted consumer prejudice against the indigenous product. The small entrepreneur himself has little time and money to devote to the specialized function of marketing and sales promotion. The disadvantage of small size in marketing should be overcome mainly through marketing services by Government development agencies and by eliciting the co-operation of wholesalers and businessmen.

96. Government policies can help small industries in marketing their products. The Government may take protective measures in favour of indigenous manufactures by way of tariffs, differential excise duties and restricted markets. The participants observed that although these measures greatly help the small entrepreneurs some of them may be taken at the cost of consumers

and, in the absence of competition or limited competition, the producers take little care to improve the quality of their products. It was agreed, however, that such restrictive measures, if taken at all, should be temporary and should not be an obstacle to the long-run competitiveness of small industry products in internal and international markets.

97. The Government being a major purchaser of consumer goods can formulate policies for the procurement of goods by public purchasing agencies from small-scale industrialists. The Government may draw up lists of articles to be procured from small industrialists only, or procured from the open market but, if the supply is made by small manufacturers, they will get a price preference. The institutes and agencies should provide certificates of competence and information on tenders and tendering procedures.

98. The developing agency may also participate in the direct marketing of small industries products by opening small industries emporiums. However, the scope of such marketing is usually limited to a few products and experience in some of the developing countries indicates that the emporium does not help much in sales promotion, mainly because of non-business-like attitudes of its officials.

99. Some participants pointed out that there were good opportunities for small-scale industries in the export market for certain types of products. Aggressive marketing and sales promotion efforts are required in export markets through joint efforts of Government trade representatives and export groups. The Government may also set up an export corporation for the export of small industry products.

100. In countries which have developed some large industries, small industries may serve as subcontractors. In the relatively advanced countries, subcontracting exchanges may be set up.

101. The Government may also assist the growth of co-operatives for the marketing of products. Manufacturers of different products may be associated in co-operatives for marketing their respective products. They should be actively assisted by the extension centre. Joint action might include advertising, product improvement, etc.

102. The Government should utilize its propaganda machinery, radio, etc., for popularising local products. Regular radio programmes may be sponsored for popularising local products and also for disseminating market information. The

Government may also encourage exhibitions and fairs for popularizing and encouraging small industry products.

103. The extension service should carry out regular market surveys and market research. The results of such surveys and research should be intimated to small entrepreneurs. They should be guided in developing products meeting customers' demand. Entrepreneurs should be helped in selecting appropriate advertisement and publicity methods.

104. The Government or the extension service should not interfere in the marketing operation of entrepreneurs. They should only assist indirectly either by advising or by providing marketing facilities. In remote places where there are difficulties in movement of goods, the Government may provide marketing subsidies to small industries.

105. It was observed that, in developing countries, the demand of consumers tends to become more and more sophisticated as the level of industrial development and the standard of living rise. If the producer, particularly the small producer, is to secure, retain and increase his share of the market, it is essential that he should cater to the current trend of demand in his particular line and should manufacture his goods at a reasonable price, that is, the price which the consumer is willing to pay. Small industrialists are unable to solve this problem by their own unaided efforts.

106. The consensus was that small-scale industries were in real need of guidance in improving the design and quality of their products. As a part of the extension service, the Government should provide design centres for improving existing designs or creating new ones. It is also essential, as a measure to improve quality, to introduce quality control in small manufacturing undertakings. The extension centres should advise on specifications which should be in accordance with the needs and should assist the entrepreneur in meeting these standards. The extension centres should be equipped with testing equipment to control quality.

Assistance in Technology

107. Assistance in technology includes the provision of technical advice on the selection of appropriate machinery and plant layout at the time of investment, proper use of plant and machinery, equipment and materials during operation, maintenance of plant and machinery, and training of technical personnel.

108. Some participants pointed out that one of the major causes of failure in small industries was the wrong selection of machinery and plant layout. Correct advice on selection of plant and machinery and on layout will be of great help to the development of small industries and will contribute to reducing the mortality rate in these industries.

109. The appropriate technology for small industries would depend on the stage of industrial development and technical know-how in the respective countries. Whether it should be labour-intensive or capital-intensive was a debatable point. The consensus was to employ such machineries as are simple in operation, relatively cheaper and which produce standard output at a reasonable price. Employment of labour-intensive machinery at the cost of efficiency and economy is not justified since it may hamper further growth and therefore limit further employment. The lack of capital resources and technology in a developing country does not favour employment of capital-intensive and sophisticated machinery. The best course would, therefore, be to achieve a balance between the two and to employ such modern plant and machinery which would turn out quality products at reasonable prices.

110. The lack of information on suitable technology is a factor limiting the selection of appropriate technology. It was pointed out that some of the developed countries prepare industrial profiles on different industries. However, there is a need for more information on the subject. This would be of great help to many of the developing countries. It was suggested that the employment of engineering university senior students under the guidance of expert teachers for the preparation of model schemes be considered.

111. It was also pointed out that many of the technologies of developed countries are not suitable in least developed countries for climatic and other reasons. It was therefore suggested that all efforts be made to develop indigenous technology to suit the requirements. The modernization of existing plant and machinery and the adaptation of imported technology to local needs would not be sufficient. In certain countries, the success in small industry development can be attributed to the adaptation of imported technology to local needs through research.

112. Where the demand for a particular type or class of plant, machinery and equipment is reasonably high, it would be worthwhile to try to produce such plant and machinery within the country, if necessary in collaboration with

technological institutes of some advanced countries. If the demand of a particular country does not justify the establishment of such a factory, this might be done on a regional co-operation basis. There is enough scope, in different sectors of small industries which require small machineries, to produce capital goods within the country and this should definitely be attempted.

113. To suit local requirements, it is essential to develop highly-trained local technicians. It is not advisable to look upon foreign experts for the solution of all the technical problems of a least developed country. For obvious reasons, many of the technicians of modern countries are, in many cases, unable to adapt themselves to the needs of developing countries. Instead of recruiting foreign technicians and experts, local technicians and engineers should be sent to developed countries for higher practical training. And these people, on their return, should be suitably employed.

114. Technical assistance or counselling during operation includes visits and consultations, in-plant studies, on-the-job or class-room training and demonstration, issue of brochures and bulletins, etc. In respect of industry, as distinct from an enterprise, the most likely methods of successful assistance are seminars and training courses. In respect of individual undertakings, the most effective methods are visits, in-plant studies and demonstrations.

115. A considerable portion of technical assistance efforts should be directed towards increasing productivity and improving product quality through better use of existing facilities. Technical assistance should be mainly directed towards the operation and maintenance of equipment. Defects in operation may be due to the speed at which the machines are run, the use of incorrectly shaped or adjusted cutting tools, inadequate provision of measuring instruments and hand tools and poorly maintained plant and machinery. All these factors can adversely influence quantity and quality of products. These defects have to be brought to the notice of the entrepreneur and remedial measures be suggested.

116. Maintenance in the context of small-scale industries usually means effecting repairs after a piece of equipment has broken down. The notion of preventive maintenance is confined to the modern and higher echelon of this sector, even if it is practised there in limited scale. A system of planned preventive maintenance should be effectively applied. Once an entrepreneur

is convinced of the soundness of advice he should welcome such assistance. Confidence can be created by practical demonstration of improvements in processes and techniques.

117. As regards the role of training in technical counselling, the general view was that an extension service should not be concerned with basic vocational education. Specialized short-term training to upgrade the skills of the operatives, particularly in connexion with the introduction of new processes and new machinery, should be carried out by the extension service.

VI. THE ROLE OF INDUSTRIAL ESTATES AND COMMON SERVICE FACILITIES

118. The industrial estate is one of the most effective means of stimulating entrepreneurship and a very effective instrument of promotion. An industrial estate should not be confused with an industrial area or an industrial zone. An industrial zone is earmarked for the development of industries, big or small, but no infrastructure is provided by the development authority. In an industrial area, developed plots of land with basic infrastructure facilities such as road, water, power, etc., are provided to facilitate the setting up of industries, but no standard factories are provided.

119. In an industrial estate, not only is the basic infrastructure - roads, water and power - provided, but also standard factories for rent or hire-purchase. An industrial estate often has an industrial extension service centre and common service facilities.

120. The availability of standard factories for rent or hire-purchase is, for people with small means, a major inducement to engage in industrial operations. The existence of an industrial extension service centre is another inducement to entrepreneurship since, without such assistance, people with little or no technical and managerial knowledge would hesitate to take up an industrial occupation. Common service facilities such as a tool room, a maintenance and repair shop, a testing and quality control laboratory and others, the type of which may vary with the composition of industries on the estate, contribute to improving productivity and product quality and to reducing cost. The grouping of small industries on a common site makes it economical to set up other facilities such as an information centre. Financing of small-scale industries is also facilitated on an industrial estate. The industrial estate is, therefore, an effective instrument for integrating the various measures of support to small-scale industries and is of great help to entrepreneurs in reducing risk and is therefore a great inducement for people to take up small industries.

121. An industrial estate may also facilitate the development of inter-trading and inter-servicing relationships among occupants and in certain cases between them and large industries. Industrialization on an estate will create an industrial atmosphere and will stimulate development outside of it through the

establishment of new trade and service undertakings.

122. Clustering makes it possible to achieve some economies of scale and efficiency of specialization. Maximum advantage will accrue from such clustering in the case of specialized industrial estates.

123. Industrial estates are an effective means of decentralizing industries and promoting regional development. By providing industrial estates in different areas of the country, the Government may induce industrialists to establish industries away from the main urban centres.

124. Since industrial estates are promotional instruments, the initiative for setting them up should be taken up by the Government or by the development agency. Surveys and feasibility studies should be undertaken to analyse the economic, engineering and physical factors involved in locating and planning an industrial estate. The feasibility studies should also survey the availability of supporting facilities and the prospects of industrial development at alternative locations and, in the light of this review, recommend the location, site, type and size of the estate including requirements for standard factories and common service facilities.

125. The development and construction of industrial estates should be carried out in phased programmes. To make the industrial estate programme a success, the first estate must be a success. The first estate will be generally expected to exert a demonstration effect. As a rule the best conditions of success will be found in the vicinity of cities and larger towns where external economies facilitate entrepreneurial initiatives, the mobilisation of financial resources and of skilled labour. As the industrial estate programme develops, projects may be undertaken in smaller towns. Since an industrial estate is not developed against demand from entrepreneurs, but is an inducement to entrepreneurship, it may be established at a remote place where socio-economic conditions justify it. This, however, should not be done at the start of a programme. The start should be made in and around the main cities. Flatted factories may also be developed in some cities if the circumstances so demand.

126. Each estate should be developed in phases. Since with the development of an industrial estate the value of land in the vicinity of the estate will rise and since with the passage of time there will be need for expansion of the estate, it will be worthwhile to acquire sufficient land for the industrial estate and to develop it in successive phases.

127. Leasing factory accommodation on a rental basis or on hire-purchase is one of the strongest inducements to entrepreneurship and occupancy, since tenants with limited financial resources need not invest in land and building and may use their funds for equipment and working capital. Rent should normally be subsidized (where necessary) at initial stages. The subsidy should be on decreasing scale and economic rent should be charged at a later stage.

128. Managerial control by/sponsoring authority should extend only to the administration of the estate and not to the operation of individual enterprises. The types of service and facilities on an estate may vary considerably from one estate to another but there will be certain facilities common to every estate.

129. The scope of establishing common service facilities such as tool room, testing and quality control laboratory, heat treatment, electroplating and finishing workshop, die-casting units, foundry, maintenance and repair workshops, etc., will depend upon the size of the estate and the type of industries. The main reason for setting up a common service facility is that certain types of machinery and equipment cannot be economically operated by individual small entrepreneurs because of limitations of finance, capacity and skill. As a general rule, common facilities of an industrial estate should not compete with similar activities located within the estate or in the surrounding area.

130. The promotional services which the beneficiaries would have to secure themselves had there been no common facility centre should be charged on a no-profit no-loss basis.

VII. FINANCING OF SMALL-SCALE INDUSTRY

131. Finance plays a very vital role in the development of small industries since the entrepreneurs are mostly men of small means. The main obstacles to the financing of small-scale industries are: (a) general shortage of financial resources for credit; (b) lack of suitable financial institutions; and (c) the difficulty in channelling to small entrepreneurs whatever funds are available. The last one is perhaps the worst problem in many of the developing countries.

132. In order to make financial assistance effective, it is imperative that financial assistance be integrated with technical and other assistance provided by the Government. It was the considered view of the participants that isolated attempts for the development of small industries cannot achieve the desired results. It was agreed that financing may not be effective in the absence of technical and management counselling and technical advice may often fail if financial help is not available. In countries where there are no effective links between extension agencies and financing agencies it is imperative to build up closer integration.

133. One of the prerequisites for financing is the identification of the applicant. The applicant should be proprietor or partner in a firm. He must be an entrepreneur, that is, an enterprising man seeking assistance to achieve an economic objective. He should maintain accounting records as a precondition for getting his loan.

134. Once the legal and entrepreneurial identity of the applicant is established, a "bankable" project should be prepared for the financial institution. The financial institution would be more willing to finance a small enterprise if the personality of the entrepreneur and the viability and bankability of the projects are certified by an extension agency and the follow-up assistance is assured.

135. It was agreed that collateral and security requirements should be relaxed for small industries. More emphasis should be given to the technical assessment of the prospects of the project as well as to the evaluation of the entrepreneur's capabilities. In other words, the financial institution should be more production oriented than security oriented.

136. Loans, as far as practicable, should be given in kind instead of cash. A simplified hire-purchase system may be introduced for the supply of machinery and equipment. Machinery supplied to small entrepreneurs on the instalment credit usually obviates the need for other security.

137. Another remedy is to evolve a system of credit guarantee or insurance which would stimulate financing by commercial banks. Arrangements for counter-financing by a State Bank may also work as an inducement to banks for liberalizing financing.

138. The system of temporary equity participation in small-scale enterprises by development institutions or banks can also be a valuable source of financing in the least developed countries.

139. As regards the form of the financial institutions it would be better to have a separate financial institution for the development of small industries where separate extension service facilities are in existence. In such cases, appropriate arrangements should be made with banks for financing small industries, screening applications, providing technical and managerial assistance, and carrying out post-loan supervision.

140. The procedure for screening and sanctioning of loans should be reasonably simple and should not be time-consuming. Simple forms should be used for assessing the entrepreneur's needs and the questionnaires and forms should be filled up with the assistance of the inspecting staff. There should be time limits for the final disposal of applications. The applicant should be interviewed by the sanctioning authority. This would give the sanctioning authority an opportunity to know the entrepreneur and the entrepreneur would have an opportunity to talk to the appropriate authority and make them aware of his problems. This would deter the inspecting staff from harrasing the applicant.

141. The sanctioning authority should be decentralized and for small loans the procedure should be made even more simple.

142. The follow-up of loans should be the function of the extension centre. The centre should supervise the utilization of the loan and follow up for timely repayment and payment of interest.

143. There was a consensus that small industries are more in need of liberal credit than of a liberal rate of interest. As an incentive for timely repayment, a reduced rate of interest may be charged if repayment is made on due dates.

VIII. THE ROLE OF THE GOVERNMENT, OF BUSINESS ASSOCIATIONS
AND OF INTERNATIONAL ORGANIZATIONS IN THE PROMOTION
OF SMALL-SCALE INDUSTRIES

144. Since small-scale industries are in need of help in all aspects of their planning, establishment and operation, the various measures of promotion and assistance - financial, technical and managerial - should be part of an integrated development programme. Guidance, advice and support are needed at every step in each operation over a relatively long period of time. Such integrated and sustained assistance can be provided only by the Government through appropriate institutions and where necessary with the help of foreign experts. The main purpose of these measures is to support small industrialists through the initial stages and to rear them towards effective, self-reliant management, high-quality, low-cost production and self-sustained growth.

145. While the Government has to draw up general development policies and programmes and to provide through public institutions many and sometimes most of the measures of promotion and assistance, there is usually scope for some co-operation on the part of business associations. The Government should facilitate and co-ordinate their action.

146. It was pointed out that, in the developing countries, business associations are not well-developed and have limited expertise and are not in a position to solve most of their problems. They are usually a bargaining agent with the Government rather than a self-reliant organization. However, even if they are only a bargaining agent for small industries, they provide a forum for dialogue with the Government on small industries and the development agencies can get a real picture of their problems when they consult them.

147. Associations of businessmen can make businessmen conscious of their problems and inspire them to undertake collective self-help through the association. The Government should try to educate them and infuse in them the benefits of self-help and increase their potential for it.

148. It was also pointed out that in the course of time these associations should engage in some of the promotional functions, preferably in collective procurement and distribution, marketing problems, quality control, etc.

149. The action by associations would in no case be a substitute for a Govern-

ment development programme; it would rather be complementary to it.

150. Many developing countries have of late realized the importance of small industries in their industrial development and have been requesting technical co-operation for its development. UNIDO has responded to the calls of many of these countries. UNIDO experts are mainly concerned with: (a) advice to Government policies, programmes and incentives for the promotion of indigenous small-scale industries; (b) assistance in the creation of institutions to promote and assist small-scale industries; (c) identification of possibilities for local small-scale industries and preparation of pre-investment reports and feasibility studies for such projects; (d) assistance to existing small-scale and medium-sized industries including the transformation of artisans into small industrialists; and (e) feasibility studies on the establishment of industrial estates and assistance in their planning, establishment and operation.

151. In many cases, UNIDO and other experts were confronted by difficulties because recipient countries do not always extend the necessary support to the experts in the discharge of their duties. The reasons are very much local in nature and are characteristic of developing countries. There are also problems of adaptation on the part of the experts.

152. The problems of adaptation would be less acute if more experts were recruited from the developing countries. The participants took note in this connexion of the programme of co-operation among developing countries through exchange of officials and technicians, study tours, participation in training programmes, etc. They felt that since conditions are more or less similar in these countries, the experience gained from success or failure in some of these countries would provide valuable guidance for others.

Annex

LIST OF PARTICIPANTS

TRAINING WORKSHOP ON SMALL-SCALE INDUSTRY IN THE LEAST
DEVELOPED COUNTRIES OF ASIA, THE FAR EAST AND THE MIDDLE EAST

KATHMANDU, NEPAL, 1-12 APRIL 1974

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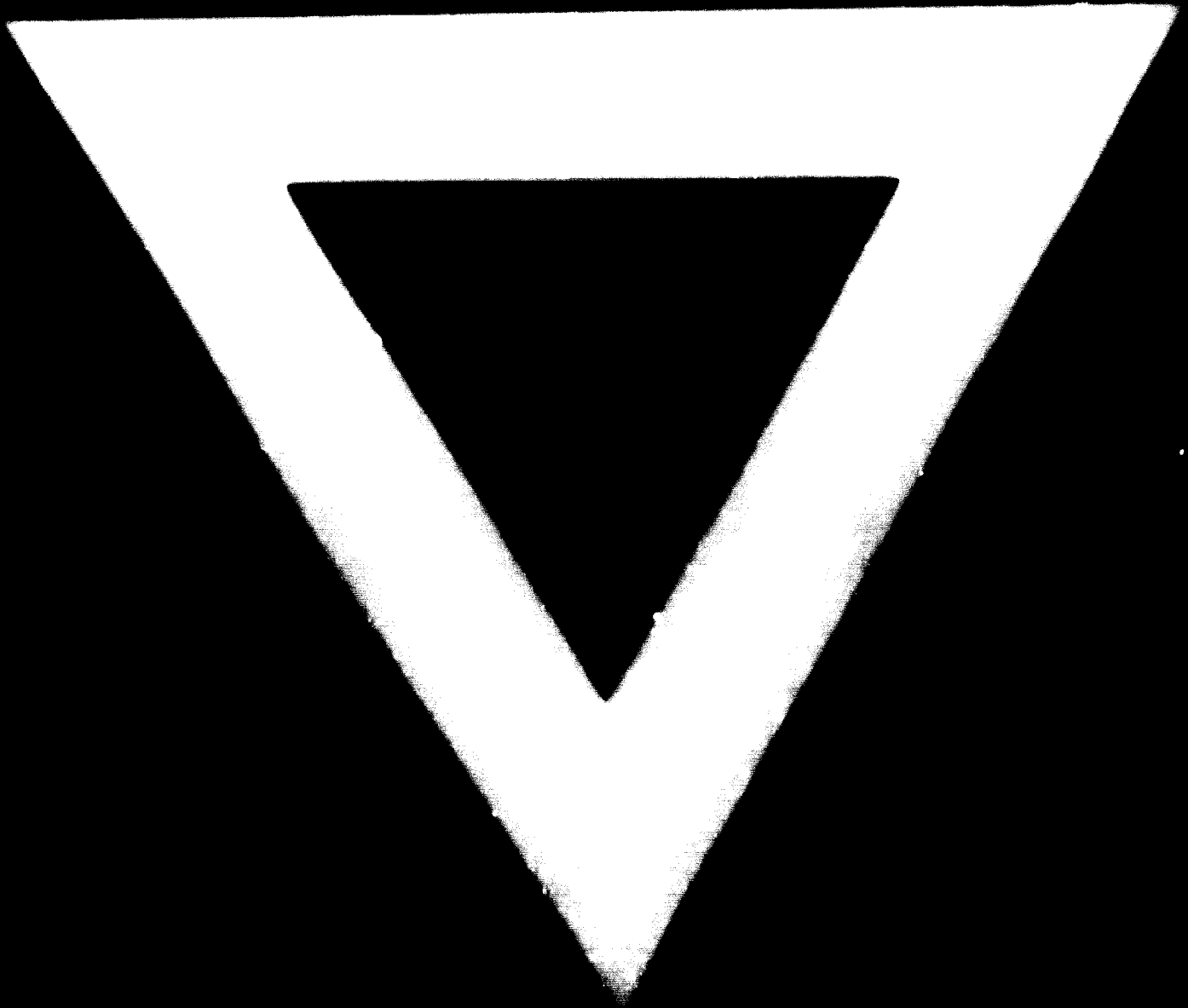
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