



OCCASION

This publication has been made available to the public on the occasion of the 50th anniversary of the United Nations Industrial Development Organisation.



DISCLAIMER

This document has been produced without formal United Nations editing. The designations employed and the presentation of the material in this document do not imply the expression of any opinion whatsoever on the part of the Secretariat of the United Nations Industrial Development Organization (UNIDO) concerning the legal status of any country, territory, city or area or of its authorities, or concerning the delimitation of its frontiers or boundaries, or its economic system or degree of development. Designations such as "developed", "industrialized" and "developing" are intended for statistical convenience and do not necessarily express a judgment about the stage reached by a particular country or area in the development process. Mention of firm names or commercial products does not constitute an endorsement by UNIDO.

FAIR USE POLICY

Any part of this publication may be quoted and referenced for educational and research purposes without additional permission from UNIDO. However, those who make use of quoting and referencing this publication are requested to follow the Fair Use Policy of giving due credit to UNIDO.

CONTACT

Please contact <u>publications@unido.org</u> for further information concerning UNIDO publications.

For more information about UNIDO, please visit us at www.unido.org

18800

Distr.
RESTRICTED

IO/R.183 9 January 1991

UNITED NATIONS
INDUSTRIAL DEVELOPMENT ORGANIZATION

ORIGINAL: ENGLISH

· j:

EXPERT ADVICE TO THE MINISTRY OF INDUSTRY AND HANDICRAFTS ON THE SELECTION OF PRIVATE SECTOR INDUSTRIAL ENTERPRISES TO BENEFIT FROM UNIDO DIRECT ASSISTANCE IN INDUSTRIAL REHABILITATION

US/SEN/88/269/11-52

SENEGAL

Technical report: Overview of UNIDO's approach to industrial restructuring and rehabilitation in Africa*

Prepared for the Government of Senegal by the United Nations Industrial Development Organization

Based on the work of Paul Wiedsmann. International expert in the economic aspects of industrial restructuring

5/78

^{*} This document has not been edited.

"Overview of UNIDO's Approach to Industrial Restructuring and Rehabilitation in Africa"

- * The Integrated and Multi-disciplinary Approach
- * The Characteristics
- * Traditional Technical Assistance
- * The Stages
- * Summary of the Approach
- * Preconditions
- * Technical Co-operation Planned
- * Accompanying and Support Measures
- * Problems Encountered
- * Conclusions

The purpose of this note is to highlight key aspects of UNIDO's experience in implementing technical co-operation projects in industrial restructuring and rehabilitation in Africa. The presentation will focus on outlining what this experience has suggested to be the key characteristics of an effective programme of assistance and co-operation. In this programme, all parts of UNIDO have worked together on the design, development, implementation and follow-up of the most effective programme of industrial restructuring and rehabilitation possible.

The Integrated and Multi-disciplinary Approach

UNIDO's search for a new and comprehensive approach to industrial restructuring and rehabilitation began in earnest with the deliberations of the Open-ended Working Group of the Industrial Development Board (IDB) on New Approaches and New Concepts for UNIDO and the follow-up discussions at the first session of the Special Advisory Group (SAG) to the Director-General of UNIDO. It continued through the ensuing sessions of the IDB, the second session of the SAG, and the work of the Working Group on Industrial Rehabilitation. The development of the technical co-operation component of the programme has been the responsibility of the operations department of UNIDO, where extensive co-operation has taken place among the various divisions and branches. The policy-related aspects of the work have been the responsibility of those concerned with country and regional studies, though the work of the

operations department's planning and programming branch is clearly also of potential relevance here. Investment follow-up activities would logically fall in the domain of the division concerned with industrial investment. The important training activities have generally been carried out by the substantive branches themselves, though the branch concerned with industrial human resource development could play an increasing role here.

The Characteristics

The characteristics of the approach would include the following:

- * OBJECTIVE: Increase Enterprise Profitability
- * FOCUS: Enterprise
- * <u>MEANS:</u> Direct, Active Assistance at the Plant Level
- * APPROACH: Integrated and Multi-dimensional
- * INTEGRAL COMPONENT: Training
- * <u>CONTEXT:</u> National Macro-economic Development Strategy
 National Industrial Policy
- * FACILITATING REQUIREMENTS:

Risk-taking Entrepreneurs
Local and Foreign Finance

- * <u>MECHANISMS</u>: Sub-regional and international

 Co-operation (where appropriate)
- * LONG-TERM GOALS Strengthening Local, National
 Capacity to create an environment
 which allows industrial enterprises
 to operate according to the dictates
 of efficiency and profitability.

Traditional Technical Assistance

All of these are observations concerning UNIDO's new approach to restructuring and rehabilitation and must be seen for what they are: a new approach that is still in its pilot stages.

Rehabilitation in its narrow sense of assisting an enterprise to address one or another specific problem in relative isolation from an analysis of the complete, complex framework within which that problem arose has been a major activity of UNIDO's for a long time. Indeed, it has been very roughly estimated that it even currently represents over half of all our technical cooperation activities.

The range of such technical co-operation activities where UNIDO currently provides assistance in this sense covers the whole gamut of problems and challenges that enterprises face from repair and maintenance through replacement parts to quality control; from stendardization to control and measuring equipment; from management information systems through marketing to pre-investment analyses; from country and regional through industrial and subsectoral analyses. Whole sub-sectoral programmes exist and are implemented by UNIDO specialist backstopping officers in each of these areas; within the food processing sector for example, a whole programme is under preparation. in sugar that contains many of these elements.

Some of the ways this new approach differs from this traditional technical assistance, in which each problem was treated as a separate entity. is that:

- * It is based on the understanding that what is needed is an integrated and multi-disciplinary approach to the whole problem;
- * Before beginning to create any new capacity, it examines carefully the financial viability of rehabilitating existing plants;
- * The enterprise is viewed in the totality of its national economic and sectoral environment, incorporating policy analyses as integral components of the whole;

- * Training at all levels both at the level of enterprise managers and on-the-job-training is seen as an inseparable part of UNIDO's assistance and co-operation; and
- * Elements such as energy audits and environmental impact assessments on the one hand, and engineering support functions in areas such as product design on the other are introduced as part and parcel of the total analysis and co-operation.

The Stages

This approach has already served as the basis for the implementation of several on-going projects and the development of other pipeline projects, and the following outline is based on the experience of these projects.

These projects suggest that the UNIDO approach to industrial restructuring and rehabilitation should contain at least five stages. The first of these is the pre-diagnostic stage in which a survey is made of the country, sector and/or sub-sector to identify the potential candidate industrial enterprises and choose the enterprises to be rehabilitated. This stage can be an integral part of the project document (as in the case of the on-going project in Senegal or the pipeline project for Tunisia), can be the result of earlier UNIDO (purely technical) assistance as carried out by the industrial operations technology staff (for example, the cement industry in the PTA), can be implemented as a policy analysis by country and regional specialist (as in the case of Zambia), or could result from the activities of others specialized in investment promotion, the development and promotion of technology or the operation of trust funds. Or it could emanate from discussions and deliberations at UNIDO Consultations such as the recent Regional Consultation on Restructuring and Rehabilitation, with Special Focus on the Food Processing Sub-sector in Africa. Alternatively, the choice of enterprises could result from other multilateral or bilateral assistance or, of course, be determined by the country's own institutions and/or government departments.

The second stage is the <u>diagnostic stage</u> in which short-term reorganization and rehabilitation measures are carried out (e.g., in the area of the financial management, inventory control, quality control or preventive maintenance). These short-term measures are restricted, by definition, to ones which do not require major capital investments; but small amounts of funds are generally needed for accompanying measures such as the establishment of a maintenance workshop, acquisition of selected, crucial replacement parts, etc. In addition, detailed medium- and long-term rehabilitation work plans for each aspect of the operation of the enterprise (management, pre-investment analysis, marketing, packaging, technology, etc.) are elaborated. These analyses and short-term assistance measures form the core of the projects currently being developed by DIO, and the detailed work plans developed therein form the basis for potential follow up technical assistance from all parts of the house.

Once the diagnostic analysis is carried out, <u>investment promotion</u> <u>measures</u> are undertaken as the third stage to assist the enterprises to finance the planned rehabilitation measures. These could take the form of meeting with local development banks and other financial institutions, the organization of a type of investors' forum, the bringing of enterprise managers to visit the factories of potential partners abroad, etc.

Since the international consultants who implemented the diagnostic studies have carried out a survey of restructuring needs in the country in general as one of their first activities, and since the local counterpart has been required to provide local experts to work with the international experts, the international experts will have a very clear perception of the state of local capacity to undertake restructuring and rehabilitation analyses and implement the required medium- and long-term measures.

As the fourth stage of the programme, therefore, the international experts are required to produce an <u>assessment of the industrial human resource</u> development needs in this area - a report which can serve as the basis for follow-up technical co-operation. Central to this training stage are a series of seminars - based on the problems encountered and the lessons learned in the diagnostic stage - for the chief executive, the chief accountant, and the

chief operations manager of all the enterprises in the sub-sector examined. These seminars ensure a multiplier effect throughout the economy from the UNIDO assistance to individual enterprises. The seminar being designed at the moment fall into three types: the first is a new type of high-level seminar for chief executives on corporate strategy and industrial development, the first of which will be held in Senegal in February 1991; the second builds on UNIDO's work in pre-investment analysis and is a training seminar analyzing and assessing rehabilitation investment projects; and the third - for operations managers - builds on the organization's experience both in industrial management and in technical operations and focus on concrete. factory-level problems in production operations.

The <u>UNIDO follow-up</u> that would represent the fifth stage of the programme could cover a very wide gamet of activities, a non-exhaustive list of which would include: technical assistance from experts in industrial operations technology; co-operation in the development of technology and technology transfer; further training in all aspects of rehabilitation, from preventive maintenance through financial analysis to production management: advice on country, sectoral technology strategy and policy, or general management; the appraisal of complementary new investment projects for expansion, diversification or totally new production; and co-operation in investment promotion, and in contracting and negotiation.

Summary of the Approach

As the analysis, assistance and co-operation proceeds through these stages, two overriding features stand out. One is that the UNIDO a, proach to restructuring and rehabilitation is a vertical approach, the other that it is a horizontal approach. By the vertical approach we mean that the focus is on national policy, industrial sector strategy, and enterprise operations. These different levels are interlinked for the obvious reason that the functioning of the enterprise depends (at least partly) on the wisdom of government policy and strategy. But just as government policy can influence the availability of foreign exchange for replacement parts for the enterprise, so can the enterprise, through its potential earnings of foreign exchange, affect the balance of trade of the country as a whole.

The horizontal approach views the process in terms of forward and backward linkages. Acting in line with this approach, for example, we have consistently declined to proceed with a requested complete rehabilitation of a meat processing plant in one country because of the successive failure of three different schemes to breed or otherwise acquire a sufficient quantity of pigs - though we are completing implementation of a programme to increase the value added of their waste by-products (bones). Similarly, in another country, in cassava, we are not proceeding with the rehabilitation of cassava processing until the FAO agronomists have completed their analysis of certain problems relating to cassava growing per se (e.g., pest control and irrigation).

There is, in fact, a third approach that is of perhaps of major importance to UNIDO in the future. That is the congruence of three separate activities in UNIDO: one is the development of sub-sectoral programmes in the food processing sector, another is the systems approach whereby assistance in food processing runs from the production of industrial inputs (machinery and fertilizer), extends through the processing itself, continues with packaging and domestic and foreign marketing, and ends with pre-investment analyses for future expansion. Taken together, these three developments seem to be putting UNIDO on the right track to co-operate with and assist the developing countries to produce a truly self-sustaining path of industrial development.

A final feature of the approach that follows from earlier comments is that the approach to restructuring and rehabilitation is a differentiated approach. On the one hand, it is differentiated by sub-sector; restructuring and rehabilitating the vegetable oils' sector in Africa is completely different from restructuring and rehabilitating cereal milling (let along, say cement production). This is true both in terms of the homogeneity of the product produced and of the homogeneity of the technology utilized. Simultaneously, the approach outlined appears to be best suited to what can be roughly defined as medium-sized enterprises. For very small enterprises with one foot still in the informal sector it appears to be simply too elaborate; and for very large, government monopolies the dominant problem is often of a very special nature and the objectives of the exercise are different.

Preconditions

In order for this follow-up to be successful, it is necessary that certain preconditions are fulfilled. One of these is that the enterprises to be assisted these are 'model' enterprises - in terms of their problems and their characteristics - for the sub-sector in question and that they are willing to participate with UNIDO and the government in disseminating the results of the assistance. Parallel, and intimately related to this point, is the requirement to ensure that enterprises chosen are serious about their rehabilitation plans and willing to make the sacrifices necessary to put them in place.

In practice, adherence to the latter requirement is operationally determined by the willingness of the enterprises to be assisted to make a financial contribution to local currency of some 15% to 20% of the estimated cost of the local costs of the assistance provided in the form of a contribution to a government-appointed body (for example, the counterpart). It should be noted that in no case would these monies be touched in any way by UNIDO or the UNDP. They could, however, be used by the local counterpart to, for example, pay the training costs for local experts or other expenditures that multiply the local impact of the project. For UNIDO, this contribution is a proxy measure of the degree of commitment of the enterprise to the programme.

Experience has shown that two further considerations can also make a major contribution directly to determining the success or failure of the follow-up at the enterprise level - and hence of the entire process of rehabilitation; and indirectly to determining the success of the government's sectoral industrial policy. The first is the attempt to ensure that the entrepreneurs who are the key decision makers in the enterprises assisted are genuine risk takers. Without the willingness of these decision makers - who could be in either private- or public- sector enterprises - to take risk, no genuine, long-run increase in efficiency is possible. The second is the necessity to initiate the process of identifying potential domestic and/or foreign partners as soon as possible - and not just at the end of the project. Here, of course, the UNIDO system of Investment Promotion Service offices could potentially play an important role.

Accompanying and Supporting Measures

As has been explained, the integrated and multi-disciplinary approach "situates" the enterprise in its total operational environment (and is thus an approach to both restructuring and rehabilitation). If it is to achieve its enterprise-level objective of increasing the firm's profitability, as well as its long-term goal of strengthening the local, national capacity to create an environment where industrial enterprises operate according to the dictates of efficiency and profitability, then certain accompanying and supporting measures are a sine qua non of national economic policy. Among these would be assistance and co-operation in the following areas:

- * industrial sector policies and strategies (for example, for the food processing sector);
- * sub-sector technology studies (for example, on available food processing technologies);
- * industrial and technical information services (for example, to
 ensure easier access to information on the food industry
 internationally);
- * engineering work on remanufacturing, reconditioning and/or reverse technology (for example, for agricultural machinery);
- * design centres for equipment (for example to assist the many developing countries who purchased turn-key plants for food processing where it turned out one needed to do much more than just "turn the key" if the plant was to operate efficiently);
- * programmes of quality control, of measurement and control equipment and of standardization and normalization (for example, to strengthen the export potential of the food industry);
- * national packaging programmes and systems (for example, to allow the food industry to increase the value added of their output);
- * institution building to create national focal points in the above areas; and
- * sub-regional specialization and co-operation (for example, in production of industrial inputs such as agricultural machinery or chemical fertilizer).

In all these accompanying and supporting measures, the overall objective is to create the national capacity and environment that allows industrial enterprises to operate according to the dictates of efficiency and profitability. It is the common hope of all those at UNIDO involved in cooperating with the countries of Africa in this way that if one were to turn to this topic again in, say, ten years, it would be possible to say that much of this had already been done, that the local capacity was largely there, and that national actors were able to continue much of the work of international experts.

Conclusions

Before finishing, one short comment on the future of the programme might be in order. Up to now, most of the projects have been generated as completely new technical assistance and co-operation projects by the industrial operations department of UNIDO. In utilizing the economic and technological policy analysis work of other parts of the organization as an input, efforts are now under way to attempt to strengthen the intra-house linkages in UNIDO's technical co-operation activities. But far and away the greatest potential for the future of a new programme in industrial restructuring and rehabilitation in UNIDO lies in UNIDO's existing 'technical' assistance. By broadening such assistance to cover economic, managerial, financial, energy, policy, environmental and other dimensions of the restructuring and rehabilitation process, not only would the quality of UNIDO's assistance to the developing countries be improved (and their development therefore fostered), but the average unit value of each UNIDO technical co-operation project - and hence the total value of UNIDO's technical co-operation activities - would also be appreciably increased.

Finally, it should be made clear that the resources of the UNDP are not sufficient to meet the demands of the developing countries for such cooperation. UNIDO therefore very much relies on the co-operation of the donor governments to allow UNIDO to co-operate with the developing countries in this way. In this respect, UNIDO has been generously supported by the Government of France in this specific project, and the Organization is very grateful for this vote of trust and confidence from the donor in our work.