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*for a sustainable future*

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COUNTRY PAPER OF FEASIBILITY STUDIES  
IN SELECTED LEAST DEVELOPED COUNTRIES ON  
SUDAN \*

by

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1) Background Informations :

The Sudanese Economy is largely based on agriculture which will continue to be the leading sector in the Sudanese Economy in the coming few decades. The Government's Policy is to enhance economic growth by developing the sector, besides promoting agricultural development.

It is of paramount importance that the diversified industrial development plans should harmonise with the agricultural planning, as agriculture will continue to be the backbone of the country's economy, generating almost all foreign exchange earnings and major portion of the GNP. A substantial portion of the country's planned investment is earmarked for agriculture. Foreign investments from regional and international sources are increasing rapidly. Therefore, proper planning is needed to channel these funds in the right direction. The development projects must also be identified, prepared and appraised according to well defined criteria and institutional improvements should accompany the expansion of investment.

The Development and promotion of Industrial Investment Act was revised in 1974 in order to improve the investment climate in the country and to attract private investment both foreign and domestic. New industrial investment are eligible for a number of generous incentives and facilities. Foreign investment is accorded equal treatment with local investment. The remittance of profits and dividends and the repatriation of capital are guaranteed in the Investment Act.

Underutilisation of installed capacity, inadequate capability for the preparation and implementation of industrial projects, and shortage of trained industrial manpower, shortage in raw material inputs, transportation bottleneck, and inadequate infrastructure, are some of the sector's main development constraints.

2) Existing Situation :

The above Situation calls for a through review of the existing industrial policy, plan and strategy as well as of the roles and functions of the institutions concerned with industrial development in the country, both public and private sector activities. Particular attention should be given to the rapid changes in industrial development. Also greater emphasis should be given to the better utilisation of existing capacities and a considerable investment would be necessary to have a break-through. This would require co-operation at a national, regional and international levels.

Following the issue of a set of guidelines which take the form of a general framework for the selection of industrial projects, a more specific identification of those industries and projects should be undertaken. Although the 6-year plan set objectives for the industrial sectors and gave strategies for achieving those objectives, the projects which have been listed are not in themselves linked to the objectives and thus there is not indication of whether the projects are the most suitable in the circumstances. Even though about half of the investment during the period of the plan is earmarked for carry over projects, there is a need to show whether new

projects and the whole industrial strategy is appropriate for reaching the objectives given for the industrial sector.

These guidelines are an indication of how far the main objectives are likely to be met by projects in hand and of the gaps which remain to be filled.

There is already a piling of reports on the industrial sector which spell out the problems but make little or no attempt to solve them. It is felt that attention should be given to the administrative machinery available for implementing the 6-year plan to achieve the objectives set out in the plan. For industrial sector the following policies and measures should be adopted, namely :-

- a) Pursuit of an industrial policy geared to develop natural resources.
- b) Pursuit of self-sufficiency
- c) Development of export potential and the establishment of Export Development and promotion centre.
- e) Fuller utilization of existing capacities and consolidating present activities.
- f) Exploitation of comparative advantages.
- g) Special emphasis should be placed on building industries with forward and backward linkage in the economy as a whole and the industrial sector in particular. Thus special attention should be given to the manufacturing of agricultural inputs on the one hand and to the processing of agricultural, forest-based and food industries on the other hand.
- h) Special efforts should be made to develop and expand rural traditional and small-scale industries with the

view of combating rural stagnation, stimulate growth, create employment and achieve social balance.

- i) Establishment of integral industries such as mechanical engineering and chemical industries to provide the necessary link between the different industrial sub-sectors.
- j) Modernisation of modes and means of production through improvement in the overall management techniques, specialised training, use of waste and by-products, increase reliance on locally produced raw materials and the production of intermediate goods.
- k) Improvement of efficiency in all institutions and agencies dealing with manufacturing and mining and establishment of an Investment Promotion Board. Particular improvement is necessary to develop management capacity through training and re-organization of personnel both at the top, middle and shop floor levels of management.

This requires a rational and flexible planning and management reacting to changes in the market, for the effective mobilisation and optimal utilization of resources.

3) Institutional Frame Work and the Planning Machinery  
the Supreme Council for National Planning

The role and functions of this council is to set out the general framework of the plans and the global objectives and policies for the development on the national level through the Ministry of National Planning and the Ministry of Industry which is supposed to identify projects within

the framework of the industrial sector objectives and to stipulate policies and measures to execute industrial projects. The Ministry of National Planning co-ordinates collaboration and supervises the development process in all the sectors including industry. In 1976 the Project Preparation Unit has been established by the Ministry of National Planning to identify high priority projects within the framework of the national plan and to carry out the preparation of projects studies in close collaboration with the executing Government agencies and the concerned international institutions sponsoring the projects. Normally, foreign and local consultants (under the supervision of a steering committee established by the Project Preparation Unit for the project concerned) are recruited to undertake the studies.

The Ministry of National Planning formulate the Government Plans with close collaboration of the Sudanese socialist Union which prepared phase programmes of actions (aimed at self sufficiency) in sugar, textile and other projects) - Regional Planning Offices are under establishment by the Ministry of N.P. for the purpose of regional and National Plan and programmes as well as to sustain regional balanced development.

The main Government co-operating body is the Ministry of Industry which needs consolidation and reorganisation on the basis of aforementioned outlined objectives. The suggested reorganisation of that Ministry is as follows:

1) General Project Departments:

- 1-1. Planning Department (statistics, surveys, research, follow-up etc ..).
- 1.2. Economic studies, marketing, investment and finance Department.
- 1.3. Technical Department.
- 1.4. Implementation of public sector projects Department.

1.5. Training Department.

2) General Department for Industrial Control :

2.1. Quality control and standardization Dept.

2.2. Import Department.

2.3. Industrial costing and pricing Dept.

2.4. Concessions and promotion Dept.

3) General Administrative Department.

3.1. Department for special assignment ( Office of the Minister).

3.2. Industrial Information Department.

Other related activities:

There is an Advisory Team of the World Bank (IBAD) attached to the industrial sector institutions working in close collaboration to improve the efficiency of the planning machinery.

4) Objectives of the Industrial Planning:

A) Strengthening the Ministry of Industry to prepare it for playing a central and active role in the short-term middle term and long-term sectorial planning of the main objectives of industrial development.

B) Strengthening the capability of the Ministry of Industry to identify priorities and cooperations in connection with project formulation.

C) Formulation of a long-term strategy for the industrial sector to implement these objectives.

5) Immediate Objectives:

Examine the structure, function and operation, of the existing machinery and institutions concerned with industrial planning and development and recommended ways and means



of enhancing their efficiencies as well as of strengthening and intensify co-operation and co-relationship among them.

### 5) Project Identification and Preparation:

Proper project identification and preparation is an essential task within the overall national plan's objectives. If it is not adequately and professionally dealt with it will lead to wrongly designed projects which in turn be a burden to the economic growth and misallocation of the scarce nation resources. Numerous examples of this can be referred to in this context. A wrongly identified and designed project in a developing country like the Sudan has however, a vital negative impact on the sector and on the overall economy and the society. The identification of development projects before the establishment of the project preparation unit of the Ministry of National Planning was being initiated by the politicians and executing government agencies or by the donor company or country. This is done without the reference to the planning body and thus projects identified and implemented were disintegrated, or jeopardised with the various sectors or subsectors, or both, in the national economy. The criterion adopted in this respect was absent or very meagre. Such practice resulted in poor development project and in some cases no serious studies were undertaken.

To encounter these deficiencies a Project Preparation Unit, an affiliate of the Ministry of National Planning, has been established together with an IDA WORLD BANK and Kuwait Fund support. Financial support is being extended by the two agencies to high priority projects handled by the P.P.U. The procedures and functions of the P.P.U. can be summarized as follows:-

- (1) Working party groups are established by the P.P.U. incorporating representatives from the relevant government body or institution supported by the IBAD, UNDP Planning Team in the Ministry of National Planning, to examine the project idea after a submission of

a request from the executing agency to the P.F.U. This is done according to criteria stipulated by the P.F.U. for the identification and selection of projects.

- (2) Preparation of the concept of the project.
- (3) Draw the terms of Reference for the project.
- (4) Invitation to institutions & consultants to carry out the studies.
- (5) Selection of consultants.
- (6) Contract negotiations.
- (7) Supervision of performance of consultants selected.
- (8) Comments on reports submitted by the consultants.

The above mentioned stages are processed on through stipulated criteria and procedures following the world Bank IDA, IBRD methodologies in project identification, selection of consultants etc.

When the project idea has emerged and proposed through the analytical process of the MOP or put forward by another Ministry or agency; it will be conceptually scrutinized in accordance with the sub-sectoral, sectoral and national objectives. Hence, a prefeasibility report is prepared outlining in a descriptive way the project philosophy, its objectives and main features.

#### Objectives:

The purpose of a prefeasibility study is to show whether the proposed project indicators justify embarking on a detailed feasibility or pre-investment study supposed to provide more details on the project indicators.

#### Project Terms of Reference (TOR)

The terms of reference should cover the following outlines of the project:-

- (1) Brief description of the project giving location, title sponsors with estimates of volume and cost of inputs, employment, investment cost, etc..
- (2) Assessment of technical feasibility, with alternative technologies.

- (3) Assessment of availability and cost of major inputs of cost both material and infrastructure, including man-power.
- (4) Analysis of potential market for projects output.
- (5) Prima facie estimate of BRR.
- (6) Review of similar, complementary project with cost and benefits estimates.
- (7) Review of the non-quantifiable environmental costs and benefits in relation to the alternative choices of location.
- (8) Prima facie estimate of economic rate of return.
- (9) Results and recommendations on whether or not to proceed with a detailed feasibility study.

Normally a working party, representing the relevant agencies will undertake the preparation of the prefeasibility which in turn is subject to the approval of the Review Committee of the P.F.U. or the sponsoring agency, accordingly the recruitment of the foreign and local expertise to undertake the following steps which lead to a detailed feasibility study will take place. Involving the project analysts from the P.F.U. and representatives of the planning units of the various ministries in all or some parts of the study entails practical training in the process of project planning.

When the PFC has approved the TOR prepared by the working party and the source of study finance for the sound project a short list of consultants is prepared and invited for bidding.

#### Invitation to Consultants:

When inviting consultants priority is given to independent firms-i.e. from suppliers of machinery or equipment etc. the selected consultant should be competent and with world wide experience especially in countries similar to the Sudan conditions and worked in similar project. The consultants submit proposals to undertake the feasibility study and the

committee established for evaluating the bidding consultants on the basis of a discrete criteria will select the most qualified following the World Bank procedures;

- i) The most qualified consultants is selected on the basis of his past experience, his approach and methodology to undertake the study and the qualifications of the personnel assigned to the project and the backstopping services attached to the project team.
- ii) The financial offer of the most technically qualified firm
- iii) In case the working party fails to reach an agreement the second best technically rated bidder is invited for contract negotiations.

In selecting the most technically qualified bidder the criteria adopted are as follows:-

- 1) The competence and experience of the firm.
- 2) The methodology and the work plan adopted
- 3) The qualifications and experience of staff allocated to the job and the backstopping services.
- 4) The time schedule proposed for completing the study.
- 5) The financial offer of the most technically qualified firm and its financial standing.

#### Contract Negotiations

The first step in the contract negotiation is to confirm the project terms of reference, the technical and the personnel allocated to the study, If the Government agencies or institutions have got the qualified staff to conduct part, of the study e.g. survey work or a specific area in the study it should be clarified and agreed upon with selected consultant. Then the financial negotiation will cover the consultant fees i.e. Man/ month of professionals and supporting staff and the Terms of Payments.

#### Superfisions of the consultants Work.

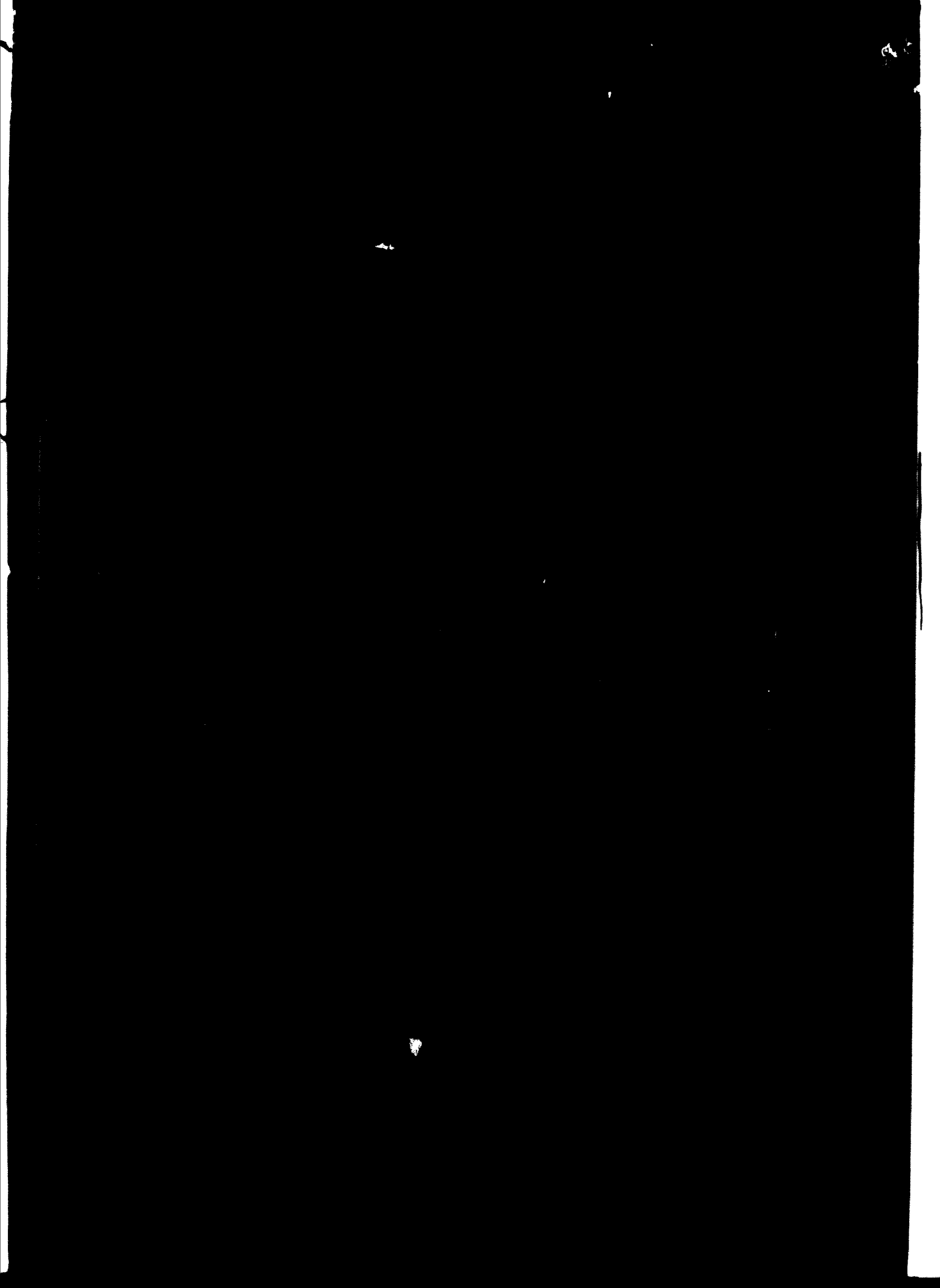
A steering committee is established to supervise the consultants throughout the study period. The intensity and engagement of this committee depends on for each case. The main functions of the steering committee is to comment on and approve the progress of work, preliminary and final reports.

In evaluating the consultant performance the steering committee should pay field visits to proposed project site to consolidate their comments on the performance of consultants. Eventually and after the approval of the final report the feasibility study will be submitted to the financing and executing agencies for project final approval and implementation.

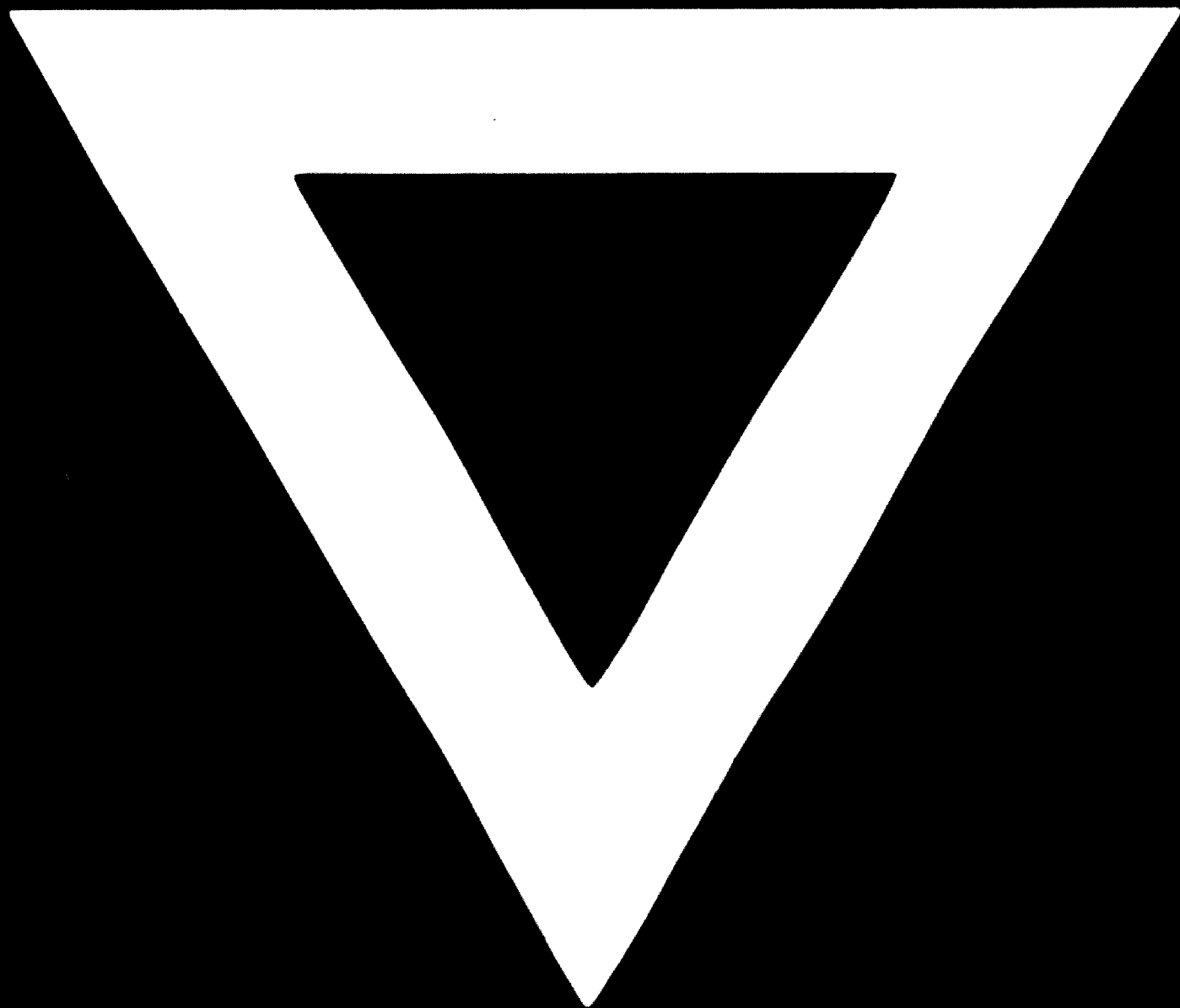
It is worth mentioning that one of the major difficulties encountered in the evaluation of any project is the lack of available and relevant data and information. Hence the consultants are asked to carry out plausible assumption to fill the gaps in data whenever found.

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