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ECONOMIC COMMISSION FOR AFRICA
West African Sub-regional Working Group
of Experts on House-Building Costs
Kumasi, Ghana, 31 August - 11 September 1970

INTRODUCTORY PAPER BY THE SECRETART AT

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1. The reason for the Commission requesting the secretariat to arrange a series of sub-regional meetings of experts on House-Building Costs, was the well known fact that the number of houses built annually in Africa does, by far, not meet the demands, let alone the needs, of the growing African population. This is especially true in rapidly growing urban areas where in fact only some twenty per cent of the needs are adequately met. Rapidly deteriorating slum conditions is today a problem in Africa as well as in other parts of the world.

- 2. In order to meet this worsening housing problem, given the already over-stretched resources, increasing attention should be given to the problem of costs for it is only by reducing costs by rational methods of organization, planning and the production of building materials for housing, that the numbers will be met. With this in mind, the ECA has organized the Programmes of Sub-regional Meetings on House-Building Costs.
- 3. Meetings according to the DGA Work Programme have been held in :

Addis Ababa (Mast Africa) 1968
Tangier (North Africa) 1969 and planned for in
Kumasi (West Africa) 1970 and
in - (Central Africa) 1971.

4. The East African meeting may be considered as preparatory. Most interesting so far are the results of the North African meeting. A permanent Working Group of North African Experts on House-Building Costs has now been set up and Centres are being created in all North African countries as proposed by the experts. The Recommendations made by the experts meeting in Tangier in September 1969 have been confirmed by the governments and may therefore serve as a model for similar measures in other African sub-regions (See E/CN.14/460 - II RECOMMENDATIONS).

5. Furthermore, one staff member from each one of the North African National Centres has been invited to take part in a joint seminar combined with the International Courses at Bouwcentrum, Rotterdam, The Netherlands, January-June 1971.

- 6. The seminar will be bilingual in English and French and the six selected scholars from North Africa will also translate all resulting documents into Arabic. The outcome of this seminar, thus, will be a firm advice to the centres involved on one and the same method of dealing with economic problems related to housing. This will influence the arrangement (classification) of all kinds of related facts and largely influence the writing of specifications, bills of quantities and other documents regulating building practice. The ultimate aim will be to facilitate the communication between all experts and practitioners involved in house-building from those who are responsible for the taking of macrodecisions to those who are actually involved in production (see E/CN.14/HOU/46).
- 7. The scholars, when returning from the seminar in Bruwcentrum will bring home a full set of agreed standard forms and recommendations for working procedures as proposed by the experts. The forms will be printed under national arrangements in Arabic/English and Arabic/French respectively (see E/CN.14/460 Recommendation 2 and ANNEX IV).
- 8. The experts meeting in Kumasi September 1970 may want to arrive at similar or different recommendations as those resulting from the meeting in Tangier.
- 9. For the orientation of the experts meeting in Kumasi, therefore, principally the same background documents are presented as those used to the English meeting in Tangier.
- 10. The discussions to follow may approach the problems involved in economizing in house-building from two aspects:
 - problems to be attacked
 - methods of attacking the problems.

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Problems to be attacked

11. After a short presentation of the situation in each country, the first part of the discussions may focus on:

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- (i) The influence of macro-decisions on house-building costs:
 - Population development urbanization, and policies related thereto.
 - The use of existing domestic natural resources and the reduction of the import content in houseproduction.
 - Optimal quality. Optimal quality.
 - Integrated planning and the implementation of plans; land and location policy.
- (ii) The influence of micro-decisions on house-building costs:
 - The standard of infrastructural works.
 - The building materials industry and market.
 - The construction process: - design

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- contracting or direct labour
- aided self-help methods.

- The administration and maintenance of existing buildings and infrastructural works; financing; comperative housing.

Methods of attacking the problems

The second part of the discussions may deal with the machinery to be established in each country and in the sub-region as such in order to improve the housing situation with special reference to house-building costs (better use of existing resources and possibilities). One way of attacking the problems involved may be

(a) National organization

- The machinery for an integrated national policy and programming in respect to housing should take into account:
 - Population planning; (i)
 - Restriction of import and the consequent exploitation of domestic material resources;
 - Urban planning; transport and location of industries and business; land use regulation.
 - Housing standards and building by-laws based on the optimal quality philosophy.
 - Administrative and financial arrangements for a continuous production of enough hourss;

- (ii) The machinery for supply of infrastructurally equipped land. (This may be one of the most complicated technical, financial and administrative consequences of urbanization. The cost of the infrastructures for urban housing may be 20 per cent of the total gross capital formation in housing and should be given appropriate priority. Requirements for the supply of components (iii) and for the rationalization of construction (iv) of housing are valid also for the infrastructures, although administration and financing may be different).
- (iii) The machinery for supply of building materials, components and construction plant should take into account:
 - Housing (and other building) type studies for adequate component standards (modular co-ordination) as a guide for existing and new factories.
 - Raw materials research for use of domestic resources instead of import. Building materials research and testing laboratory.
 - Planning and financing a well balanced building materials (including components and plant) industry related to the planned urbanization process and a general housing policy. Training of staff and labour needed.

- (iv) The machinery for rational construction should take into account:
 - Study of rational construction methods based on standard components.
 - Promotion of continuous rational (cheap) construction based on the components production flow rather than ad-hoc tendering of individual "projects".
 - Utilization of available "free" labour forces as far as possible (whether by "aided self-help" or by mass crganization of unemployed men for construction; it may be noted that the traditional concept "skilled labour" has been changed a lot by modern approach to standardization and repatitive construction).
 - Training of a new generation of designers and constructors for "negotiated contracts" based on "system-building" with open cost-checking.

- (v) The machinery for administration and finance of urban housing; including tenant education and co-operative housing; evolution of revolving funds with a reasonable rent interest relationship.

 (This problem will be dealt with at the next African Regional Meeting on Housing Finance in 1971).
- 14. Whenever house-building costs are debated with the aim of finding the methods for increased and improved house production an elaborate set of items appears on the agenda. The points to be discussed are more or less the same always although they may appear under different headings and are given different emphasis in different connexions.
- 15. The conclusions of the ECA secretariat after the series of Working Groups so far held, has been that only very limited improvements can be achieved in construction rationalization within the existing frame of macro-decisions. The major responsibility, for housing deficiencies in the present era of urbanization, lies with the integration of macro-decisions as listed under item 11(i) above.
- 16. In the proceedings of the Kumasi Working Group this may be borne in mind. The working group of North African Experts on House-Building Costs came to the conclusion that the only way of solving the problems involved was to charge one centre in each country with the responsibility of coordinating all activities in the country influencing house-building and housing economy generally. This Centre should be the advisor to the Government on the integrated approach to housing policy and on any governmental decision influencing the possibilities of improving the housing situation.

(b) Sub-regional international co-operation

Appendix on the control of the control

17. The solution of the housing problem economically, should be considered a national responsibility; since most countries in Africa are at the same stage of development, the utilization of the findings of one country in another is not only possible but desirable. ECA has found that sub-regional co-operation in this sense is essential. The meetings held in Addis Ababa, Tangier and Kumasi expresses the UN acceptance of this ECA principle.

- 18. The most suitable way of realizing a sub-regional co-operation on house-building costs seems to be the establishment of a co-operation between national centres. In North Africa a permanent Working Group of Experts on House-Building Costs was created. There are two members from each country in the Working Group one of which normally will be an expert staff member of the relevant centre. The Experts meeting in Kumasi may want to propose a similar organization to the West African Governments.
- 19. There is no doubt that the national housing development with its complicated network of inter-related activities will benefit from a systematic analysis of all problems involved and of their respective influences on the totality; but this analysis can only be beneficial if there is an agreed system (classification) for all activities involved. All transmission of knowledge and all communication of information depends on an agreed presentation and an agreed way of combining the different elements of information.
- 20. In order to facilitate communication internationally the CIB (International Council for Building, Research Studies and Documentation; Consultant to the United Nations) recommends that different countries—even if the working language cannot be the same—adopt, as far as possible, identic methods of arranging information (classification). The secretariat brings the CIB recommendations to the notice of the Experts on House-Building Costs, so that no decision on sub-regional—as well as national—co-operation will be taken without the knowledge of these CIB recommendations.

Attached to this introduction are the following ECA documents:

- E/CN. 14/460 Report of the Meeting of Experts on House-Building Costs, Tangier, September 1969; the Recommendations of this meeting are now being implemented in North Africa.
- E/CN.14/HCU/45 Methods of Cost Assessment in Low-Cost Housing; a paper presented for the experts meeting in Tangier but equally valid for the meeting in Kumasi.
- E/CN.14/HOU/46 Building Research and the Use of Knowledge in Practice; a fundamental paper for the discussions on "integrated approach", "optional quality" and "the development cycle" a Bouwcentrum contribution.

E/CN.14/HCU/46/Add.1 Cost Analysis for Price Reductions in Low

Income Group Housing; a summary with conclusions from the research of the National Institute for Physical Planning and Construction Research in

Ireland.

E/CN.14/HCU/47

Relation between Cost Coding, Bills of Quantities, Standard Specifications and General Information Services; an explanation of the use of "UDC+SfB" classification as recommended by CIB. "Keeping of Documents in Small and Medium Size Information Centres" is attached to this paper.

TAO/GLOBAL/4

Modular Co-ordination in Housing; A Paper prepared by the UN on the basis of international recommendations made by several international committees.

E/CN.14/HCU/16/Rev.2

Standard Questionnaire, as agreed upon by experts in Addis Ababa 1968 and Tangier 1969.

Two more documents are attached for your information although they may not be of direct interest for the discussions in Kumasi:

E/CN.14/416

Report of the Meeting of Experts on House-Building Costs, Addis Ababa - 23 April to 29 April 1968; the recommendation for standard presentation of post-calculations of housing projects made by this meeting is valid for East Africa and North Africa.

E/CN.14/HOU/48/Rev.1 A review of North African Country Monographs:

Add l Libya

Add 2 Sudan

Add 3 UAR

Add 4 Algeria

Add 5 Morocco

Add 6 Tunisia