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# SOMALIA

## SOMALIA COUNTRY WORKPLAN

Country Implementation Plan for IEES Activities  
1987 - 1988

### IEES

Improving the  
Efficiency of  
Educational  
Systems

October 1987

Florida State University  
Howard University  
Institute for International Research  
State University of New York at Albany

United States Agency for International Development  
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Office of Education  
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Improving the Efficiency of Educational Systems (IEES) is an initiative funded in 1984 by the Agency for International Development (AID). The principal goals of the IEES project are to help developing countries improve the performance of their educational systems and strengthen their capabilities for educational planning, management, and research. To achieve these goals, a consortium of U.S. institutions has been formed to work collaboratively with selected host governments and USAID Missions over the next ten years. The consortium consists of Florida State University (prime contractor), Howard University, the Institute for International Research, and the State University of New York at Albany.

There are seven countries working with the IEES initiative to improve educational efficiency: Botswana, Haiti, Indonesia, Liberia, Nepal, Somalia, and Yemen Arab Republic.

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IEES  
Educational Efficiency Clearinghouse  
Learning Systems Institute  
204 Dodd Hall  
Florida State University  
Tallahassee, Florida 32306  
USA  
(904) 644-5442

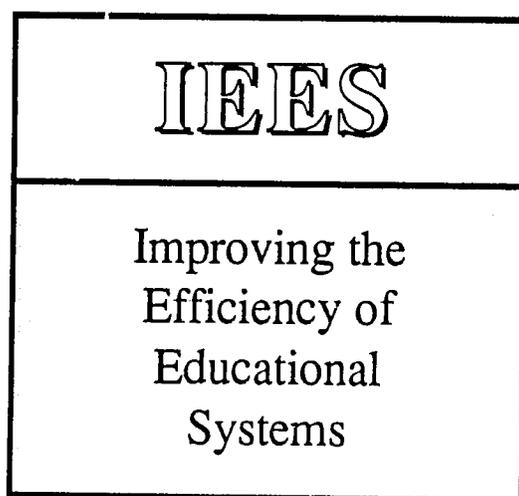
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## 1.0 BACKGROUND

Somalia was the first country involved in the IEES Project and is one in which the IEES Project remains extremely active. The successful completion of the long list of activities outlined below would not have been possible without the commitment and active collaboration of officials from the Ministries of Education, Labor, and National Planning and the support of the USAID Mission. The GSDR/IEES initiatives (including pre-contract activities) are listed below together with their dates (inclusive from task initiation to report publication). A list of the activities with the GSDR coordinating agency is provided in Annex 1.

1. Education and Human Resource Sector Assessment (June 1983 - February 1984).
2. Somali Civil Service Study (February 1984 - June 1984) and participation in the Civil Service Symposium (August 1984).
3. Preparation of the Somalia Management Training and Administrative Development (SOMTAD) project paper (July - August 1984 and February 1985).
4. Management and Administrative Workshops for Ministry of Education officials and Headmasters (February 1985).
5. Placement of Mark Berger as Resident Technical Advisor for the IEES Project (June 1985 - May 1987).
6. Data Analysis and Microcomputer Workshops (June 1985, October 1985, and June 1986).
7. School Quality Enhancement Study (August 1985).
8. Somali Language Dictionary of Technical Terms in Economics (November - December 1985, August 1986).
9. Development of a Strategy to Improve the Quality of Primary Education (August 1986).
10. Teacher Incentive Study (August 1986).
11. Study of the Educational Materials Distribution System (August 1986).

12. Initiation of Somali participation in the cross-national Teacher Incentive and Education Management Information Systems Policy Research Studies (November 1986).
13. Development of a Plan for Preparation of Teacher Training Materials (November 1986).
14. Design and Costing of the implementation of the Integrated Strategy for Improving Primary Education in Somalia (January 1987).
15. Policy Analysis Workshop (April 1987).
16. IEES County Workplan Development (April and June 1985, April 1986, and April 1987).

As the list indicates, the GSDR/IEES partnership has proved effective in systematically designing and implementing the steps necessary to realize the shared goals of capacity development and improved system efficiency. The Education and Human Resource (EHR) Sector Assessment remains the most comprehensive and definitive description of the sector available and has served as a major resource for both government and donors in sector planning. The results of the Civil Service Study (which was itself a response to the findings of the EHR Assessment) are continuing to guide the Government of the Somali Democratic Republic (GSDR) policies in the areas of personnel, administrative organization, and private sector development. The Somalia Management and Training and Administrative Development (SOMTAD) Project, a major bilateral initiative in management training, began in the Fall of 1986.

The Quality Enhancement Study (QES), another outgrowth of the EHR Assessment, identified priorities for improving teacher quality and instructional materials. The recommendations drew attention to the critical need for regionalization of teacher training, materials-based teacher training, improvement of the incentives for teaching, and better distribution of curricular materials. The necessity for further study of

the teacher incentive and the materials distribution systems led, in turn, to separate reports on these systems. The Quality Enhancement Study together with the reports, in turn, served as the basis for the Transitional Strategy, later renamed the Integrated Strategy.

The strategy itself was a response to the withdrawal of major donors from the education system and the substantial decline in enrollments in the primary subsector. It was designed to realize immediate improvements in the quality of primary education with or without substantial donor participation in the subsector. The Integrated Strategy provides a method for ensuring that the inputs (teacher training, the new Reform Curriculum textbooks, teacher guides, teacher supervision, and teacher incentives) which are already available reach the field. While each of these inputs is considered necessary for improving the quality of primary teaching and learning, none of the inputs is sufficient by itself. The Integrated Strategy, building on the ongoing work of different Ministry departments, offers a means of combining inputs in order to maximize the contribution of each to the enhancement of primary education.

The first step in the operational plan will be the development of Somali and mathematics inservice teacher training modules based on the instructional approach of the New Reform Curriculum and the revision of teacher guides to improve consistency or economy, where necessary. This activity is scheduled for the 1986/87 project year. The strategy will then be implemented in 1988/89 in two districts. In future years, inservice materials will be developed for the remaining subject areas and the strategy implemented in increasing numbers of districts.

In addition to the training activities which were an integral part of the studies of the education sector, Ministry of Education and IEES

personnel have collaborated in the improvement of the Education Management Information System (EMIS). The project has provided two microcomputers and printers to the Planning Department, staff have developed considerable computer skills, and Department Heads have become sensitized to the Planning Department's needs for timely data and the types of analyses which the Department can undertake.

The computerization of the EMIS has significantly reduced the lag time between data collection and reporting, as well as substantially increased the Planning Department's capacity for analysis. The working data set now includes all data collected over the past twenty years on enrollments, teachers, and schools. Continued improvement of the EMIS is expected from participation in the Policy Research Initiative, which will identify strengths and weaknesses in the current system, and provide ongoing training in educational planning and policy analysis.

The integration of the GSDR/IEES activities and the level of collaboration in those activities is, in large part, due to the work of Mark Berger, who is just completing his two years of service as the IEES Resident Technical Advisor. Berger's daily involvement in the Planning Department's work has permitted the Project to respond quickly to identified needs and has maximized the coordination of MOE/IEES and other donor initiatives.

#### 1.1 PURPOSE OF THE COUNTRY WORKPLAN

The country workplan is intended to represent a consensus of views among those with interests in the IEES Project. In addition to Somali government representatives, those consulted include AID/Washington and AID/Mogadishu personnel, major EHR donors, private sector representatives, and IEES staff.

The objective of the country workplan is to identify and justify the priority activities for IEES assistance for the coming year. The criteria used to justify an activity is its long-term congruence with the National Development Plan and with the goal of establishing self-reliant structures for EHR planning and implementation. In the short-run (an individual project year) each activity is weighed in relation to both its contribution to other planned activities and the lessons learned in earlier efforts.

The ultimate criterion for all project activities is improvement in the efficiency of resource utilization in education. This criterion will be applied at the macroeducational (national and regional planning), as well as at the microeducational (school and classroom) level. The development of local institutional capacity is a corollary criterion derived from that of increased systemic efficiency. Institutional development, per se, is not an IEES goal; however, institutional development that enhances the Somali capacity to promote increased EHR efficiency will be a major means to project success.

A critical aspect of the country workplan process is the involvement of GSDR and donor representatives in the identification of strategic opportunities and of specific activities. Every effort should be made to facilitate increased donor coordination and to increase the government's ability to manage donor assistance effectively.

Other aspects of the Somali country workplan process are as follows:

1. The plan clarifies the interrelationships among the proposed IEES activities in Somalia. This includes activities related to collaborative research, training for capacity building, networking for improved communications, and knowledge building. These proposed activities focus on the major goals of the IEES Project within an overall and integrated strategy that addresses these goals.
2. The plan focuses on the development of institutional capacities for making more efficient use of educational resources, based on

the assumption that the real value of these resources in Somalia will not increase significantly in the short-term. Any improvements in the EHR sector, therefore, are expected to be the result of improved efficiencies in use and allocation rather than from increased resources.

3. The plan defines and describes activities that address priority IEES objectives, within the context of the overall strategy that relates specific activities to IEES objectives. Thus, the activities will not represent individual or institutional interests of staff or GSDR researchers, nor will they represent any donor-specific interests. Rather, they will flow from an integrated approach to overall project goals of increasing efficiency and capacity building in Somalia.

## 1.2 THE IEES CONSORTIUM

The Improving the Efficiency of Educational Systems Project is coordinated by the Learning Systems Institute of Florida State University. Participating institutions include Howard University, the Institute for International Research, and the State University of New York at Albany. Management responsibility is vested in the Executive Management Committee consisting of the Principal Investigator, Project Director, Deputy Director (all from Florida State University), and the Institutional Coordinators from each of the participating institutions.

The resources available from the consortium are, primarily, technical assistance for planning, research, and training activities. Resources also exist for the procurement of local consultant services and for limited equipment acquisition.

The project is managed for the Agency for International Development by the cognizant technical officer in the Office of Education, Bureau for Science and Technology, Washington, D.C., in cooperation with the education officer in AID/Mogadishu. Coordination of IEES activities for the GSDR is through the Ministry of Education in cooperation with the Ministry of National Planning. Ali Hassan Gaal, Director of Planning,

Ministry of Education, currently serves as the Somali representative on the  
IEES International Steering Committee.

## 2.0 THE CONTEXT FOR IEES ACTIVITIES IN SOMALIA

This section describes the context for IEES activities in Somalia in terms of the status of and plans for the EHR system. The major sources of the information presented here are the EHR Sector Assessment (1984), the Quality Assessment Study (1985), the Transitional Strategy for Primary Education (1986), the Integrated Strategy for Primary Education (1987), and the MOE preliminary educational statistics for 1984/85.

### 2.1 HISTORICAL AND SOCIAL SETTING

Somalis share a common ethnicity and culture, characterized by a single language, adherence to the Islamic faith, and a lifestyle and values derived from nomadism. Situated in the strategic horn of Africa, Somalis have engaged for centuries in trade and exchange with the Arabian Peninsula. Climate and the unpredictable availability of water have helped create the ingenuity, drive, and pragmatism of the Somali people. The country comprises 628,000 square kilometers, mostly semi-arid, and has a 2,720 kilometer (1,700 mile) coastline, the longest in Africa. The northern part of the country is hilly, from 900 to 2,100 meters in places, while the central and southern areas are flat. Most cultivation occurs in the south between the Shebelle and Juba rivers.

While 60% of the nearly 8.5 million Somali people are nomadic or seminomadic pastoralists, it is important to note that this lifestyle pervades Somali life. Nomads and the settled population are closely linked, since most individuals living in towns and cities have immediate and extended family members living as nomads in the interior, and commonly invest with them in joint livestock herds. An estimated additional 20% of the population combine semi-pastoral livestock production with small

farming. Rough estimates place the country's total number of sheep, goats, camels, and cattle at 41 million, or about five head per capita. The country is believed to have the largest camel herd in the world, and camels have traditionally been the most prized form of wealth in Somalia. For centuries nomads engaged in a large, monetarized exchange network across the Gulf of Aden and thus developed a large remittance economy.

Although Somalis have been united ethnically, the country was not united as a single state until independence in 1960. Even then it functioned as two separate entities; one, the former Italian colony and trust territory in the south, and the other, the former British protectorate in the north. There were separate administrative, legal, education, communication, currency, and accounting systems. There was little formal economic contact between the two regions and the educated elite did not share a common language or intellectual orientation. More effective integration began to be achieved by the mid-1960s, but these two institutional legacies still influence aspects of the education and training sector, particularly regarding issues of language and civil service administration. After the new government took power in 1969, the country set upon a course of scientific socialism and proceeded with several reforms and campaigns to develop the nation's human resources. In 1972 a Latin script was chosen for the Somali language, which previously had existed only in oral form, enabling educational expansion and administrative unification. Between 1973 and 1975 massive nationwide campaigns were undertaken to instill literacy in the new Somali script. Unfortunately, the country's resources were severely strained by the extreme drought of 1974-75, renewed border conflicts in the Ogaden, political realignments, and by a lesser drought. By 1980 Somalia had 1.5 million refugees, of whom some 450,000 to 860,000

remain in various resettlement camps, assisted by the U.N. A new Somali Constitution was approved by a referendum in 1979; a National Assembly was created and members elected. The important role to be played in the national development by an emerging private commercial sector is being recognized.

## 2.2 FISCAL AND MANAGEMENT CAPACITY

The statistics of the formal economy suggest that Somalis are among the world's poorest people, with annual per capita earnings of \$190. However, the effects of the nonmonetary trading sector, the monetary but unmeasured commercial sector, and the earnings remissions by Somalis working abroad, all have led to a higher standard of living than the nominal figures indicate. Since GDP measures only the monetary and easily measured economic activity that takes place within Somalia, it underestimates the country's true economic condition.

Eight major issues concern the Somali economy:

1. external dependence--upon relatively inelastic demand for its exports, for food imports, for development assistance;
2. internal disincentives--manifest in the lack of capital for private investment, restraints on permits and licenses, and a largely undifferentiated pay system for public employment, all of which contribute to a "brain drain;"
3. potential overutilization of rangeland;
4. underexploitation of farming, forestry, and fishing;
5. environmental fragility;
6. the role of the private sector--and how to develop a more mixed public/private system within the precepts of scientific socialism;
7. the planning of development projects in terms of the recurrent cost implications of ongoing and completed projects; and
8. the planning of human resource development--divisible into considerations of management, quality, and quantity.

The essential characteristic of the Somali economy is the potential for economic variability. While government cannot adequately control some determinants of economic performance (i.e., external dependence and environmental fragility), its challenge is to structure a supportive administrative base, with a clear and positive incentive system, and to incorporate adaptive planning at both the macroeconomic and subsector levels.

At the time of the EHR Assessment, the GSDR identified the shortage of skilled labor and personnel with technical and managerial skills as the major constraint impeding progress in most sectors. The skill level of teachers together with the lack of instructional support materials in the schools remains a specific constraint in the education and training sector. These constraints are compounded by limited financial resources, an inadequate system of wage incentives, inadequacies in organizational infrastructure, problems associated with language fragmentation, and lack of equipment, spare parts, and proper maintenance. While these constraints persist, a number of steps have been taken to reduce their impact.

The major constraints on efficient administration emerge from three sources. The first is lack of adequate managerial training among individuals in the public and private sectors. The SOMTAD project which started in July 1987 is designed to address this constraint.

The second source is the incentive system within which the manager operates. The recruitment, promotion, and salary systems (despite the recent increase in civil service salaries) of the public sector are not sufficiently related to a merit or performance basis. This often results in lack of explicit goal definitions for managerial units, unclear criteria

against which performance may be assessed, and less than optimal effort invested by mid-level staff in their managerial tasks.

The GSDR Annual Development Plan for 1987 describes the new increase in civil service salaries as the first "modest step" toward the implementation of the salary reforms recommended in the Civil Service Study. Other recommendations including the abolition of guaranteed employment for secondary graduates and the retrenchment of approximately 3,000 civil servants have already been implemented.

For primary teachers whose average monthly wages are So. Sh. 643, the salary increase will be in the range of 40% of base salary. If, in fact, inflation is reduced from the 1986 rate of 36% to the targeted 20% and no new taxes are introduced during the Plan period, the real increase in earnings will be somewhat higher. As salaries approach the true cost-of-living, government reluctance to impose performance criteria for permanency and promotion is likely to lessen.

The third source of constraint on management identified in the EHR Assessment was the low level of information technology. The use of low-cost, high capacity microprocessing equipment was recommended to alleviate this constraint. The Ministry of Education has made substantial progress in this regard. Two computers have been installed in the Planning Department and newly trained personnel have computerized almost twenty years of data on the numbers of schools, enrollments, and teachers. The Planning Department is participating in a cross-national study on the collection of reliable and valid data on schools, enrollments, and teachers for policy making. Outstanding needs within the Ministry are the computerization of teachers records, financial accounts, and National Examination results. Up-to-date information on serving teachers is needed to adjust the intake

for teacher training to the needs of the school system, as well as ensure that individuals assigned to districts are actually serving. With respect to the financial accounts, it is not now possible to estimate MOE expenditures by level and category. Increased capacity in this area is a necessary prerequisite to efficient allocation of resources. Similarly, information on the results of the National Examination by subject is necessary for better targeting inservice training resources.

The fourth constraint identified in the EHR Assessment, language fragmentation within the educational and training sector, has not yet been addressed. Yet the lack of a coherent, long-term language policy places great strain on human, financial and material resources. While Koranic education uses Arabic, primary and general secondary schools use the Somali language. Most vocational and technical education is conducted in English. The majority of the faculties of the National University use Italian as the medium of instruction. However, Lafoole College of Education, which prepares secondary teachers who will work in Somali, uses English. This complex pattern of language use results in a loss of learning time, poorer levels of achievement, and increased expense because of the periodic need for students to develop new language skills prior to successive levels of education or training. The language situation also results in instructional inefficiency from lack of language fluency, a weak fit between language of instruction and further work or study, and the limited availability of means for teaching the various languages.

The fiscal and management capacity analyses in the 1983 EHR Assessment concluded that despite serious financial and administrative constraints Somalia had an opportunity to realize quality improvements in education between 1985 and 1990 because of the temporary decline in social demand for

schooling. Since the EHR Sector Assessment analysis was conducted, however, the economy of Somalia has suffered a significant number of external and internal setbacks.

Even though the Annual Development Plan for 1987 envisages a recovering economy (and projects an overall economic growth rate of 5% based on substantial increases in the non-agricultural productive sector) the government will remain under a heavy burden to meet current operating expenses. The growth in the operations deficit from just under -4 billion Somali Shillings in 1986 (revised estimate) to -4.1 billion reflects the increase in civil service salaries. Despite, however, the projected 21% increase in the operations deficit, the estimated 1987 deficit as a percentage of the GDP shows a small decline, continuing the downward trend begun in 1985. However, the deficit combined with heavy debt obligations leaves the government with little leeway to implement the full range of civil service and other reforms required by the modern sector economy.

Thus, the Somali economy, will, if Annual Development Plan goals are met, be in an improving but still fragile condition. The fiscal implications of the past three years' economic changes have been to weaken the financial and administrative context within which the educational system must operate. The Ministry of Education's share of the ordinary (recurrent) budget has declined from 8% to 3.9% of the total budget since 1986. A similar decrease has been realized in the capital/development (PIP) budget, with less actually expended each year than allocated. The combination of these decreases with high rates of inflation (1984, 94%; 1985, 37%; 1986, 36%) has meant that teachers have been forced either to abandon their duties or slight them in favor of other income-generating activities and school reconstruction projects postponed. The new community

contributions to schooling will only partially offset this loss. Such contributions can be expected to vary widely with the ability of the community to financially support schooling; a characteristic which, in turn, will vary with such things as national economic performance and local weather.

In primary education the effects of underinvestment have been manifested in the form of increasing difficulty in recruiting candidates for teacher training, significant teacher absenteeism, reduced teacher morale and motivation, and school abandonment. Furthermore, these conditions, in an already deprived primary subsector have led to increased student and parental rejection of the schooling. The dramatic evidence of this lies in the record of declining primary enrollments over the past seven years and the increasing evidence of the impact of the deterioration of the primary subsector on subsequent levels of schooling.

With government's resources allocated to system maintenance, quality improvement, and extended access, particularly at the primary school level, there will be few if any new funds available for EHR development activities. The debt service problem of government is also a constraint in that it would be ill advised to finance EHR development programs through conventional loans. This means that donors will have to provide concessionary loans or grants to cover the capital and initial operating expenditures of EHR projects. Government will have to weigh carefully the benefits of development projects against their effects on recurrent costs after the development project has ended.

The opportunities of the Ministry have been further constrained by decisions made by USAID and the World Bank in 1986 to postpone major project support for the education sector. These decisions were prompted by

the current financial constraints faced by at least one of these agencies but also appear to reflect an uncertainty concerning the potential effectiveness of investments in Somalia's human resources development program.

In the short run, the MOE can do little to affect the financial and administrative context for schooling. The increase in civil service salaries scheduled for January, the strong encouragement for local initiatives, and the efforts underway to plan long-term improvement strategies in the light of these fiscal realities are, however, important steps toward halting the decline of schooling and renewing both public and donor confidence in education.

### 2.3 NATIONAL GOALS, DEVELOPMENT PRIORITIES, AND EHR IMPLEMENTATION STRATEGIES

1987 marks the first year of the GSDR Five Year Plan 1987-1991. The new plan is presently under revision. The national objectives reflected in the Annual Development Plan 1987 are as follows:

- a. To raise the standard of living of all people;
- b. To diversify production and promote employment through the active participation of the private sector; and
- c. To promote social justice.

To help support the broad national goals, the Ministry of Education has set the following development objectives for primary, secondary, and vocational/technical schooling during the Five Year Plan period.

- a. To make education available to all and to provide the tools of literacy and numeracy skills for the economic and social development of the nation and the individual;
- b. To meet the demand for skilled manpower;
- c. To improve the quality of education; and
- d. To strengthen the teaching of the Arabic language.

Among the specific targets proposed by 1991 are:

- a. Expansion of the World Food Programme to include 210,000 primary school children and their teachers.
- b. Construction of 30 primary teacher houses per year in rural districts.
- c. Creation of a three year secondary equivalency inservice program for primary teachers with residential and distant learning components. Teachers successfully completing the program will receive the same salary as a secondary graduate primary teacher - B/8 level. A total of 8,000 teachers are scheduled to be trained over the plan period.
- d. Decentralization of preservice teacher training through the establishment of four new regional centers.
- e. Increased intake in primary schools by 7,000 students by 1991 and construction of 1,865 new classrooms and assignment 5,430 new teachers to accommodate the increased numbers.
- f. Increased yearly output of secondary schools by 1,320 students.
- g. Construction of additional classrooms for up to 33 new secondary streams.
- h. Renovation or construction of libraries and science laboratories at all secondary schools.
- i. Renovation of existing and construction of two new vocational schools and two new Maritime Institutes.

While efforts are underway to meet the specific objectives of the Five Year Plan, particularly with respect to the decentralization of teacher training, it seems unlikely that the resources necessary to reverse enrollments and enhance school quality can be made available under the current budgetary constraints.

#### 2.4 OVERVIEW OF THE PRIMARY AND PRIMARY TEACHER TRAINING SUBSECTORS

A detailed review of the EHR subsectors was presented in the EHR Sector Assessment and a statistical update provided in the Quality Enhancement Study. Since the Integrated Strategy is designed to improve

the quality of primary schooling, the analysis in this section is limited to primary schooling and primary teacher training.

#### 2.4.1 Primary Education

The eight-year primary education system in Somalia is divided, for statistical purposes, into a four-year elementary cycle and a four-year intermediate cycle. In practice, however, elementary and intermediate grades are frequently located at the same site and teachers and materials shared among grades. An estimated 14% of 6 to 13 age cohort currently enroll in school. Only 29 of every 100 students who enrolled in grade 1 in 1980/81 or 1981/82 were enrolled in grade 8 in 1984/85. Unfortunately, no estimates are available on the average daily attendance of the students enrolled.

The numbers of schools, students, and teachers in the elementary and intermediate subsystems in 1984/85 are shown in Tables 2.1 and 2.2. The change in the numbers of schools, classes, students, total teachers, and women teachers from 1982/83, the data used in the Quality Enhancement Study, is displayed in brackets. The number of teachers per class in 1982/83, rather than the change in the numbers of teachers per class is shown for ease of interpretation.

Table 2.1 indicates that over the two year interval, 43 schools closed and 117,768 (8%) fewer children attended elementary school. This decline continues the trend first evident in 1981/82. The highest percentage losses in enrollments over the period were in Bakool (-37%), Bari (-24%), and Banaadir, the Capital region (-21%). Sanaag (+57%) and Nugaal (+30%) had the highest percentage gains in enrollments.

Statistical data on the enrollments of girls (not shown) indicate a increase of about 2% (to 37% of total enrollments) over the time period,

TABLE 2.1

## ELEMENTARY SCHOOL CHARACTERISTICS

1984/5 Compared to (1982/3)

Region	Schools	Classes	Students	Teachers	Women Teachers	Teachers Per Class
Awdal*	25	167	5943	203	92	1.22
Galbeed	49 (-16)	413 (-33)	18527 (-1881)	424 (-176)	189 (+133)	1.03 (1.31)
Togheer	30 (-3)	114 (+7)	2799 (-240)	131 (+1)	61 (+27)	1.15 (1.21)
Sanaag	27 (+3)	85 (+4)	1779 (+199)	71 (+12)	32 (+26)	.84 (.73)
Bari	29 (-4)	100 (-22)	1468 (-428)	94 (+7)	44 (+11)	.94 (.71)
Sool*	8	23	503	22	11	.96
Nugaal	11 (+2)	38 (+17)	921 (+334)	23 (-6)	12 (+11)	.61 (1.16)
Mudug	18 (+1)	50 (+2)	877 (+92)	47 (-5)	31 (+4)	.94 (1.08)
Gaduud	20 (-3)	56 (-13)	1217 (-79)	65 (-17)	50 (+13)	1.16 (1.19)
Hiiraan	47 (-2)	301 (-54)	9103 (-1211)	464 (+28)	208 (+81)	1.54 (1.23)
Sh/Dhexe	59 (+1)	226 (-2)	4503 (-533)	196 (-15)	146 (+90)	.87 (.93)
Baraadir	52 (0)	601 (-79)	29115 (-4024)	1436 (+276)	1305 (+219)	2.39 (1.71)
Sh/Hoose	113 (-8)	541 (-34)	15841 (-789)	628 (-33)	311 (+77)	1.16 (1.15)
Bay	44 (-2)	154 (-13)	4367 (-156)	204 (-14)	125 (+58)	1.32 (1.31)
Bakool	13 (-1)	44 (-5)	837 (-253)	39 (-20)	30 (+10)	.89 (1.20)
Gedo	27 (-4)	288 (-78)	10897 (-2033)	321 (-120)	107 (+29)	1.11 (1.20)
J/Dhexe	48 (-5)	145 (-16)	3097 (-475)	105 (0)	35 (+13)	.72 (.65)
J/Hoose	50 (-2)	217 (-9)	5974 (-252)	259 (+10)	136 (+65)	1.19 (1.10)
Total	670 (-43)	3563 (-328)	117768 (-11769)	4732 (-72)	2925 (+867)	1.33 (1.23)

\* Regions that have been created since 1982/3.  
In order not to overestimate the changes in Galbeed and Nugaal, it was assumed that the schools and teachers now in Awdal and Sool came from these regions respectively.

Source: Ministry of Education, Planning Department.

while that of boys declined by about 2%. Government reports indicate that the enrollment of girls is highly associated with urban residence.

Despite the decrease in the number of teachers, the number of teachers per forty students, the MOE recommended class size has increased to an average of 1.33 teachers per class from an average 1.23. The data indicate that this reduction in efficiency is largely due to the poor distribution of teachers. Banaadir has 2.39 teachers for every class, while many more rural regions averaged fewer than one teacher per class.

The data on numbers of teachers and numbers of women teachers in 1984/85 compared with 1982/83 indicate a high rate of male turnover in the system. While in 1984/85 there were only 72 fewer teachers in the system, there was a gain of 867 women teachers. Elementary teaching is apparently rapidly becoming the female-dominated profession that it is in other countries, due to the generally lower opportunity costs for women for primary teaching.

Comparable statistics for intermediate schooling are shown in Table 2.2. The number of intermediate schools closed is somewhat smaller than at the elementary level indicating that some of the elementary schools which closed were not located at a site which also had intermediate grades. Although, the overall trend in enrollments is positive, with Gedo (56%) and Galbeed (46%) showing the largest percentage increases, inspection of enrollments by grade (data not shown) reveals that there were 5,629 fewer students in grade 5 in 1984/85 than in 1982/83, an 18% decrease. Enrollments in grades 6 and 7 were consistently higher but grade 8 enrollments were again lower, suggesting an improvement in retention through grade 7. The reduction in enrollments in grade 8 might reflect

TABLE 2.2

## INTERMEDIATE SCHOOL CHARACTERISTICS

1984/5 Compared to 1985/6

Region	Schools	Classes	Students	Teachers	Teachers	Per Class
Awdal*	19	36	2136	95	31	2.64
Galbeed	42 ( +2)	87 (-113)	10408 (+3956)	401 (+115)	63 ( +52)	4.61 (1.61)
Togheer	20 ( -2)	27 ( -65)	2500 ( -428)	167 ( +30)	44 ( +31)	6.19 (1.49)
Sanaag	18 ( -3)	15 ( -52)	1296 ( -260)	79 ( +7)	14 ( +11)	5.27 (1.07)
Bari	29 ( -1)	27 ( -58)	1523 ( +99)	126 ( +18)	30 ( +17)	4.67 (1.27)
Sool*	8	4	476	29	6	7.25
Nugaal	8 ( -1)	3 ( -47)	650 ( -466)	40 ( 0)	13 ( +11)	13.33 (1.28)
Mudug	16 ( +2)	10 ( -31)	845 ( -25)	60 ( -1)	25 ( +15)	6 (1.49)
Gaduud	21 ( 0)	12 ( -53)	1230 ( -239)	100 ( -14)	46 ( +33)	8.33 (1.75)
Hiiraan	39 ( +1)	54 (-113)	5727 ( +421)	605 (+288)	132 ( +99)	11.20 (1.90)
Sh/Dhexe	56 ( +1)	56 (-146)	3819 ( -516)	269 ( +34)	69 ( +25)	4.80 (1.16)
Banaadir	53 ( -2)	196 (-529)	36231 (+2042)	1846 ( +59)	1099 (+370)	9.42 (2.46)
Sh/Hoose	93 (-15)	108 (-391)	10096 (-3561)	626 (-186)	180 ( +54)	5.80 (1.63)
Bay	39 ( -4)	37 ( -109)	3881 ( +80)	257 ( +5)	70 ( +23)	6.95 (1.73)
Bakool	10 ( -8)	10 ( -43)	851 ( -140)	59 ( -30)	18 ( +5)	5.90 (1.68)
Gedo	24 ( -2)	43 ( -39)	3218 (+1152)	171 ( +11)	32 ( +9)	3.98 (1.95)
J/Dhexe	37 ( -5)	28 ( -87)	1721 ( -644)	110 ( -48)	20 ( +9)	3.93 (1.37)
J/Hoose	51 ( 0)	53 (-139)	4932 ( -48)	312 ( -33)	74 ( +32)	5.89 (1.80)
Total	583 (-37)	806 (-2015)	89404 (+1423)	5352 (+255)	1966 (+796)	6.64 (1.81)

\* Regions that have been created since 1982/3.

In order not to overestimate the changes in Galbeed and Nugaal, it was assumed that the schools and teachers now in Awdal and Sool came from these regions respectively.

Source: Ministry of Education, Planning Department.

that fewer students than previously are willing to repeat the grade in hope of gaining entrance to the secondary level. The proportion of female enrollments at the intermediate level has remained almost constant at 35% to 36%. Again the attendance of girls at this level is strongly associated with residence in an urban area.

Despite the fact that few if any additional teachers would be needed to serve the increased numbers of students in 1984/85, the numbers of teachers increased in almost all regions and the average number of teachers per class leapt from 1.81 to 6.64. Although some of these teachers may be part-time or also teach elementary grades, the numbers of teachers per class at both elementary and intermediate levels indicate over-assignment to schools, particularly in some regions.

More detailed information on the status of teachers (active, inactive; part-time, full-time) is necessary for improved allocation of teachers, as well as for justifying each year's intake into primary teacher training. The trend toward increased percentages of women teachers is also evident on the intermediate level. Over the two year period, women teachers increased by 68%.

The causes of the decline in the primary subsector are attributed to a decrease in parental demand for schooling stemming from the abolition of guaranteed employment of secondary graduates in 1984 and to poor teacher attendance at school. The independent effects of these factors are not known. Poor teacher attendance is explained, in turn, by salaries well below the cost-of-living.

To address these problems, government increased primary teacher salaries in 1987 by an estimated 40%. Acknowledging that the new monthly salaries (So. Sh. 956) were still inadequate for subsistence, the Ministry

of Education acceded to the request by local communities to charge tuition. Although each community council will set its own fee structure, guidelines suggest a tuition of 60 shillings per month for each primary student. Sixty percent of tuition will be used to top up teacher salaries, 20% for administrative salaries, and 20% for school maintenance and rehabilitation. However, assuming, that subsistence for a single person requires a minimum of So. Sh. 250 per day, a teacher with a class of forty students will only earn an additional So. Sh. 1440 per month for a total salary of So. Sh. 2396 or 30% of the cost-of-living.

Other incentives planned by the MOE include the provision of housing in rural areas and the provision of at least one meal a day for teachers through the World Food Programme. These latter incentives will, however, take some time to fully implement.

Second in importance only to teacher attendance is the issue of the production and distribution of textbooks, teacher guides, and basic supplies. While the Curriculum Development Center (CDC) has developed the new texts for the elementary cycle, only the grade 1 texts have been printed. It is estimated that production of textbooks for all levels is roughly .5 million per annum, while the estimated annual need for textbooks at the primary level alone is 3.6 million. Distribution has been an equally great problem - not only distribution from Mogadishu to the regions but from the regional offices to district offices and from there to schools. As a result only schools in the Capital region and regions where major donor agencies work are likely to have textbooks.

Distribution of the new textbooks and the accompanying programmed teacher guides are particularly important since most teachers are only primary graduates with one or two years of teacher training and little

instructional supervision. Further, the emphasis of their training was on secondary subjects rather than the primary curriculum.

#### 2.4.2 Primary Teacher Training

Traditionally, primary teacher training has consisted of one or two years of preservice training for primary graduates. The major recruitment incentive was that graduates of the PTTI after serving in the schools for three years could sit for an entrance examination to the LaFoole College of Education.

In 1984/85, concern about the quality of instruction in primary schools led to government's decision to recruit only secondary graduates for primary teaching. This decision unfortunately came at a time when high inflation rates had so eroded civil service salaries that the recruitment incentives had lost their ability to attract primary graduates. Enrollments in the PTTI at Halane in 1983/84 had decreased by 59% relative to enrollments in 1981/82.

Although secondary graduates are promised both higher starting salaries and admission to LaFoole without sitting for an examination, given good marks at the PTTI and a good service record, recruitment has not been successful. The scheduled opening of the new PTTI in Hargeisa, the first of five new regional training centers, was delayed and then indefinitely postponed due to lack of sufficient numbers of applicants. In fact, no new primary teachers have been sent to the field since 1984/85. The school closings, the decline in primary enrollments, and the current number of teachers per class suggests, however, that there will not be a shortage of teachers for some time.

Concurrent with the decision to upgrade the qualifications of entrants to primary teaching was the decision to systematically improve the

qualifications of the primary teachers (primary graduates) now serving. The new inservice program is scheduled to begin this summer. When fully operational some 1,000 teachers will be served per year. The program, which consists of summer residential and school year distance education components, will provide secondary equivalency, while also emphasizing primary subject matter competence.

In summary, important steps have been taken to deal with the deficits of the primary subsector. The increasing scarcity of resources available to the Ministry of Education impose, however, a substantial barrier to the infrastructure development identified as the long-term solution to problems of school quality; a fact which lends particular saliency to the MOE commitment to an integrated and immediate approach to primary school improvement.

### 3.0 CURRENT AND PLANNED DONOR ACTIVITIES

One goal of the IEES program in Somalia is to encourage donor cooperation and coordination, both in planning of IEES Project activities and in our technical assistance work in the Ministry of Education.

In the past, donor activity in the EHR sector in Somalia was characterized by only a small number of major projects, but a large number of small scale and relatively uncoordinated projects. One positive outcome of the crisis in primary schooling and the curtailment of new efforts by the World Bank in the education sector has been the increase in donor collaboration. The new Action Plan for the World Bank, for instance, was developed collaboratively by MOE, World Bank, IEES, and UNICEF personnel and builds on the Integrated Strategy. It is hoped that this type of collaboration can be sustained and further developed.

This section identifies the principal donors and their current and planned activities in the EHR sector.

World Bank. The IDA Fourth Education Project (1981-1986) has been extended to March 1988 to complete specific tasks. In the Spring of 1986, the World Bank declined a Fifth Project due, in part, to the fact that the project outlined did not address critical sector issues and, in part, to government's own relatively low investment in the sector. Subsequent dialogue between Bank and MOE officials, the salary increase for the Civil Service, and new community initiatives in school funding, resulted in an invitation to submit an "Action Paper." If approved, the Action Paper would result in a full proposal for a new loan. The IEES Project has offered assistance to the MOE and resident World Bank personnel in the development of such a proposal.

The Action Plan represents a unified approach to quality enhancement in the primary subsector much like the Integrated Strategy. Project funds would be used to ensure selected schools received all necessary resources and to adjust for urban/rural differences in the ability of communities to support teachers and schools. In addition, the equivalent of a hardship allowance would be given to rural teachers. The package of teacher incentives would include adequate salary, rural bonus, food assistance, and availability of training opportunities. A decentralized monitoring system would be established (see Annex 4).

UNICEF. UNICEF provides major assistance to the MOE in support of inservice teacher training, materials development and production at the CDC, and research in the Planning Department. In addition, kits of materials and equipment have been provided to all primary schools in six regions. UNICEF also supports staff development for rural literacy programs.

UNICEF's new Country Program will emphasize primary education, and within primary education will allocate resources so as to promote a regional integrated strategy modeled on its efforts in the primary health care sector. Schooling will be treated as one facet of community development and explicitly linked with Koranic schooling, economic activities, and health care. Within this schema, support will be provided for regional primary teacher training and the promotion of literacy. Funds for the central level will be targeted on improvement of planning and increased monitoring of the implementation of the New Reform Curriculum. The World Bank Action Plan envisages a major role for UNICEF in the implementation of an integrated strategy for the quality enhancement of primary schooling.

British Council. Through the KELT English Language Project, the British Council provides technical assistance for developing English texts for primary grades, for training CDC personnel in the writing of such texts, for teacher inservice training in the teaching of English (primary through secondary), and for the distribution of textbooks within regions.

DANITA. DANITA provides one full-time technical advisor and short-term technical consultants to the Curriculum Development Center.

Egyptian Government. The Egyptian Government provides 200 teachers in Islamic Studies and 100 Arabic language teachers for the four Arabic language secondary schools and the general secondary schools. The Egyptian School, open to all, serves some 900 primary and secondary students.

UNDP. UNDP funds several initiatives in Education. Project Pipeline provides support for technical education curriculum development and inservice training. Through the Women's Education Development Program, funds are provided for the development and production of instructional materials for use in Family Centres and for practical skill training for girls in rural areas. Assistance is also given for population education in schools.

World Food Programme. The WFP assists the MOE with a food distribution program. Originally, limited to secondary schools, the Five Year Plan 1987 - 1991 indicates an expansion of service to some 210,000 primary students and their teachers.

UNFPA. UNFPA provides funds to the MOE to support the planning, implementing, monitoring, and evaluation of population education programs in schools.

USAID. In addition to IEES which is a centrally supported USAID Project, USAID supports three other education and training projects (one in the planning stage) in Somalia. The USAID Family Health/Family Planning

Project supports curriculum development in health related areas. The project currently provides six person months per year in technical assistance to the CDC.

In addition, USAID is the coordinating and funding agency for the U.S. in the bilateral GSDR/US Somali Training and Development Project. Designed in response to issues raised in the EHR Sector Assessment and Civil Service Study, the SOMTAD Project is intended to address the human resources and institutional development constraints in Somalia. The five year project is the first phase in a multi-phase effort at improving management capacity in both the public and private sectors. To meet its objectives the project will provide long-term technical assistants to work with top level administrators in selected ministries, offer master's level programs in business and public administration for middle level managers in civilian ministries, and offer short-term management training courses to personnel in those ministries.

USAID is also developing a project to improve the quality of primary schooling in Somalia. Project INSTRUCT (Instructional Radio for Children and Teachers) is designed to test the applicability of interactive instructional radio for teaching basic numeracy and literacy skills to out-of-school youth. During Phase 1 of the project, the Grade 1 Mathematics New Reform Curriculum will be adapted for radio. In cooperation with Radio Mogadishu, the radio mathematics lessons will be recorded and broadcast. The broadcasts will be monitored in a variety of settings - Koranic schools, learning groups created through the existing rural networks, and some formal schools. The observations of the reception of the lessons will provide the feedback necessary for revising past lessons and informing the design of future lessons. Radio lessons will be completed for Grades 1-3

mathematics and Somali, as well as adapted for adults during Phase 2 and 3. The project may explore the use of radio for the distance education component of the inservice primary teacher training program.

#### 4.0 RATIONALE FOR IEES ACTIVITIES IN SOMALIA

The rationale for IEES activities in Somalia is derived from the constraints and opportunities for development of the EHR sector identified in the sector and subsector research undertaken collaboratively by MOE and IEES personnel. Choice of target opportunities for IEES involvement in the EHR sector led, in turn, to the development of a strategy for IEES involvement. The target opportunities identified and the strategy are described in the next sections.

##### 4.1 TARGET OPPORTUNITIES

The rationale for the IEES activities undertaken in Somalia is derived from the conclusions and recommendations of the research carried out for EHR Sector Assessment (1983) and later reinforced by the findings of the Civil Service Study (1984), the Quality Enhancement Study (1985), the Materials Distribution Study (1986), the Teacher Incentive Study (1986), the Transitional Strategy - later renamed the Integrated Strategy (August 1986) and the Integrated Strategy for Primary Education Improvement (January 1986). In identifying the constraints to EHR sector improvement in Somalia, the studies also pointed clearly to opportunities where IEES assistance would maximize the return to government's own investments in the EHR sector. The areas of opportunity identified are as follows:

1. Improved management capacity;
2. Improved resource allocation procedures; and
3. Quality enhancement at all levels of educational system, but particularly at the primary and the secondary levels.

Each of these is discussed in turn.

## 1. Improved Management Capacity

The EHR Sector Assessment and the School Quality Enhancement Study concluded that the management problems experienced by the MOE stem from at least four sources: (a) the rapid growth of the education system; (b) poor transportation and communications infrastructures which make it difficult and, at times impossible, to supply schools and communicate with regional and district offices; (c) insufficient management training of Ministry personnel; and (d) the lack of reliable information on which to base decisions.

The MOE is the largest civilian ministry in Somalia, employing nearly half of all civil servants. The rapid growth of the Ministry, from 2,900 employees in 1969 to 22,650 in 1983, resulted in the promotion of individuals with little or no management training into administrative positions of considerable responsibility at all levels of the educational system. This lack of trained administrators inhibited the development of an effective management system within the Ministry even as the rapid growth of the system posed more complex problems of coordination and information flow.

The need for development of more effective management structures has long been recognized by the leadership within the Ministry. The major impediments to the development of such a system have been; (a) the lack of reliable, current, and appropriate data on current and projected enrollments, the quantity and quality of teachers actively serving, and material resources, and (b) the scarcity of personnel trained in the appropriate types of analysis to assist in the formulation and evaluation of policy alternatives.

While substantial progress has been made during the past three years in reducing the constraints on effective management, particularly in

planning and evaluation, at the central level, a scarcity of trained individuals continues. Scarcity carries with it the danger that critical skills will be lost if trained personnel choose to leave the Ministry.

## 2. Improved Resource Allocation

Reduction of the constraints governing the development of an effective management system is a necessary first step in improved resource allocation procedures. Improvement in resource allocation procedures is particularly critical given the continued economic environment for education. Improvements are needed in financial accounting, analysis, budgeting, and projection.

## 3. Quality Enhancement of Primary Schooling

The continued decline in the demand for schooling, particularly primary schooling, regardless of its causes, provides the opportunity for quality improvement that was not possible when the educational system was larger. Quality enhancement of primary schooling is critical because it is the only schooling most of the population will receive and because it is a determinant of later academic achievement, labor productivity, and improved family health and nutrition.

The IEES focus on improved management capacity, improved resource allocation procedures, and quality enhancement of primary education are consistent with the priorities of the MOE and complementary to those of other donors.

## 4.2 THE IEES STRATEGY

The strategy of the IEES Project in Somalia was developed following the EHR assessment and still governs all IEES project planning. The

logical sequence, but simultaneous activities may occur in more than one phase. Common to all three phases is the emphasis on needs assessment and evaluation. Needs assessment and evaluation activities are designed to; (a) ensure congruence between MOE and IEES objectives, and (b) efficient use of scarce project funds.

Phase 1 of the strategy consists of intensive training activities intended to strengthen the institutional capacity of the central administrative units of the MOE, particularly educational planning and evaluation. In Phase 2 of the project, the emphasis remains on institutional development but shifts from formal training to collaborative planning, research development, and project design and implementation.

Based on the results of Phase 2 activities, IEES assists, as deemed appropriate by the MOE, in the implementation of projects and other planned modifications to the educational system. In Phase 3, the focus of activity is on the school and the classroom. Activities are undertaken to improve MOE ability to affect the internal utilization of resources and the external relevance of the educational product. Examples of the areas for Phase 3 involvement are inservice training, curriculum and instructional materials development, dissemination and utilization of materials, and the examination of alternative instructional methodologies such as programmed teaching.

Activities to build institutional capacity and to improve efficiency overlap in the IEES Country Plan. Most activities contribute to both, though with different emphasis at different points in the project. Training activities are intended to improve capabilities of individuals. As sufficient numbers of individuals within a department or unit are trained and organized in an effective management system, the cumulative

impact will be one of increased institutional capacity. Improved efficiency will be achieved as new systems and programs that draw on the skills of these individuals are designed and implemented.

## 5.0 REVIEW OF YEAR THREE ACTIVITIES

This section reviews the IEES Project Year Three activities (June 1986-June 1987) as they were planned to occur and as they actually did occur during Year Three of the Project. The primary differences between the planned and actual activities were as follows: (a) a shifting in responsibility from short-term technical assistance; and (b) a redirection of activities due to change in MOE preferences and needs.

### 1. Policy Analysis Workshops 1 & 2 (2 pm STTA; 1 pm, RTA)

Policy Analysis Workshops were held in July 1986 and April 1987. The first workshop for Department of Planning personnel dealt with issues related to educational management and planning. During the course of the workshop a separate seminar was held for Directors General. The seminar provided an introduction to the computer and to ways in which the computer could be used to address policy issues related to each of their directorates.

The second workshop focused on advanced statistical analysis and, at the request of Planning Department personnel, on programming in BASIC.

### 2. Computer Applications Workshop (1 pm, RTA)

The introductory computer workshop offered in project years one and two was repeated twice for MOE personnel who had not participated in the earlier workshops. Under the general guidance of the RTA, the training was provided by Planning Department personnel.

### 3. Workshop on the Preparation of Donor Assistance Proposals (1 pm, RTA)

The donor proposal workshop for Department heads was scheduled to coincide with the arrival of a four person IEES team in Somalia. Team members as well as the RTA and an educational planner from the Ministry of

National Planning led discussion sections. Each discussion leader addressed one part of the proposal process; the rationale for the proposal, the background of the issues addressed, the social and economic environment for project activities, management structure, implementation plan, and budgeting. The representative from National Planning detailed the project cycle.

4. Improving the Efficiency of Primary Education: Project Implementation Design (PID) Activity (2 pm STTA; 1/2pm, RTA).

IEES personal assisted the USAID Mission and the MOE in the initial planning for a possible project directed toward improving the efficiency of primary education. The proposal had two major components; (a) programmatic support for improved educational planning and management, particularly in such areas as localization of school financing, improved pre- and inservice teacher training; (b) and educational materials production and distribution; and support for the implementation of educational radio designed to assist the introduction of the New Reformed curriculum. The proposal was not funded during Project Year 3. Partial funding for the radio project, Instruct, is being sought through the DDD CIPL program.

5. Design of an Educational Materials Distribution System (1 pm, RTA; 2 pm, STTA)

Prior to the start of this activity, the RTA held a materials distribution workshop for Ministry officials and donor representatives. The outcome of the workshop was a tentative plan for a new distribution system and a listing of salient issues to be explored further by the short term technical assistant. The STTA study led to specific recommendations for the distribution of materials. These included delivery of texts directly to district education offices and the provision of class sets

rather than individual student sets to reduce transportation requirements and the recurrent costs of printing. These recommendations were later adopted in the Integrated Study and in the World Bank Action Plan.

6. Assistance in the Planning and Development of Coordinated Donor Support (5 pm STTA, 3 1/2 pm RTA)

This activity was designed to provide support to the MOE in the preparation of the Fifth IDA Education Loan proposal. Fewer person months were needed than planned. Shortly after the arrival of the four person team in Somalia, the MOE received word from the World Bank that its preliminary proposal outline had not been accepted and that a full proposal would not be received at that time.

In response to the impending crisis in resource allocation implied by the loss of the expected loan, the IEES team worked with the MOE to develop a transitional strategy for the improvement of schooling. The strategy was designed to ensure that the inputs for schooling (inservice training, textbooks, supervision) already available through the Ministry reached the schools and to minimize dependency on donors for these necessities.

7. The Teacher Incentive Study (4 pm, STTA; 1 pm, RTA)

MOE participation in the cross-national Policy Research Initiative on Teacher Incentives altered the approach to this field-based research activity. A preliminary background paper on Teacher Incentives was written in August. The paper summarized the status of teacher incentives, outlined criteria for the evaluation of individual incentives and incentive systems, and pointed out the inherent conflict between the current incentives for recruitment of teachers and those for retention.

Shortly after the paper was written, the locus of responsibility for the field-based study was shifted from IEES technical personnel to the MOE,

where the Director General of Educational Development was appointed Country Team Leader.

8. Formative Evaluation of Instructional Materials  
(1 pm, STTA)

Originally an activity designed to assist the CDC in formulating a strategy for formative evaluation and revision of instructional materials, the pressing need of the Teacher Training Department for support in developing a curriculum for inservice training caused a shift in focus. Assistance to the CDC has been reinstated in the proposed activities for the coming year.

9. Completion of the Somali Language Dictionary of Technical Terms in Economics (1/2 pm, RTA)

The project resources allocated to this activity were greater than originally planned. The rough draft of the dictionary was reviewed by Somali experts last August and additional terms added. The final version of the dictionary has now been printed and serves as a major resource to government ministries and to the SOMTAD project.

10. Resident Technical Advisor (12 pm)

Mark Berger completed his second and final year as resident technical advisor. Berger supported and provided direction to all IEES personnel coming to Somalia; actively served as a full member of all IEES teams; provided ongoing assistance to the Directorate for Educational Development, and in particular, the Planning Department; assisted the MOE in planning and coordinating donor assistance; served as a liaison between the project and USAID/Somalia, the World Bank, UNICEF, and other donors; and provided assistance to USAID/Somalia personnel, as requested. His ongoing work in

improving management capacity was recognized by the award of a CIPL grant for 2.9 million shillings for Institutional Development at the Ministry of Education. These funds will be used for training workshops, one of which has been completed, and purchase of equipment for the Ministry of Education. The workshops will be conducted by MOE personnel with assistance from the RTA (see Year Four Activities).

The proposed activities for Year Four described in the next section are intended to build on the Year Three activities. During the middle of Year Three, the responsibility for training and research began to shift from IEES personnel to MOE personnel and a start was made in moving from macroeducational concerns (planning and management) to microeducational concerns (availability of texts and materials in the school, instructional support for teachers, etc.). The continuation of these trends is evident in the objectives for next year, as well as in the proposed Year Four activities.

## 6.0 THE OBJECTIVES AND ACTIVITIES FOR PROJECT YEAR FOUR

### 6.1 Year Four Objectives

There is a single overriding objective for all Year Four Activities. The objective is to assist the Ministry of Education in preparing for the implementation of the Integrated Strategy. The strategy, as described in a previous section, is one of maximizing support for primary teaching by providing inservice training in the use of the new Reform Curriculum textbooks, classroom sets of the textbooks, and supervisory services.

IEES assistance is designed to meet this objective by realizing the following sub-goals:

1. Improved capacity to manage projects from the design stage through the implementation and evaluation stages.
2. Improved quality of data available to policymakers, particularly with respect to incentives for primary teaching, the distribution of textbooks, government expenditures on schooling by level and type, and examination results.
3. Improved capacity to evaluate textbooks and other materials and a reduction in the time necessary to produce such materials.
4. Training in and production of inservice teacher training materials in Somali and mathematics.

The detailed plans for Year Four activities, outlined in the following pages, describe the specific activities designed to meet these goals.

### 6.2 Detailed Plans for Year Four Activities

1. Assistance in the Preparation of Inservice Teacher Training Subject Matter Modules in Somali and Mathematics and Assistance in the Revision of Teacher Guides (5 pm, RTA)

Teacher subject matter competency and the availability of high quality programmed teacher guides are essential to improving the quality of classroom teaching. The IEES Project will support a new RTA who will spend approximately five months of her time training Department of Teacher

Training personnel in the design and development of inservice training modules in Somali and mathematics and assisting CDC staff in the revision of teacher guides, where such revision is necessary to improve effectiveness and efficiency.

2. Instructional Design Workshop (.5 pm, RTA; .5 pm STTA).

The work on the inservice teacher training modules will begin with a ten day workshop for Teacher Training Department personnel. It will be jointly conducted by the RTA and a short-term technical advisor (instructional design specialist) in order to maximize continuity between the work done in 1986 and the development of the modules. The workshop will result in a detailed scope of work for development of the Somali and Mathematics Inservice Training modules, a format for their development, and a timeline for their completion.

3. Introductory Computer Training Workshops 1 & 2 (RTA support)

The introductory computer training provided during Years One and Two of the project by short term technical assistant will be repeated for Administration, Board of Examiner, and CDC personnel. The workshops will be conducted by Planning Department with support from the RTA. The first workshop will cover care and maintenance of the computer and an introduction to and practice in Multimate, a word processing program modeled on the WANG word processing program. The second workshop will be devoted to the use of Lotus 1,2,3, a data management program. Between workshops, hands-on assistance will be provided to the Administration and CDC by two Department of Planning personnel. One of the workshops will be funded with already approved CIPL funds requested by IEES on behalf of the Ministry of Education.

4. Primary and Secondary Headmasters Workshops (RTA Support)

CIPL funds have also been approved for training workshops for primary and secondary headmasters. These workshops will be designed by Planning Department, Teacher Training Department, and CDC personnel to support the testing of the Integrated Strategy in selected classrooms in Mogadishu. The workshops will emphasize the headmaster's role as instructional leader in the school and provide intensive training in classroom observation and teacher feedback skills.

5. Assistance to the MOE in the Preparation of A Major Proposal for External Funding ( 1 pm, RTA; 3 pm, STTA)

If during the coming project year, the MOE decides to prepare a major proposal for external funding, the IEES Project will provide four person team to assist in proposal development.

6. Strengthening the Administration Department and Board of Examiners Capacity for Data Analysis (1 pm, RTA)

The MOE has identified major data needs that have not been addressed and indeed cannot be addressed effectively with the low level of technology available to the Administration Department and the Board of Examiners. Chief among these needs is estimation of recurrent expenditures by level of schooling and category (teachers, instructional materials, etc.) and information on the number, location, and status of teachers (full-time, part-time, active, inactive). Ready access to the latter is a necessary prerequisite to ensuring that all assigned teachers are in fact currently serving. Both detailed financial records and teacher records are necessary for the full implementation and monitoring of an Integrated Strategy for Primary Education.

Similarly, routine and systematic analysis of the results of the elementary and intermediate school leaving examinations is important for both the planning of inservice teacher training and the textbook and teacher guide work undertaken at the CDC.

To assist the MOE in this area the IEES project will increase the capacity of the computing facility by providing two hard drives for the WANG computers and the hardware and software necessary for sophisticated data base management. Training in the use of the computer will be provided by already trained Planning Department Personnel (see Introductory Computer Workshops 1 & 2).

The RTA will spend the equivalent of one months time over the project year assisting the Administration Department and the Board of Examiners in designing the structure of their computer files in order to ensure ready access to the data needed.

7. Technical Assistance to the CDC (1 pm RTA, 1 pm, STTA)

IEES will provide technical assistance to the CDC in the areas of formative evaluation and desktop publishing.

The CDC designed the New Reform Curriculum and translated that curriculum into textbooks for Grades 1 through 4. Many of the teachers guides have also been prepared for the elementary subjects. Work is now underway on textbooks for the intermediate grades. The heavy press of text production has meant little attention has been devoted to the systematic formative evaluation of the textbooks.

The CDC views the development of a capacity for systematic materials evaluation as fundamental to both to its mission and the successful implementation of the Integrated Strategy. The IEES project will provide an instructional design specialist to assist the Director of the CDC in

realistically assessing the Department's evaluation needs and designing a formative evaluation system which feeds back into revision activities. He will also provide hands-on training for CDC staff in the construction and use of evaluation instruments, the analysis of the data, and the translation of conclusions into revised text. The workshop component of this activity will be ten days with two days in the field; one day for the testing of instruments and a second day for collecting data.

In order to reduce the time required for processing of pages of texts from first to final draft by eliminating repetitive typing and layout, IEES will provide training in desktop publishing. This workshop will run concurrently with the evaluations workshop, the evaluation workshop will take place in the morning and the desktop publishing workshop in the afternoon.

UNICEF will provide the CDC with a microcomputer, laser printer, stabilizer, and word processing, data management, and desktop publishing software. Training in basic computer literacy and the use of data management programs will be provided by Planning Department personnel (see Introductory Computer Workshops 1 & 2). The RTA will provide training in Microsoft Word, a necessary pre-requisite to learning Ventura Publishing.

8. Assistance to the Planning Department for Increasing Its Management Capacity for Project Design, Development, and Implementation (RTA, 2.5 pm)

Successful implementation of the Integrated Strategy and all other programs will depend, to a large extent, on the Planning Department's capacity for design of a detailed plan that: (a) assigns responsibilities to appropriate department heads; (b) includes development of monitoring and evaluation mechanisms; and (c) provides opportunities for swift corrective action. The RTA will spend approximately 2.5 months assisting

the Planning Department in developing the institutional capacity for project preparation, development, and implementation and redesigning the statistical yearbook.

9. Policy Research Initiative Studies (3 pm, STTA)

Somalia is one of two countries participating in two of the IEES research initiative studies. The policy research studies are cross-national two-year activities designed to address specific policy issues. The MOE opted to participate in the Education Management Information Systems (EMIS) and the Teacher Incentive Systems (TIS) research projects. The EMIS Policy Research Initiative is designed to identify each participating country's strengths and weaknesses in the collection of reliable and valid data needed for policy analysis. The policy questions which will be addressed not only at the central level but also at the regional, district, and school levels include but are not limited to the following: Who decides what data to collect? Who collects the data? What incentives/disincentives are currently in the system for collecting reliable and valid data? Who decides what type of analysis will be carried out? Who uses these analyses and for what purpose?

The other two countries participating in the EMIS research are the Yemen Arab Republic and Nepal. Ali Hassan Gaal, Director of Planning, Ministry of Education, serves as the Country Team Leader for the initiative and David Chapman of the State University of New York at Albany and Jerry Messec of Florida State University serve as Project Team Leaders.

The purpose of the Teacher Incentive Policy Research Initiative is to address policy questions related to the recruitment and retention of teachers in the primary subsector. A background paper for the study in the GSDR was prepared in August 1986. The study will identify existing

incentives/disincentives for primary teaching, the opportunity costs of primary teaching for individuals with different characteristics, teacher's preferences related to non-salary incentives (food, housing, instructional materials, opportunities for professional growth, and career development, etc.), the reasons why former teachers left teaching, etc.

The other two IEES countries participating in the study are the Yemen Arab Republic and Liberia. Hussein Mohamed Said, Director General, Educational Development, Ministry of Education, is the Country Team Leader for the Study and Sivasailam Thiagarajan of the Institute for International Research and Frances Kemmerer of the State University of New York at Albany are the Project Team Leaders.

Both studies have fieldwork components. The sites selected for the implementation of the Integrated Strategy will also serve as field sites in order to maximize the information the MOE has on the selected districts, as well as provide MOE personnel with greater opportunities to monitor and evaluate the implementation.

10. Resident Technical Advisor (11 pm, RTA)

IEES will place a new Resident Technical Advisor in Mogadishu. The estimated allocation of the RTA's time is as follows:

- 5 person months providing training to Teacher Training Department personnel in the design and development of inservice training modules and assisting the CDC in the revision of teacher guides, as necessary;
- 1 person month assisting the MOE in developing a proposal for the World Bank;
- 1 person month assisting the Administration Department and the Board of Examiners in structuring their data bases;
- .5 person months training CDC personnel in IBM compatible word processing software;

- 2.5 person months assisting the Planning Department in designing a management system for the implementation of the Integrated Strategy;
- .5 person months on IEES Annual Plan development;
- .5 person months orientation.

11. Orientation of the RTA, Assistance with EMIS Data Collection, and Assessment of IEES Impact (.5 pm, RTA, .5 pm STTA)

To ensure a smooth transition between RTA's, Mark Berger will return to Mogadishu for the orientation of the new Resident Technical Advisor. The orientation will include a detailed review of past IEES activities, the current context for education in Somalia, and Burchfield's scope of work.

Berger will also introduce Burchfield to Ministry officials and representatives of the donor community. Berger will ensure that Burchfield's scope of work is clearly understood by the Ministry officials she will work with. This is especially important as her time is divided among Ministry departments while Berger's work was with the Planning Department.

Berger will also provide assistance to the new Secretary General for Donor Coordination, MOE. This is a new office and its establishment is a direct result of Berger's efforts. The office is intended to institutionalize the work with donors which IEES has supported over the past two years. Specifically, Berger will assist in (a) drafting the goals and objectives for the office during its first year, (b) devising a strategy for donor coordination, and (c) constructing instruments for project identification and monitoring.

Berger's third task is to provide assistance to the Planning Department personnel in finalizing the EMIS questionnaire protocol and administering it to some forty MOE officials. Chapman will analyze these

administering it to some forty MOE officials. Chapman will analyze these data during his trip to Somalia later this summer.

Finally, Berger will analyze IEES accomplishments in Somalia over the past two years. The paper will include (a) a description of the changing context for education in Somalia, (b) an analysis of the constraints and opportunities for educational improvement, and (3) an analysis of verifiable IEES accomplishments over the period in terms of that context.

#### 12. Annual Plan Development (.5 pm, RTA; .75 pm STTA)

The formulation of Year Five activities will take place toward the end of Year Four. This fifth annual country plan will be based on judgments related to the relative success of the training, research, and development activities carried out in the fourth year (June 11, 1987 - June 10, 1988).

#### 6.3 Year Four Schedule of Activities

The schedule of activities shown in Figure 6.1 is based on assumptions about the arrival of equipment and the availability of personnel. The MOE will be alerted to any significant changes in schedule at the earliest possible date.

#### 6.4 Evaluation of Year Four Activities

The evaluation criteria for IEES activities are derived from the rationale for IEES activities in Somalia and outlined in the strategy for IEES involvement described earlier. In summary, the expected outcome of training and research and development activities is twofold. In the short-term high levels of participation should lead to the acquisition of intended skills. In the mid- and long-terms, the expected outcomes are application of those skills and the training of others. The design of the

FIGURE 6.1

SCHEDULE FOR YEAR FOUR ACTIVITIES

ACTIVITY	MONTH
1. Assistance in the Preparation of Inservice Teacher Training Modules	Begins August 1987
2. Instructional Design Workshop	August 1987
3. Computer Training Workshops	November, March 1987
4. Primary and Secondary Headmasters Workshops	July, August 1987
5. Assistance in Preparing a Major Proposal for External Funding	When Required
6. Assistance to the Administration Department and the Board of Examiners	Begins December 1987
7. Technical Assistance to the CDC	Begins with arrival of computer Workshops-March 1988
8. Assistance to the Planning Department	Ongoing
9. Policy Research Initiatives	Ongoing
10. Placement of a New RTA	July 1987
11. Orientation of the RTA	August 1987
12. Annual Plan Development	March 1988

Year Four activities indicates that in the area of data management the transfer of skills has taken place and the new computer training activities for the Administration Department, the Board of Examiners, and CDC staff represent a collaborative effort. The Planning Department will design and conduct the training and the IEES Project provide technical support, as needed, and equipment. At the same time, the EMIS study will provide higher level hands-on training to Planning Department personnel in increasing the efficiency of the present educational data management study, while the Teacher Incentive Initiative will provide experience in analyzing an important policy issue.

The Planning Department's demonstrated skill in computer usage and computer applications has provided the Project personnel with the opportunity to expand their focus from purely macroeducational concerns to more microlevel issues. Assistance to the Teacher Training Department (for instructional design), the CDC (for materials evaluation), and the Planning Department (project management) this year are all intended to facilitate the implementation of the Integrated Strategy for Primary School Improvement next year. The short- and mid-term project goals for this years activities are summarized in Figure 6.2.

FIGURE 6.2

EXPECTED OUTCOMES OF YEAR FOUR ACTIVITIES

ACTIVITY	SHORT-TERM OUTCOME	MID-TERM OUTCOME
Assistance in the preparation of inservice teacher materials	Production of Somali & Math Modules	TTD Production of other inservice modules
Instructional Design Workshop	Production schedule & methodology designed	Production on schedule
Computer Training Workshops 1 & 2	Administration Department, CDC, & Examination personnel trained in computer usage	Analysis of data on per pupil expenditures & examination results by subject.
Primary & Secondary Headmasters Workshops	Headmasters trained in instructional leadership skills	Headmasters observe teachers and provide useful feedback
Assistance in the Preparation of a Proposal for External Funding	Proposal prepared	Proposal funded
Assistance to the Administration Department and the Board of Examiners	Data sets structured Data entered	Data available on per pupil expenditures and examination results by subject
Technical Assistance to the CDC	Evaluation Unit designed & staffed; use of desktop publishing technology	Systematic formative evaluation of instruction materials; reduction in production time.
Assistance to the Planning Department	Project management scheme devised and implemented	Program implementation characterized by high levels of departmental and donor coordination, monitoring and intervention, as necessary
Policy Research Initiatives	Acquire research design, instrumentation, fieldwork, and analysis skills	Initiate and perform new research on policy issues

**ANNEX 1**

**List of Accomplishments**

ACTIVITIES OF THE IMPROVING THE EFFICIENCY OF EDUCATION SYSTEMS  
PROJECT IN SOMALIA: 1983 - 1987

DATE	ACTIVITY	IEES PARTICIPANTS	GOS COORDINATING AGENCY
June - July 1983	EHR Sector Assessment	J. Claffey D. Windham D. Chapman M. Rihani L. Anderson R. Hailer S. Hoben A. Thomas	Ministry of National Planning
February - April 1984	Civil Service Study	D. Windham B. Wolff V. Zimmerman S. Hayes R. Kraft	Ministry of Labor
June - July 1984	SOMTAD Project Design Team I	D. Chapman L. Woo P. Vogt D. Banker R. Greene	Ministry of Labor Ministry of National Planning
September 1984	Somali Civil Service Symposium	D. Windham	Ministry of Labor
February 1985	SOMTAD Project Design Team II	D. Chapman D. Windham J. Messec	Ministry of Labor Ministry of National Planning
February 1985	Management and Administrative Workshops for Headmasters	M. Berger	Ministry of Education
April 1985 and June 1985	Annual Work Plan Development	D. Chapman D. Windham	Ministry of Education Ministry of National Planning
June 1985	Data Analysis & Microcomputer	F. Dembowski	Ministry of Education Ministry of National Planning Ministry of Labor
June 1985 - May 1987	Resident Technical Advisor	M. Berger	Ministry of Education

ACTIVITIES OF THE IMPROVING THE EFFICIENCY OF EDUCATION SYSTEMS  
PROJECT IN SOMALIA: 1983 - 1987

DATE	ACTIVITY	IEES PARTICIPANTS	GOS COORDINATING AGENCY
August 1985	School Quality Enhancement Study	J. Messec F. Kemmerer S. Thiagarajan	Ministry of Education
October 1985	Data Analysis and Micro-Computer Workshop II	F. Dembowski	Ministry of Education Ministry of National Planning Ministry of Labor
November - December 1985	Development of Somali Language Dictionary of Technical Terms in Economics	J. Messec	Somali National University
April 1986	Annual Workplan Development	D. Chapman J. Claffey M. Berger	Ministry of Education Ministry of National Planning
June 1986	Data Analysis and Microcomputer Workshop	F. Dembowski	Ministry of Education
August 10 - September 11, 1986	Development of Transitional Strategy to Improve Quality of Primary Education	D. Windham S. Thiagarajan F. Kemmerer J. Messec	Ministry of Education
August 10 - September 11, 1986	Teacher Incentive Study	F. Kemmerer	Ministry of Education
August 10 - September 11, 1986	Study of Educational Materials Dist- ribution System	J. Messec	Ministry of Education
November 20-25, 1986	Initiation of Policy Research Activities	D. Chapman F. Kemmerer S. Thiagarajan D. Windham	Ministry of Education

ACTIVITIES OF THE IMPROVING THE EFFICIENCY OF EDUCATION SYSTEMS  
PROJECT IN SOMALIA: 1983 - 1987

DATE	ACTIVITY	IEES PARTICIPANTS	GOS COORDINATING AGENCY
November 17 - December 9, 1986	Development of Plan for Prepar- ation of Teacher Training Materials	S. Benjamin	Ministry of Education
December 26, 1986 January 1987	To Design and Cost Implementation of the Integrated Strategy for Improving Primary Education in Somalia	F. Kemmerer S. Thiagarajan	Ministry of Education
April 1987	Policy Analysis Workshop	M. Green	Ministry of Education
May 1987	Country Plan Development	F. Kemmerer M. Berger	Ministries of Education and National Planning, USAID Mission
July 1987	Resident Technical Advisor	S. Burchfield	Ministry of Education
	Orientation of RTA Donor Coordination Activities	M. Berger	Ministry of Education
August 1987	Instructional Design Workshop	S. Thiagarajan	Ministry of Education
	EMIS Site Visit	D. Chapman	Ministry of Education
	Teacher Incentives Site Visit	F. Kemmerer	Ministry of Education

**ANNEX 2**  
**Scopes of Work**

**Note: Scopes of Work for the Policy Research Initiative Activities will be provided by the Project Team Leaders.**

## Resident Technical Advisor

### Purposes:

#### Assistance in the Preparation of Inservice Teacher Training Subject Matter Modules in Somali and Mathematics (5 pm).

**Objectives:** Department of Teacher Training personnel trained in instructional design techniques and procedures and capable of preparing other subject matter modules with minimal assistance.

Inservice subject matter modules in Somali and mathematics developed and available for use in the fall of 1988.

**Evaluation Criteria:** The level of skills developed by Training Dept. personnel.

The production of the modules in schedule.

The quality of the modules produced.

#### Assistance to the Planning Department in Improving Management Capacity for Project Design, Development, Implementation, and Evaluation and Donor Coordination (2.5 pm)

**Objectives:** Planning Department personnel trained in project design, development, and implementation techniques and structures established for inter-departmental and donor coordination on specific projects.

A detailed plan developed for the coordination, monitoring, and evaluation of ISIPES implementation.

**Evaluation Criteria:** Structures established for coordination used for all inter-departmental and multi-donor projects.

The comprehensiveness of the plan developed for MOE coordination, monitoring, and evaluation of the ISIPES implementation.

Assistance to the Administration Department in Structuring Computer files for the MOE recurrent expenditures; Assistance to the Board of Examiners in Structuring Computer files on the Results of National Examinations (1 pm)

Objectives: To assist the Administration Department and the Board of Examiners in structuring their data sets for the computer.

Evaluation Criteria: Data sets structured to allow for maximum flexibility in analysis.

Assistance to the CDC (.5 PM)

Objective: To assist the CDC in preparing for desktop publishing by training personnel in the use of Microsoft Word software.

Evaluation Criteria: Staff mastery of Microsoft Word

Assistance to the Ministry of Education in Preparing a Major Proposal for External Funding (1 pm)

(The scope of work for this activity will be developed at such time as the Ministry of Education requests assistance in this area.)

IEES ANNUAL PLAN DEVELOPMENT (.5 pm)

Objective: To assist in the development of Year Five activities which meet the twin criteria of responsiveness to MOE needs and IEES goals of improving the efficiency and effectiveness of the EHR sector.

Evaluation Criteria: MOE, USAID/Mogadishu and USAID/Washington approval of the IEES Country Plan.

In addition, to the responsibilities listed above, the RTA is required to submit to the IEES Project a monthly field report. The field reports should review progress on objectives and provide an analysis of any changes in the context for education. The field reports are forwarded to all USAID missions, Ministries of Education, and field personnel in the countries participating in the IEES Project.

The RTA is also responsible for facilitating the work of all IEES short-term personnel in Somalia and serving as a liaison between the Ministry of Education and USAID/Mogadishu, as necessary.

Rationale:

IEES Activities in Somalia over the past two years have benefited from day-to-day coordination and on-the-job training provided by a resident technical advisor. With the assistance of the RTA and short-term technical advisors, the educational information management system has been computerized and Planning Department personnel trained in the use of computer software for word processing and statistical analysis. Routines for enrollment projection, analysis of trends, and system monitoring have been firmly established. The Planning Department has taken over all computer training in these areas within the Ministry of Education. These accomplishments have provided the MOE with the ability to focus more directly on project design, implementation, and evaluation activities. The Year Four activities, therefore, reflect a beginning shift in emphasis from capacity building to improving the allocation of resources to schools and classrooms and the more effective utilization of resources within schools and classrooms.

The IEES Project will continue to provide support to the Planning Department and other Ministry departments concerned with improvement in the quality and quantity of data available to policymakers. The major focus of the project in providing such assistance, however, will be to develop the skills and institutional framework necessary for the implementation of the Integrated Strategy for the Improvement of the Primary Education System (ISIPES) in the fall of 1988. Preparations must be made, for example, for the inservice training of teachers, headmasters, and inspectors. Classroom sets of textbooks and teacher guides must be assembled, next summer's workshops for the initial districts scheduled, and detailed plans made for the monitoring of the implementation. Successful implementation will depend, to a large extent, on whether all inputs are delivered and whether monitoring and feedback mechanisms are rigorously employed.

The proposed activities for Year Four also include IEES assistance in the preparation of inservice teacher training materials. The goals of the assistance to the Teacher Training Department is twofold: First to train teacher training department personnel in the development of instructional materials and second, to ensure that the Somali and math inservice modules are available by the fall of 1988.

Personnel: Shirley Burchfield

Schedule: One Year  
Beginning July 6, 1987

Activities: Orientation of the new RTA in Somalia;  
Assessment of IEES accomplishments over  
the past two years;  
Assistance to the new Secretariat for  
Donor Coordination;  
Assistance to the EMIS Policy Research  
Team.

- Purposes:
- (1) To provide continuity between IEES activities in Somalia over the past three years and planned activities; To introduce the new RTA to Ministry of Education, USAID/Somalia, and donor community personnel; To review with the RTA the context for education in Somalia and past IEES activities (purpose and outcomes); To review in detail with the RTA and Ministry personnel the RTA's scope of work.
  - (2) To provide assistance to the new Secretary General for Donor Coordination in defining the goals and objectives of the office (particularly for the first year), designing a strategy for donor coordination, and constructing mechanisms for coordination and forms for reporting on donor assisted projects.
  - (3) To assist the EMIS team in collecting the necessary stage 1 data for the EMIS research (Dr. Chapman will assist in the analysis of these data during his trip to Somalia later this summer.
  - (4) To assess IEES accomplishments over the past two years in Somalia.

Rationale:

The scope of work of the new RTA in Somalia is substantially different from that of the former RTA, Mark Berger. Consequently, it is important from the perspectives of both continuity and efficiency, that Berger review in detail with Burchfield her scope of work, the current context for education in Somalia, past IEES activities (in terms of both their strengths and weaknesses). Berger will also introduce Burchfield to Ministry officials and representatives of the donor community. Berger will ensure that Burchfield's scope of work is clearly understood by the Ministry officials she will work with. This is especially important as her time is divided among Ministry departments while Berger's work was with the Planning Department.

Berger will also provide assistance to the new Secretary General for Donor Coordination, MOE. This is a new office and its establishment is a direct result of Berger's efforts. The office is intended to institutionalize the work with donors which IEES has supported over the past two years. Specifically, Berger will assist in (a) drafting the goals and objectives for the office during its first year, (b) devising a strategy for donor coordination, and (c) constructing instruments for project identification and monitoring.

Berger's third task is to provide assistance to the Planning Department personnel in finalizing the EMIS questionnaire protocol and administering it to some forty MOE officials. Chapman will analyze these data during his trip to Somalia later this summer.

Finally, Berger will analyze IEES accomplishments in Somalia over the past two years. The paper will include (a) a description of the changing context for education in Somalia, (b) an analysis of the constraints and opportunities for educational improvement, and (3) an analysis of verifiable IEES accomplishments over the period.

**Deliverables:**

Orientation of the RTA	The new RTA is introduced to Ministry officials and donor agency representatives and her scope of work is clearly understood.
Assistance to the Donor Coordination	Goals and objectives of the Secretary General for new office are defined; a strategy for intra MOE coordination and coordination with donors devised; and initial project identification and monitoring instruments designed.
Assistance to the EMIS research team State 1 data	EMIS questionnaire protocol finalized; subjects selected; in the collection of data collection well underway.
Analysis of IEES Accomplishments	Description and analysis of IEES accomplishments in Somalia over the past two years.

**Personnel:** Mark Berger (.5 PM)

**Schedule:** August 1987

Activity: Instructional Design Workshop

Purposes:

Provide basic skills and knowledge in instructional module development.

Analyze the content of the New Reform Curriculum Somali and math textbooks to identify regular lesson patterns.

Prepare standard procedures for teaching each type of Somali and math lesson.

Prepare standardized format for providing instructions for teachers for each standard lesson procedures.

Identify the core lessons in each textbook.

Develop format for teaching training modules based on the earlier analyses and specifications.

Define the scope of work for the development of the teacher training modules.

Prepare a schedule for the module development activity.

Rationale:

This activity is a continuation of the preparation for the implementation of the Integrated Strategy in September 1988. The RTA will spend six person months assisting the Teacher Training Department in preparing Somali and Mathematics inservice training modules as recommended in the Quality Enhancement Study and detailed in the Integrated Strategy for the Improvement Primary Education. The workshop will be conducted by S. Thiagarajan and Shirley Burchfield and thus provide continuity between the earlier work coordinated by Thiagarajan and the future activities to be coordinated by Burchfield.

Deliverables:

Handouts and checklists on basic instructional design procedures.  
Curriculum guide specifying different types of Somali and math lessons.  
Sample teacher instructions for standard teaching procedures in Somali and math.

Specifications for teacher training modules.  
Scope of Work for module development activities.  
Schedule of module development activities.

Personnel: Thiagarajan (.75 pm)  
Burchfield (.75)

Schedule: August 1987

Activity: Technical Assistance to the Curriculum Development Center (CDC)

Purposes:

Assist CDC Director in assessing formative evaluation needs and specifying personnel requirements.

Assist the CDC Director in identifying appropriate models for the formative evaluation of existing materials.

Provide basic concepts related to formative evaluation and revision of instructional materials.

Identify input, process, and output variables related to the formative evaluation.

Train evaluators in clear specification of the goals of formative evaluation of specific instructional materials.

Train evaluators in preparing suitable evaluation designs for formative evaluation during different stages of the development of instructional materials.

Train evaluators in the selection of appropriate instruments and tests.

Train evaluators in designing, constructing, trying out, and revising teacher observation systems, rating scales, checklists, interviews, and criterion tests.

Train evaluators in the collection of data through classroom observations, interviews, and test administration.

Train evaluators in the analysis of formative evaluation data, identification of instructional weaknesses of the materials, hypothesizing likely causes of these weaknesses, prescribing suitable revisions, and implementing these revisions.

Train technical staff in desktop publishing skills.

Rationale:

The CDC is responsible for the camera-ready production of all primary and secondary textbooks, teacher guides and instructional materials and the formative evaluation of its products. The urgency of textbook development and the production technology available has left little time for formative evaluation. The technical assistance described above is a first step in addressing both these problems.

Deliverables:

Handouts and checklists for various stages of formative evaluation.

Samples of different types of observation systems, rating scales, checklists, and criterion tests.

Data from classroom observations.

Before and after versions of instructional materials which have been revised on the basis of formative evaluation.

Job aids for desktop publishing.

Personnel: S. Thiagarajan (1 pm)

Schedule: March 1987

Activity: Annual Plan Development

Purpose:

To meet with Ministry of Education and USAID/Mogadishu personnel to develop the IEES Work Plan for the fifth project year.

Rationale:

Realization of the IEES goal of improving the efficiency of educational systems requires that the project's activities remain closely related to the changing context for education in each participating country. Development of the yearly plan helps to ensure that the resources of the project are put to their most productive use in terms of the GSDR goals for education.

Personnel: F. Kemmerer (.5 pm)  
S. Burchfield (.5 pm)

Schedule: March/April 1987

**ANNEX 3**

**Estimated Local Budget for Year Four Activities**

ESTIMATED LOCAL BUDGET FOR IEES YEAR FOUR ACTIVITIES

(Activities could be delayed, postponed to the next project fiscal year, or canceled if a shortage in project funds should occur.)

IEES PERSONNEL:

11 months of the services of the new Resident Technical Advisor

8.5 person months short-term technical assistance

ACTIVITIES:

1. Assistance in the Preparation of  
Inservice Training Modules and  
Revision of Teacher Guides

RTA 5 pm

2. Instructional Design Workshop

RTA .5 pm

STTA .5 pm

Stipends for the Participants  
7 days @ So. Sh. 500 for  
7 participants

\$265

Supplies

30

Opening/Closing costs

30

3. Introductory Computer Workshops 1 & 2

One workshop will be funded out of the CIPL grant already awarded to IEES for MOE Institutional Development (see below)

Workshop Leaders 10 days @ So. Sh. 1000 per day 2 leaders	152
Participant Stipend 10 days @ So. Sh. 500 per day for 9 participants	341
Supplies	30
Opening/Closing Costs	30
Ongoing Assistance to Participants 1 trainers for 6 months at So. Sh. 2500 per month	114

4. Primary and Secondary Headmasters Workshops

Both these workshops will be funded out of the CIPL grant already awarded to IEES for MOE Institutional Development (see below).

5. Assistance to the MOE in the Preparation of the World Bank Proposal

RTA	1 pm
STTA	3 pm

6. Strengthening the Administration Department's and the Board of Examiner's Capacity for Data Analysis

RTA 1 pm	
2 WANG Hard Drives	1288
2 Controller Cards	568
New Operating System	70
D Base III Plus	695
Supplies	1000
Maintenance	500
Shipping	500

7. Technical Assistance to the CDC for Creation of a Materials Evaluation Unit; Materials Evaluation Workshop; Desktop Publishing Workshop

RTA 1 pm	
STTA 1 pm	
Stipends for Participants 20 days @ So. Sh. 500 per day for 9 participants	682
Stationary	30
Opening/Closing costs	30

8. Assistance to the Planning Department in Developing a Project Management System

RTA 2.5 pm

9. Policy Research Initiative Studies

STTA 3 pm

Each study has two year budget of \$50,000 dollars exclusive of Technical Assistance by the Project team leaders.

50000

10. CIPL Grant to IEES for MOE Institutional Development

Remaining to be expended for four workshops, purchase of equipment, supplies, etc. Costs for these activities have already been allocated.

Already Allocated

11. IEES Annual Plan Development

RTA .5 pm

STTA .5 pm

12. Orientation of the RTA; Assistance to the EMIS field team; Assistance to the Secretary General for Donor Coordination; Assessment of IEES Impact

RTA .5 pm

STTA .5 pm

Total Local Funds \$56,359

Exchange Rate : U.S. \$1 = So.Sh.132