# **Terminal Evaluation**

## Middle East

# 1. Outline of the Project

Country: Project title:

Saudi Arabia Electronic Education Development Center in the Kingdom of Saudi Arabia

Issue/Sector: Cooperation scheme:

**Division in charge:**Middle East and Europe Division, Regional

2,121 Million Yen

Department IV(AfricaMiddle East and Europe)

Period of 1 August 1998 - 31 Cooperation July 2001 **Partner Country s Implementing Organization:** 

General Organization for Technical Education and Vocational Training

(GOTEVT)

Electronic Education Development Center(EEDC)

# **Supporting Organization in Japan:**

# **Related Cooperation:**

Project-type Technical Cooperation: Riyadh Technical Electric Institute

Project-type Technical Cooperation: The Project on Improvement of the Technical Education of Electronics in the College of Technology in Riyadh

## 1-1 Background of the Project

In Saudi Arabia, the population growth rate was relatively high (3.4% a year) and almost 60 percent of laborers were foreign workers. This prompted concern that the young people might face unemployment problems in the future. Technical education and vocational training have been the major cooperation areas of the Government of Japan to Saudi Arabia. JICA implemented the Project-type Technical Cooperation ÉÅRiyadh Technical Electric InstituteÉÇ, and two years of follow-up cooperation (1989-96), then another Project-type Technical Cooperation ÉÅRiyadh College of Technology (1997-2001)ÉÇ. Based on the results of those cooperation activities, the Government of Saudi Arabia established the EED Center (EEDC), a training center for teachers to disseminate the knowledge and skills of electronics technical education to industrial high schools throughout the country, and requested the Government of Japan to implement the Experts Team Dispatch Program in order to upgrade the technical and educational methods of EEDC.

# 1-2 Project Overview

To disseminate knowledge and skills in the field of electronics technical education to teachers in industrial high schools throughout Saudi Arabia, the Project taught electronic techniques and the methods of conducting training courses to the staff of EEDC, which conducts training for technical high school teachers.

- (1) Overall Goal
- 1) To achieve teaching based on appropriate teaching methods and teaching materials in all technical high schools in Saudi Arabia.
- 2) To facilitate Saudization of the labor force in Saudi Arabia.
- (2) Project Purpose
- 1) Development of teaching methods and teaching materials at EEDC for technical education in electronics.
- 2) Continuous training for teachers of EEDC based on the above-mentioned teaching methods and teaching materials.

- (3) Outputs
- 1) Establishment of an operation and management system at EEDC.
- 2) Promotion of the appropriate procurement, installation, operation and maintenance of educational equipment at EEDC.
- 3) Improved technical expertise regarding electronic technology among EEDC teachers.
- 4) Improved teaching ability of EEDC training staff.
- 5) Development of appropriate teaching materials in the field of electronic technology.
- (4) Inputs

Japanese side:

Long-term Experts 4 Equipment and Facilities 29 Million Yen

Short-term Experts 10 Local Cost 72 Million Yen

Trainees received 16

Saudi Arabian Side:

Counterparts 4

Local Cost 2.4 million Saudi Real (85 Million Yen)

#### 2. Evaluation Team

#### **Members of Evaluation Team**

Team Leader/General: Kazuo TANIGAWA, Special Technical Adviser, JICA Technical Education: Yoshio SATO, Curriculum Senior Specialist, Elementary and Secondary Education Bureau, Ministry of Education, Culture, Sports, Science and Technology

Education Administration: Tadatoshi KANEKO, Unit Chief, Elementary and Secondary Education Bureau, Ministry of Education, Culture, Sports, Science and Tachnelogy

Evaluation Planning: Kohei YOSHIDA, Staff, Middle East and Europe Division,

Regional Department IV (Africa, Middle East and Europe), JICA

Evaluation Analysis: Tsunekazu KIGASAWA, Overseas Vocational Training

Association (OVTA)

Period of Evaluation

26 January 2002 - 6 February 2002

Type of Evaluation:
Terminal Evaluation

# 3. Results of Evaluation

# 3-1 Summary of Evaluation Results

## (1) Relevance

The Overall Goal and the Project Purpose were settled with the aims of quality improvement of industrial high schools through the development of teaching methods and teaching materials on electronic techniques education. The Project Purpose is relevant to the national policy of both the 6th and the 7th development plans in which ÉÅSaudization of labor forceÉÇ was to be encouraged as one of the major policies. Moreover, technical development was one of the key fields in Saudi Arabia. The country is trying to break away from the traditional dependence on oil. From these points of view, the Project Purpose was highly relevant to the policy of Saudi Arabia.

## (2) Effectiveness

Transferred techniques by experts and donated equipment made it possible for the counterparts to implement training courses and develop textbooks in Arabic. At the terminal evaluation, both experts and counterparts evaluated attainment in each activity at 60 to 70 percent on average. Judging from these indicators, it is clear that the Project Purpose has been accomplished above a certain level. However, the technical staff at EEDC numbered only four persons, and to enhance the achievement of the Project, a larger technical staff is necessary.

#### (3) Efficiency

In spite of the delayed dispatch of the Japanese Experts due to their selection of taking more time than had been expected, the Inputs from the Japanese side were at satisfactory levels as the dispatched experts and donated equipment directly contributed to attainment of the Outputs of the Project. Inputs to the Project by the Saudi Arabian side were timely manner and sufficient in terms of the payment of local costs and contribution of land and facilities. However, some aspects that the Inputs were not maximally utilized; the training course was not implemented as scheduled because the implementation of the Project had not been widely announced and because of preparation shortcomings.

#### (4) Impact

The number of technical high school teachers who joined lectures or seminars at EEDC totaled over 430, and these teachers will be disseminating the developed techniques and textbooks. The effects of the Project will be disseminated to the technical high schools across Saudi Arabia because the textbooks developed at EEDC will be translated into Arabic and distributed to high schools. However, at the terminal evaluation, it was pointed out by teachers from some of the technical high schools that they did not have the same textbooks or equipment as EEDC, and so the Outputs of the Project could not be applied directly at their schools. For the future, EEDC needs to make a conscious effort to implement activities that disseminate the same textbooks, equipment and teaching methods, through a continuously training course that distributes textbooks written in Arabic. EEDC also needs to implement the training course considering the actual status of each high school.

#### (5) Sustainability

The Project Purpose is consistent with the policy of Saudi Arabia, which has made industrial development a key issue and, therefore, political support for EEDC is expected in the future. Although there are only four counterparts, GOTEVT supports EEDC, the techniques have been transferred to EEDC on schedule, and there is no problem on with regard to EEDC's capability. Financial support is also expected as local costs have been paid thus far. Therefore, it is considered that the Project is sustainable.

## 3-2 Factors that promoted realization of effects

(1) Factors concerning Planning

The Project focused on technical education, which was consistent with the policy of Saudi Arabia and, therefore, the Government of Saudi Arabia supported the Project both politically and financially.

(2) Factors concerning the Implementation Process

As the counterparts were eager to learn the techniques, the experts could transfer the techniques smoothly.

## 3-3 Factors that impeded realization of effects

(1) Factors concerning Planning

N/A

- (2) Factors concerning the Implementation Process
- 1) The few EEDC staff who managed the training were inexperienced, and so the training was not implemented as planned. This adversely affected accomplishment of Project effects.
- 2) There remains uncertainty in terms of settling of the transferred techniques because of the small EEDC staff and the permanency of the current staff members. It is possible that the current staff.

# 3-4 Conclusion

The cooperation has been smoothly implemented mainly through the activities of the experts and counterparts, and the Government of Saudi Africa highly appreciates the result of the cooperation. The Outputs of the Project will be disseminated by the teachers who took the Training at EEDC in the form of introducing the acquired techniques and knowledge at their schools and distributing textbooks in Arabic.

#### 3-5 Recommendations

- (1) It is suggested that the number of technical staff be increased because the current number of staff members is insufficient for the future development of EEDC.
- (2) As the teacher-training course will be implemented at EEDC and the textbooks developed at EEDC will be distributed, the dissemination of techniques is expected.

#### 3-6 Lessons Learned

It was learned during the course of the cooperation in the field of technical education, that not only are the technical aspects important but also important are encouraging individual development and a positive attitude, creativity and the teaching skills of participating teachers. Therefore, it is necessary that experts who are experienced as teachers consider methodology not only in terms of technology but also well be prepared to transfer technology and specific methods of instruction to counterparts as well. The teachers who participate in the Training should be well motivated to attain the skills and know-how in order to provide high-quality instruction their students.

# 3-7 Follow-up Situation

Technical education problems and improvements in Saudi Arabia have been the focus of overseas development studies, ÉÅThe study on improving efficiency and effectiveness of technical education and vocational training in the Kingdom of Saudi Arabia(January 2003-March 2003)ÉÇ are examples. On reflection and in response to development studies requested in fields other than electronic technology in order to upgrade the quality of technical education, JICA has been narrowing down the target sector. ÉÅThe development and training centerÉÇ will be commenced within the year of 2003 if possible.