CLASSIFICATION

PROJECT EVALUATION SUMMARY (PES) – PART I

Report Control Symbol U-447

1. PROJECT TITLE	2. PROJECT NUMBER	3. MISSION/AID/W OFFICE
Rural Communication Services (Peru Subproject)	598-0581	LAC/DR/HR

4. EVALUATION NUMBER (Enter the number maintained by the reporting unit e.g., Country or AID/W Administrative Code, Fiscal Year, Serial No. beginning with No. 1 each FY) 1

☒ REGULAR EVALUATION ☐ SPECIAL EVALUATION

5. KEY PROJECT IMPLEMENTATION DATES	6. ESTIMATED PROJECT FUNDING	7. PERIOD COVERED BY EVALUATION
A. First PRO-AG or Equivalent FY 79	A. Total $1,816,000	From (month/yr.) August, 1979
B. Final Obligation Expected FY 82	B. U.S. $1,488,000	To (month/yr.) August, 1981
C. Final Input Delivery FY 83		Date of Evaluation Review

8. ACTION DECISIONS APPROVED BY MISSION OR AID/W OFFICE DIRECTOR

A. List decisions and/or unresolved issues; cite those items needing further study. (NOTE: Mission decisions which anticipate AID/W or regional office action should specify type of document, e.g., airgram, SPAR, PIO, which will present detailed request.)	B. NAME OF OFFICER RESPONSIBLE FOR ACTION	C. DATE ACTION TO BE COMPLETED
Extend PACD from 12/31/83 to 12/31/84	R. Martin	12/31/81

9. INVENTORY OF DOCUMENTS TO BE REVISED PER ABOVE DECISIONS

- ☐ Project Paper
- ☐ Financial Plan
- ☐ Logical Framework
- ☐ Project Agreement
- ☐ Implementation Plan e.g., CPI Network
- ☐ PIO/T
- ☐ PIO/C
- ☐ PIO/P
- ☐ Other (Specify) _____
- ☐ Other (Specify) _____

10. ALTERNATIVE DECISIONS ON FUTURE OF PROJECT

- A. ☒ Continue Project Without Change
- B. ☐ Change Project Design and/or ☐ Change Implementation Plan
- C. ☐ Discontinue Project

11. PROJECT OFFICER AND HOST COUNTRY OR OTHER RANKING PARTICIPANTS AS APPROPRIATE (Names and Titles)

Richard R. Martin, AID/LAC/DR/HR

12. Mission/AID/W Office Director Approval

Signature

Typed Name Irwin A. Levy, (Acting) LAC/DR

Date SEP 29 1981

AID 1330-15 (3-78)

13. Summary

The Peru subproject, the largest component of the LAC Regional "Rural Communication Services" project, is progressing satisfactorily, although implementation has been delayed by about 9 months. The delay was caused by a pre-project engineering design study which seriously underestimated the cost of the project-financed experimental rural telecommunication network, resulting in a need to undertake costly and time-consuming studies of alternative network designs and equipment options.

Contracts have been signed for field technical assistance, evaluation studies, and equipment. Technical assistance and evaluation teams have completed communication needs assessments of different user groups in the project area. Initial baseline interviews have been completed, training workshops for users have been held, a project committee of user ministries (health, education, and agriculture) has been established, and local political support for the project in the field has been successfully enlisted. The grantee, ENTEL-Peru, has established an independent project office with a competent engineering staff and a group of four social scientists to work on applications and evaluation. Prospects of achieving the project purpose and goal, therefore, are good, in spite of delays.

14. Evaluation Methodology

This is a routine project evaluation, based on the observations of the A.I.D. project monitor. The other major component of the Rural Communication Services Project, a University of the West Indies feasibility study of extension education services for the Caribbean, will be evaluated in a separate PES.

15. External Factors

Political transition in Peru has resulted in increased status for the project. The grantee has substantially increased its commitment of resources to the project.

Unexpectedly high equipment costs have required redesign of the experimental communication network. Seven communities, instead of the planned thirteen, will participate in the project.

16. Inputs

A. Commodities

A pre-project design study badly underestimated commodity costs. For example, the cost of VHF radiotelephones needed to link eleven small villages to the two large satellite ground stations was estimated in the design study to be $56,000. When the time came to procure this equipment, the actual cost turned out to be $271,000. Unfortunately, the low cost estimates had been used for project paper budgeting and subsequent authorization levels, and additional funding was not available

Furthermore, it did not seem desirable to fully finance such an unexpectedly expensive pilot system, since the intent of the project is to demonstrate a communication capability appropriate for rural communities in developing countries.

Because of the high costs of the VHF radiotelephone network, procurement was suspended, and ENTEL-Peru undertook a comprehensive cost analysis which projected not only direct equipment costs, but installation, operation, and maintenance costs for a ten year period. Based on this analysis, a system relying more heavily on satellite communications and less on terrestrial communication technologies appeared to be advantageous. A terrestrial radiotelephone system needs repeaters at high elevations. This requires construction of roads and constant maintenance and fueling of generators at remote mountaintop locations. Satellite communication, while initially more expensive in terms of electronic equipment required at each site, is apparantly a better value in the long run because remote repeaters are not required. Furthermore, satellite earth stations are more flexible, permitting easy addition of more telephone channels and reception of broadcast TV if desired in the future.

The original network design integrating two communities with satellite earth stations and eleven communities with radiotelephones has thus been substantially modified. In the revised network, AID will provide three satellite earth stations (with shipping and ancillary equipment) and ENTEL will connect the earth station communities with at least four additional nearby communities, using its own existing land line or other technologies.

Proposals from equipment suppliers have been received and evaluated, and a supplier has been selected. The supplier has agreed to permit ENTEL engineers to work in-plant during the final stages of system integration and testing, making it possible for ENTEL to do almost all of the on-site installation and testing in Peru. This approach greatly reduces costs compared with the "turnkey" contracts that ENTEL has had to accept from Japanese and Dutch suppliers of similar equipment purchased in the past by ENTEL. This project's requirement for the simplest possible, non-redundant design of satellite equipment has resulted in earth stations costing only one-quarter the cost of comparable equipment purchased by ENTEL from non-U.S. suppliers. The system design and procurement process has relied to a large extent on the participation and initiative of Peruvian engineers, and represents an unusually open and participatory approach to transfer of this kind of advanced technology.

It is now expected that the equipment will be shipped to Peru in May, 1982. The experimental communication system should be installed and operating in September, 1982. To complete the planned two years of operation followed by final evaluation and dissemination activities, the PACD will have to be extended from Dec. 31, 1983 to Dec. 31 1984.

B. Technical Assistance

Technical assistance to date has consisted of: (1) consultant visits to Peru to work with ENTEL project staff and potential user groups in planning the utilization of the experimental communication system, (2) site visits by the evaluation team to analyze existing communication patterns and communication needs, and (3) system design and procurement services. All technical assistance has been provided through two contracts with Human Resources Management, Inc., which has subcontracted for design studies and project evaluation.

Initial visits by applications and evaluation teams have resulted in a restructuring of the technical assistance plan. Instead of large amounts of short term technical assistance of different kinds, it has been decided that a permanent contract field manager is needed to maintain continuity and momentum of social applications, to focus user ministries' and ENTEL applications team's attention and energy on field (rather than Lima) activities, and to effectively manage contractor funds available to support field applications. Recruitment for a permanent contract field manager is now under way.

Due to high commodity costs, funds available in the project for applications, evaluation, and dissemination activities appear to be insufficient. It is likely that as actual field operation progresses, additional funds will be needed for technical assistance and regional dissemination in 1984, the final year of the project.

17. Outputs

A. Communication Network

The communication network (output #1) has been reduced in scope from 13 communities to 7.

B. Trained Peruvian Project Staff

U.S. training for Peruvian engineers is being provided in-plant by the equipment supplier. Training workshops have been held in the field for rural primary school teachers and health workers. Training of ENTEL social applications staff will be mainly field training given by the U.S. technical assistance team. A plan to bring an ENTEL staff person to Florida State University for graduate study in development communications and evaluation was abandoned when family commitments made it impossible for the individual to leave Peru.

C. Evaluation Studies

Briefings have been given at the Quito headquarters of ASETA, the Andean Pact Telecommunication Group. ENTEL has made formal presenta-

tions about the project at several regional professional meetings. A State Department representative made a presentation concerning the project at a U.N. meeting on "Peaceful Uses of Outer Space" in Buenos Aires. Articles concerning the project have appeared in Communication News, the Journal of Communications, Uplink, and Development Communication Reports.

18. Purpose: "To test and demonstrate the potential of communication technology, including satellites, for extending and improving agriculture, health, and education services to rural communities."

There is no reason to believe that this purpose cannot be satisfactorily achieved. In addition to the three traditional AID sectors identified in the original purpose statement, the project will also test and demonstrate utilization of the communication system by private commercial organizations active in the project area.

19. Goal/Subgoal

The goal is "To improve the quality of life in rural and poor communities in the LAC region." The subgoal is, "To improve the outreach and impact of developmental activities in rural areas."

Since actual field operation of the communication system has not yet begun, it is too early to assess progress toward achieving the goal and subgoal.

20. Beneficiaries

Private businesses such as banks, palm growers, livestock producers, and trucking companies have been added to the list of respective beneficiaries identified in the Project Paper.

21. Unplanned Effects

The complex and tedious process of design and procurement of the communication system has been a valuable learning experience for ENTEL, the 8(a) contractor that managed the procurement, and the AID project office. Technical options and price trade-offs identified in the course of bid evaluation and negotiation resulted in an improved system design and a more informed choice of equipment.

22. Lessons Learned

The project would have benefitted from a permanent and consistent source of engineering advice. AID, ENTEL, and the procurement contractor were confused and misled by the contradictory, imprecise and sometimes incorrect information provided by a parade of short-term engineering consultants.

23. Special Comments or Remarks

The project has benefitted from the strong commitment of the grantee, ENTEL-Peru, and excellent collaboration from USAID/Lima.