Allegations Of Mismanagement Of A Peruvian Highway Project Financed With U.S. Assistance Funds

Agency for International Development
Export-Import Bank
Department of Transportation

BY THE COMPTROLLER GENERAL OF THE UNITED STATES
Dear Senator Proxmire:

This is our report on allegations of mismanagement of a Peruvian highway project financed with U.S. assistance funds. Our review was made pursuant to your request dated April 19, 1971, that we determine the validity of charges of mismanagement made by Mr. Charles Pettis, who formerly worked as an engineer on the Tarapoto Highway project for Brown & Root Overseas, Inc., the project consultant.

We have not obtained formal agency, contractor, or consultant comments on this report; however, we have met with representatives of the Agency for International Development, the Export-Import Bank of the United States, and the Department of Transportation, as well as with the consultant, Brown & Root, Inc., and the contractor, Morrison-Knudsen, Inc., and discussed the facts included in the report. Their observations are included in chapter 9 of the report.

Officials of the Agency for International Development expressed concern regarding the possible adverse effect this report may have on the negotiations currently under way in Peru between the Government of Peru and the contractor to resolve the project problems. We informed them that we would make their views known to you but that any further observations by them on the disadvantages of public release of the information included in the report should be expressed directly to you as the review was performed at your request.

We believe that the contents of this report would be of interest to the Agency for International Development; the Export-Import Bank; the Department of Transportation; Brown & Root, Inc.; and Morrison-Knudsen, Inc. However, we plan to make no further distribution of this
B-172661

report unless copies are specifically requested, and then we shall make distribution only after your agreement has been obtained.

Sincerely yours,

[Signature]

Comptroller General of the United States

Enclosure

The Honorable William Proxmire
United States Senate
On April 19, 1971, Senator William Proxmire requested the General Accounting Office (GAO) to review allegations made by Mr. Charles Pettis, a former project engineer, of mismanagement of the Tarapoto-Rio Nieva Highway project in Peru. (See p. 73.)

FINDINGS AND CONCLUSIONS

The Tarapoto-Rio Nieva Highway was planned to extend for 232 kilometers in the northeast section of Peru. In 1964 the Agency for International Development (AID) and the Export-Import Bank of the United States approved financing totaling $35.1 million for the project. The Government of Peru's share of the project was about $12 million, which brought the total financing for construction and design costs for the road to about $47 million. As of October 1971 approximately $16.3 million of the U.S. funds had been disbursed.

To provide engineering services and control over the road project, Peru engaged Brown & Root Overseas, Inc., as the project consultant. Construction work was begun on the project early in 1966 by an international consortium headed by the firm of Morrison-Knudsen, Inc., as contractor. Beginning in January 1967 numerous problems and disagreements arose among the consultant, the contractor, and the Government of Peru over interpretation of contract terms and construction methods, primarily concerning the cause of, removal of, and payment for large landslides (hereinafter referred to as slides) that had occurred on the project. By February 1970, both the consultant and the contractor were no longer working on the project and the Government of Peru had taken over the project. The Government of Peru and the contractor are currently conducting negotiations in an effort to resolve project problems.

Mr. Charles Pettis, who was employed by the firm of Brown & Root Overseas, Inc., on the Tarapoto project made the following major charges.

Slide issue

Mr. Pettis charged that payment for slide removal during construction was not authorized under the terms of the contract and that furthermore,
because the slides had been caused by its negligence, the contractor should not be paid for much of this type of work. He charged also that the consultant originally had agreed with this position but later had changed its position and had agreed to authorize payment to the contractor for slide removal. Mr. Pettis stated that this change indicated that collusion existed between the contractor and the consultant.

GAO found that interpretation of contract terms regarding payment for slide removal by concerned parties had varied from one of supporting Mr. Pettis' position to one of contending that the specifications were unclear. The evidence in support of Mr. Pettis' charge of contractor negligence was conflicting. This conflict was evident in the positions taken by various experts brought to the project site to study the cause of the slide problem. (See p. 28.)

The Government of Peru has instituted a court suit against the two firms, which includes charges of poor workmanship, fraud, and collusion. The two firms have instituted court actions which, among other things, dispute the Peruvian Government's interpretation of the contract specifications. Because these issues are before Peruvian courts and therefore are matters for the courts to decide, GAO is not attempting to interpret the contract terms nor commenting on the alleged collusion charges.

The available facts confirm Mr. Pettis' contention that the consultant changed its position and authorized payment to the contractor for slide removal. Although this change of position would have required about $2.2 million additional for payment for removal of quantities of material involved in the slide dispute, officials of the Government of Peru and the U.S. Mission did not participate in any study or decisions reached by the consultant to authorize payment for removal of the slides. (See p. 22.)

Engineering design and practices by consultant

Mr. Pettis contended that the consultant's design for the Tarapoto road was deficient because, among other things, no core borings had been made to determine subsurface conditions but, instead, only shallow holes had been dug on the road line. He alleged that the consultant's design had not called for proper placement of drainage pipes under the roadway. Mr. Pettis also charged that the consultant's regional engineer had ordered the contractor to perform work totaling almost $1 million without having authority to do so from the Government of Peru or the U.S. Mission.

GAO found, on the basis of the data available, that the consultant had not performed geologic surveys nor taken adequate core borings, in areas involving deep roadway cuts; the drainage facilities under large fills had not been properly placed, which, in part, had caused the roadway fills to fail; and the consultant had approved a substantial amount of work without obtaining approval of the Government of Peru and the U.S. Mission. (See p. 29.)
The reasons why geologic surveys and core borings were not taken and sufficient pipe was not used on the project are not clear. The consultant's approval of a substantial amount of work without authorization appears to have stemmed from a disagreement over interpretation of contract terms. (See p. 30.)

Other charges

Mr. Pettis contended that, during the early stages of the project, the contractor did not have employees experienced in road construction or proper construction equipment. The evidence available to GAO tends to support this contention. GAO could not determine why these problems had occurred or whether there had been any resulting effects on the overall progress and quality of road construction. (See p. 37.)

Mr. Pettis alleged that a fellow consultant employee had improperly used contract funds derived from food payments for personal expenses and had charged the Peru contract for material and labor used to construct a private house for himself. A U.S. Mission audit and other records substantiate these claims. (See p. 41.)

GAO believes that restitution remains to be made for at least $3,200 for this employee's personal expenditures. If the Government of Peru does not recover funds involved in the irregularities with respect to the food operation or if it recovers only its share, AID and the Bank should take action to recover any improper food payments made to the companies. (See p. 50.)

The U.S. Mission in Peru and AID/Washington were aware of many of the project's problems by early 1967 but did not take substantive action until the end of 1968. The Bank relied on the other U.S. Government agencies and the two American firms involved to monitor the project. GAO believes that the U.S. Mission's organizational structure for managing this project and the apparent lack of coordination among the parties--AID, the Government of Peru, the consultant, and the contractor--involved in this project contributed to AID's lack of timely action to resolve project problems. (See p. 54.)

RECOMMENDATIONS OR SUGGESTIONS

GAO recommends that the Administrator of AID and the President of the Bank take action to ensure that:

--The consultant employee involved in the food fund operation and in the construction of a personal residence has made or will make full restitution for contract funds, material, and labor. (See p. 50.)

--If the Government of Peru does not pursue the irregularities concerned with the food operation or if it recovers only its share, AID and the Bank determine the validity of the certification made on the food payments and recover any improper amounts paid to the companies. (See p. 50.)
GAO recommends also that the Administrator of AID take action to ensure that AID officials responsible for project implementation are fully aware of and carry out AID's role of monitoring programs financed with U.S. foreign-aid funds. (See p. 63.)

GAO recommends further that, in projects where Bank funds are being used jointly with those of another Government agency, the President of the Bank take action to ensure that the Bank is provided with inspection or evaluation reports made by the other Government agency involved.

Upon completion of our review, GAO met with and discussed the factual contents of this report with officials of AID, the Bank, the Department of Transportation, the contractor, and the consultant. They generally agreed with the facts presented, and chapter 9 summarizes the views they expressed. (See p. 64.)
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**ABBREVIATIONS**

<p>| AID | Agency for International Development |
| GAO | General Accounting Office |
| PS/ | soles (basic unit of Peruvian currency) |</p>
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DIGEST

WHY THE REVIEW WAS MADE

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**RECOMMENDATIONS OR SUGGESTIONS**

GAO recommends that the Administrator of AID and the President of the Bank take action to ensure that:

--The consultant employee involved in the food fund operation and in the construction of a personal residence has made or will make full restitution for contract funds, material, and labor. (See p. 50.)

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GAO recommends also that the Administrator of AID take action to ensure that AID officials responsible for project implementation are fully aware of and carry out AID's role of monitoring programs financed with U.S. foreign-aid funds. (See p. 63.)

GAO recommends further that, in projects where Bank funds are being used jointly with those of another Government agency, the President of the Bank take action to ensure that the Bank is provided with inspection or evaluation reports made by the other Government agency involved.

Upon completion of our review, GAO met with and discussed the factual contents of this report with officials of AID, the Bank, the Department of Transportation, the contractor, and the consultant. They generally agreed with the facts presented, and chapter 9 summarizes the views they expressed. (See p. 64.)
CHAPTER 1

INTRODUCTION

At the request of Senator William Proxmire on April 19, 1971, the General Accounting Office has reviewed allegations of mismanagement of the Tarapoto-Rio Nieva Highway project in Peru that were made by Mr. Pettis. Our objective was to determine the validity of those allegations and whether Mr. Pettis had been employed on Government-financed projects after he left the Tarapoto project.

Mr. Pettis furnished us with a lengthy statement detailing numerous allegations concerning the management of the project. We have summarized in this report the major issues raised by Mr. Pettis and the evidence we found concerning them during our review.

Our review was conducted primarily in Washington, D.C., at the Agency for International Development, Department of State; the Export-Import Bank; and the Bureau of Public Roads, Department of Transportation. We visited the U.S. Embassy, the U.S. Mission, and the project site in Peru. We discussed the facts presented in this report informally with representatives of the U.S. Government agencies involved; the principal member of the construction contractor consortium, Morrison-Knudsen of Boise, Idaho; and the consultant, Brown & Root Overseas, Inc., a subsidiary of Brown & Root, Inc., of Houston, Texas.

We reviewed those documents provided by Mr. Pettis and by his lawyer. We reviewed also AID files and records—including the official loan documents; i.e., analysis of bids, specifications, contracts, loan agreements, monthly progress reports, briefing papers, and internal audit and investigative reports. We interviewed various agencies' officials, including, where possible, previously involved officials no longer having project responsibilities. The frequency with which responsible officers changed, both in Washington and in the U.S. Mission, and the change of government in Peru, however, precluded us from contacting and interviewing all U.S. Government officials who had had responsibility for the Tarapoto project.
CHAPTER 2

HISTORY AND CURRENT STATUS
OF TARAPOTO HIGHWAY PROJECT

In 1957 the Government of Peru expressed its intent to construct a road from the western coast of Peru to the Amazon River port of Yurimaguas in northeast Peru. The proposed road was intended to stimulate Peru's economic development by opening vast areas to agricultural production. Peru contracted with two American consulting firms on separate occasions to study the feasibility of such a road as well as the best routing for the road.

In July 1960 the Bank and an AID predecessor agency agreed to contribute $25 million each to cover part of the costs of a section of the Trans-Andean Highway. By 1961 the Government of Peru had assigned top priority to the construction of a part of this road. (A map showing the road's location is included in app. II.)

In May 1961 the Government of Peru engaged the firm of Brown & Root Overseas, Inc., to provide engineering services for several specified road projects. The consultant was directed by the Government of Peru to prepare detailed plans for the road along the general route selected by one of the earlier consultants.

By May 1963 the consultant had completed the fieldwork for survey and design of the road which became the Tarapoto highway project. A technical and economic feasibility study for 278 kilometers of road was presented to Peru in June 1963. The consultant received about $1.2 million for the design work on this project, of which a great percentage, according to the consultant, represented reimbursement for out-of-pocket costs. These costs were funded mostly through a Bank loan.

The consultant estimated an overall project construction life of 8 years at a total cost of $41,325,000. In September 1963 the consultant turned over complete construction plans to Peru.
In March 1964, after reviewing the consultant's studies and designs which attested to the technical feasibility of the project, the Bank and AID approved financing for the road project. On May 19, 1964, an AID loan (527-L-028) for $12.1 million was signed with Peru, and on June 25, 1964, Bank Loan 2155 for $23 million was signed, bringing total U.S. funds for the project to $35.1 million.

The difference between the Bank and AID lending and project costs, including cost overruns, was to be assumed by Peru. The AID loan was to assist Peru in financing the local costs of construction, and the Bank's loan was to finance the foreign exchange costs of construction.

The consultant prepared final construction drawings, specifications, cost estimates, and bidding documents which were subject to review and approval by Government of Peru, AID, and the Bank prior to issuance to bidders. Peru, AID, and the Bank agreed that bidding for construction of this highway would be open to one or more prequalified American construction firms in a joint venture with one or more prequalified Peruvian firms. Bid documents were released to prequalified joint ventures early in July 1964. On September 15, 1964, the bids received from three construction consortia were opened. The bids ranged from $58 to $71 million.

All bids considerably exceeded the consultant's original cost estimate. This difference was attributed, among other things, to an underestimate by the consultant, uncertainty about the stability of the Peruvian economy, and the risk of committing equipment in Peru for an 8-year construction period. The Government of Peru formally rejected the three bids on December 22, 1964. Peru conferred with AID and the Bank and then requested the consultant to reestimate the project.

In February 1965 the consultant submitted new estimates showing project construction costs of approximately $51.7 million. The addition of approximately $4 million for the cost of engineering supervision brought the total project costs to approximately $55.7 million.

AID and Bank representatives met with the President of Peru and responsible Peruvian Ministry officials in March
1965 to discuss getting construction of the road started. To lower the cost and bring the project within available funding, it was decided that, with consultant supervision, a 33-kilometer section of the road would be constructed by the Peruvian Army, which brought Peru's total area of responsibility to approximately 50 kilometers. It was decided also to change the surfacing specifications of the road by deleting the base course and the asphalt surface and substituting a gravel, or similar crushed-aggregate, surface.

The project was readvertised in April 1965. In April Peru and the consultant signed a new contract, as their previous contract had expired.

By the end of July 1965, four construction proposals had been received. The lowest bidder was Constructora Emkay, S.A. at approximately $43.4 million exclusive of taxes. The other bids ranged from $44.4 to $57.2 million. The consultant estimated its cost at $3.5 million, which brought the total project cost to approximately $47 million. On the basis of the consultant's bid analysis, Peru signed a contract, which had AID and the Bank's approval, with Constructora Emkay, S.A. (hereinafter referred to as the contractor). The consortium's name was changed during the project to Conselva. Conselva consisted of the following companies: Constructora Emkay, S.A.; Consorcio de Ingenieros Contratistas Grals, S.A.; Florez & Costa, S.A.; Grana y Montero, S.A.; Oman Construction Co., Inc.; Wright Contracting Co.; and J.A. Jones Construction Co.

Actual construction work began early in 1966 after some delay which was attributable to the difficulty of supplying heavy equipment to a remote tropical area. Beginning in January 1967, reports prepared by Bureau of Public Roads Highway Advisors for AID (hereinafter referred to as Highway Advisors) cited the emergence of numerous consultant-contractor disagreements. These differences of opinion concerned construction methods--i.e., blasting procedure and access road location--and interpretation of specifications primarily regarding payment of slide removal.

Early in 1968 Peru began experiencing difficulty in meeting its share of monthly payments to the contractor and
the consultant. Financing of the unit cost contract-bid items is provided 60 percent by the Bank in U.S. dollars and 24 percent and 16 percent by Peru and AID, respectively, in soles (PS/), the local currency. The inability of Peru to meet its share of monthly payments continued through 1968. Since AID payments were made after approval and payment by Peru, AID's payments also were delayed, although at one point AID began disbursement 2 months ahead of Peru to ease the financial problems of the contractor. In July 1968 the contractor threatened to reduce its work force unless monthly payments were current.

The slide dispute continued until September 1968 when the project was visited by top officials of the consultant and the contractor. An agreement on the slide problem was reached. In essence the two companies agreed that previous refusals of consultant field officials to pay for slide removal were wrong and that additional payments were due the contractor. This reversal of opinion would have resulted in a considerable overrun in project costs to be borne by Peru. The Government of Peru refused to accept the decision of the consultant and contractor, and all subsequent requests for payment were denied. On October 3, 1968, a military junta assumed control of the Peruvian Government.

In December 1968 Mr. Charles Pettis accompanied a Peruvian engineer from the project to the U.S. Mission to report numerous irregularities on the Tarapoto project. An internal AID audit was initiated early in 1969, and the AID Inspections and Investigations staff was requested to conduct a detailed inquiry as a result of the preliminary audit findings.

Productive work was gradually reduced in February 1969 when the contractor stated that payments not being made after June 1968 necessitated such action. Peru wrote to the consultant expressing no confidence in April 1969 and suspended the consultant's contract in May 1969. AID agreed to a Peruvian request in June to obtain a new consultant firm.

In July 1969 Peru assumed engineering control of the project. Peruvian engineers supervised the engineering and general direction of contractor work. The contractor agreed
to work on a direct-cost or force-account basis until a new consultant could be retained. Work did continue but at a much reduced level. Also in July 1969 the Minister of Transport and Communications wrote directly to AID/Washington for assistance in solving project problems. (See p. 59 for discussion of this letter.)

As a result of a special Ministry of Transport and Communications commission report issued in August 1969, Peru initiated legal action against the consultant and the contractor claiming collusion, fraud, poor workmanship and supervision, etc., in September 1969. Both the contractor and the consultant have filed counterclaims.

In December 1969 the contractor informed Peru that unless certain conditions--i.e., dropping litigation, permitting an independent analysis of slides, making payment for already approved work, and obtaining a new consultant--were met, the contractor would stop work on February 1, 1970.

In its response, the Government of Peru contended that, in essence, the whole project had been under complete Peruvian control from July 1969. In February 1970 the contractor removed its employees from the project and the Ministry assumed complete control of the work and of contractor assets.

In response to a second letter from the Government of Peru to AID/Washington in January 1970, a special commission was sent to Peru to discuss possible solutions to the project's problems. The AID/Washington team was unsuccessful in reaching an agreement with the Government of Peru in the spring of 1970, but the U.S. Mission and the Embassy have continued to maintain contact with the Peruvians on these issues. No definitive agreement has been reached by November 1971.

The U.S. Mission has estimated that the contractor was responsible for approximately 95 kilometers of road before the Peruvian take-over. According to the U.S. Mission, this did not include a segment of road where an appreciable amount of clearing, pioneering, and bridgework was done by the contractor.
Since Peru assumed control of the road, it has graded approximately 46 kilometers of and has stabilized a few, isolated sections. In addition, the Peruvians have done a large quantity of slide removal, road line relocation, fill replacement, and maintenance on the approximately 95 kilometers worked on exclusively by the contractor. The U.S. Mission estimates that approximately 91 of the original 232 kilometers of road construction have yet to be started.

The present loan balances of the lending agencies are about $18.8 million--$9.5 million of the AID loan and $9.3 million of the Bank loan. These balances do not reflect work included on monthly pay estimates signed by the consultant but unapproved by the Peruvian Government, wage escalations, slide removal, or other cost overruns. AID records stated that, because of these factors, the road, as originally designed, could not be built within the project estimate but would cost from 25 to 75 percent more. AID and the Bank, however, are prepared to agree with a Peruvian proposal to further reduce design standards to limit project costs.
CHAPTER 3

SLIDE ISSUE

One of the principal issues raised by Charles Pettis concerned the attempts by the contractor to obtain payment for the removal of slides occurring during construction. Mr. Pettis charged that payment for slide removal during construction was not authorized by the terms of the contract and that in any event the contractor should not be paid for much of this work because the slides had been caused by the contractor's negligence. He stated that the consultant originally had agreed with his views but later had changed its position and had agreed to authorize payment for slide removal. Mr. Pettis also charged that this change in payment policy indicated that collusion existed between the two firms.

Details concerning the charges made by Mr. Pettis and the evidence found by us regarding these issues are discussed below. A map showing the location of the principal slide areas and some recent photographs of the Tangarana area are on pages 75 to 77.

INTERPRETATION OF CONTRACT TERMS

Mr. Pettis stated that he had informed the contractor that, on the basis of the terms of the contract, the contractor could not be paid for all slide removal.

GAO observation

Our review of the contract between the Government of Peru and the contractor showed that it incorporated the terms of the "Specifications for the Construction of Highways and Bridges, 1963 edition" which had been prepared by the project consultant as an overall specification for highway and bridge construction in Peru, and incorporated also special provisions relating to the specific project.

The contract included removal of rubble as a separate bid item, and the records we examined showed that some slide-removal work would be paid for under this item. The basic point is whether slides occurring during construction should be paid for.
THE REGION EAST (SOUTHEAST) OF MOYOBAMBA CONSTITUTED THE MAJOR PROJECT LANDSLIDE AREA. — (COURTESY OF U.S. MISSION)

THE PRINCIPAL LANDSLIDE IN THE TANGARANA AREA WAS VIEWED FROM AN OPPOSITE SLOPE BY A GAO AUDIT TEAM. PARTICULAR NOTE SHOULD BE MADE OF THE ACCESS ROAD LOCATED DIRECTLY ABOVE THE MAIN ROAD. MAJOR SLIDES OCCURRED IN THIS AREA IN LATE 1968. — (GAO PHOTOGRAPH, MAY 1971)
THESE TWO PHOTOGRAPHS ARE CLOSE-UPS OF THE MAJOR LANDSLIDE AREA IN THE TANGARANA, VIEWED TOWARD THE TOWN OF MOYOBAMBA. (GAO PHOTOGRAPH, MAY 1971)
General specification 24-5.1 provided that payment for unclassified excavation be made at the contract unit price. Specification 24-4.1, which provided for measurement of the volume to be paid for, stated that "The measurement shall include overbreakage due to slides when not attributable to carelessness of the contractor." This specification was deleted by special provision 3.3 which provided that slide removal be considered as a separate bid item.

The general specifications also provide:

"1-7.15 CONTRACTOR'S RESPONSIBILITY FOR THE WORK:

Until acceptance of the work by the Ministry, or acceptance in conformance with Subsection 3.8. Opening Sections of Project to Traffic, the work shall be under the full charge and care of the Contractor, and he shall take every necessary precaution against injury or damage to any part thereof by action of the elements or from any other cause, whether arising from faulty materials or work or from the execution or non-execution of the work. The Contractor shall rebuild, repair, restore, and make good all injuries or damages to any portion of the work occasioned by any of the above causes before its completion and acceptance, and shall bear the expense thereof, except for damage to the work due to reasons of force majeure, for slides found by the Resident Engineer to have been unavoidable, and for ordinary wear and tear on any section of the road due to normal use by traffic."

Special provisions provided also that:

"2.32 Maintenance During Construction -

"The contractor will be responsible for the maintenance of the Highway, or sections of the Highway, until completed and accepted by the Highway Department ***."
"2.35 Maintenance After Acceptance -

"** Removal of all slides of 50 cubic meters or less during the maintenance period shall be considered a part of maintenance. The removal of all slides over 50 cubic meters shall be a pay item and shall be measured and paid for at the contract unit price for slide removal."

Mr. Pettis contended that these provisions should be interpreted that generally the contractor should not be paid for slide removal during construction. The contractor contended that, since payment for removal of major slides had been eliminated from the roadway and drainage excavation specifications by the inclusion of special provision 3.3, removal of all major slides would be paid for under bid item 7, Slide Removal, in the contract as soon as each slide was removed by the contractor. The contractor contended also that bid item 7 was not limited to slides which occurred after the road was essentially complete, since the contract specifications did not state or infer such a limitation.

Interpretation of the specifications by other concerned parties varied. For example, a Highway Advisor took the position that the wording of the slide-removal provision clearly implied that slide removal was expected to be performed only after a particular cut had been completed and the contractor had moved out his excavation equipment.

On the other hand AID/Washington officials, after analyzing the contract terms, took the position that the terms did not clearly state whether payment would be made for removal of slides which occurred during construction. The consultant hired by AID to study the slide issue concluded that the payment for slides and the methods of measurement (whether during excavation or during maintenance) were not clearly defined.
CONTRACTOR NEGLIGENCE CAUSED SLIDES

Mr. Pettis stated that the contractor should not be paid for much of the slide-removal work because the slides had been caused by the contractor's negligence. Mr. Pettis' charges of negligence or improper construction practices related primarily to:

1. Overblasting the slopes.

2. Undercutting the toe, or bottom, of the slopes. Mr. Pettis maintained that in 95 percent of the cut slopes the toe of the slopes had been undercut to accommodate the roadway width. This was done reportedly because of alignment and grade errors by inexperienced grade checkers employed by the contractor.

3. Improperly constructed access roads. These roads were built at the top of the cut slopes, which resulted in adverse vibrations from equipment moving over the roads and in water ponding that drained down the slopes and caused slides.

GAO observations

The contractor disagreed with Mr. Pettis' charges but continued to remove the slides on its own without directions from Mr. Pettis. The records we reviewed indicated that the contractor wrote letters to the consultant for each slide removed, in which it blamed the slides on poor design or bad ground.

We found conflicting evidence as to the validity of the charges that slides were caused by contractor negligence. This conflict existed among the statements made by experts and consultants brought to the project to study the slide problem by the consultant, the contractor, the U.S. Mission, and the Government of Peru.

Records reviewed at the U.S. Mission showed that 11 different consultants or experts had reviewed the slide problem and had issued reports. (See app. III for a listing of these reports.) In addition, records furnished to
us by Mr. Pettis showed that two other experts were brought to the project by the consultant in May and June 1967. The reports from these two consultants were in addition to the listing provided to us by the U.S. Mission.

The report issued in May 1967 tended to support Mr. Pettis with regard to the effects of overblasting and construction of access roads above the cut slopes. The report issued in June 1967 by a geologist and blasting expert had this to say about the blasting.

"The massive blasting with deep drillings located on the theoretical line of cut and charged exclusively with powerful explosives speed and facilitates the work, allowing the machinery to eliminate rapidly the material which by this intensive explosives, results much more fragmented.

"The negative result of this method is that the vibrations of the explosions is felt on the contiguous zones to the cuts perturbing the solidity of the terrain and opening small cracks on the ground through which water can filtrate thus increasing the landslides and causing failures.

"Even though it is impossible, for obvious reasons, to eliminate completely the contrary effects caused by the explosions on the stability of the cut slopes on the type of rocks which are present in this project, it is possible to reduce it, using some restrictions in the use of explosives for blasting."

On the other hand records which we reviewed showed that many of the other consultant's reports on the project attributed the problem of the slides to geological conditions found at the project site or to the height of the design-cut slopes.

For example, a consultant hired by AID concluded in March 1969 that slides would occur for reasons determined, among other things, by the character of materials and by the height of the design slope. The report added that slides would occur regardless of operations and that the contractor
could not anticipate their volume or number. Further, the frequency of slides demonstrated that this was a result of physical conditions throughout the area. The report suggested that the Government of Peru enter into negotiations with the contractor to settle the slide issue.

The Government of Peru also sponsored several studies to determine the causes of the slide problem. According to U.S. Mission records, a report highly critical of the contractor and the consultant, but recommending negotiation of the slide issue, was released in April 1969 by a special commission of the Peruvian Highway Department. According to a U.S. Mission official, another report issued on April 1969 by a private consulting firm hired by the Government of Peru was reported to be completely favorable to the contractor. Records reviewed indicated that both of these reports had been withdrawn by the Government of Peru immediately after issuance.

In May 1969 a new commission, known as the Special Ministry Commission, was formed by the Government of Peru to investigate the project. In August 1969 this commission issued two reports which, according to U.S. Mission records, were highly critical of both the contractor and the consultant. These reports formed the basis for the Government of Peru's charges against the companies of, among other things, collusion, fraud, poor workmanship, and poor supervision.

The existence of conflicting evidence on contractor negligence in causing the slides was also found in the U.S. Mission records we reviewed. For example, a Highway Advisor, in his preliminary report of a road-site inspection in April 1968, commented on the seriousness of the slide problem. He noted the project consultant claims that the slides were due to contractor negligence and therefore the consultant would not approve payment to the contractor. The report also contained the following recommendation and opinion.

"The question must be resolved immediately and it is recommended that AID apprise the EXIM Bank of this and begin discussions with the Highway Department officials to arrive at a decision that will settle the question of responsibility of the
slides. My initial observations indicate that there is a difference of opinion in the interpretation of the specifications covering the work. The consultant has a good reason for disallowance based upon negligence on the part of the contractor. A firm interpretation of the spec. must be made now and the contractor must be persuaded to change his construction method to minimize the slides."

The above information was part of a Highway Advisor's one-page preliminary report which he was required to submit to U.S. Mission officials within 48 hours after completion of his inspection. A detailed report, along with any photographs taken during an inspection, is required by an AID Manual Order. Such a report usually is submitted to U.S. Mission officials within 1 to 2 weeks after completion of an inspection. It is interesting to note that the Highway Advisor, in his detailed report submitted in April 1968, stated that the cause of the slides was not yet definitely identified and made no mention of his earlier comment as to the consultant's having good reason for disallowing the contractor's claims.

We found that, in contrast to the above position, which appeared to recognize that contractor negligence was a problem effecting the slide issue, later records indicated a different U.S. Mission position on the issue. For example, in March 1969 an AID inspection team, made up of U.S. Mission, AID/Washington, and Bureau of Public Roads officials, visited the road site. The team recommended that the disputed quantities of slides be verified separately and be considered separately by the Government of Peru.

The trip report expressed the view that, although no quantitative determination had been made by the inspection group, it was generally agreed that many of the slides examined would have occurred regardless of the construction procedures and that this was related primarily to design standards accepted in the first place for what was obviously a difficult area geologically.

The U.S. Mission's position on the slide issue was further defined during a meeting between U.S. Mission and
Government of Peru officials in May 1969. At this meeting the Mission took the position, on the basis of its consul-
tant's report, that the combination of the design and the
geological conditions in the area constituted the main
cause of the slides. The U.S. Mission took the position
also that the contractor had performed normally.

The records we reviewed indicated that the U.S. Mis-
sion's position that the contractor had performed normally,
in addition to being supported by its consultant, was based
on a belief that the charges against the contractor's con-
struction procedures had failed to take into account such
factors as the volume of work, the time schedule, the iso-
lation of the project, and the adverse conditions encoun-
tered. The records further showed that the U.S. Mission
had recognized some deficiencies in the contractor's opera-
tion but that its work was in general accord with conditions
to be expected in this area.
CONSULTANT CHANGED POSITION AND AGREED TO AUTHORIZE PAYMENT FOR SLIDE REMOVAL

Mr. Pettis stated that the project consultant from July 1967 until mid-1968 supported his position that the contractor's negligence or improper construction practices had caused many of the slides. According to Mr. Pettis, the consultant, as a result of a meeting between high-level officials of the consultant and the contractor, notified the Government of Peru in September 1968 that many of the slides were due to geological conditions and that therefore the contractor should be paid for slide removal.

Mr. Pettis stated also that three different pay estimates were prepared for September 1968 and that the last two each included an amount for slide removal. He added that the Government of Peru had not accepted the consultant's new position on the slide-removal payment or the September pay estimates.

GAO observation

Records reviewed at the U.S. Mission reported the existence of correspondence among the project consultant's Peru staff that supported Mr. Pettis' position on the slide issue during the period July 1967 to mid-1968.

U.S. Mission records we reviewed confirmed that a meeting was held at Tarapoto in the early part of September 1968 between high-level officials of the contractor and the consultant to consider the slide issue. Records showed that at that time the consultant brought a geologist from within its own organization to the site for another investigation of the slide problem. The geologist's findings, which attributed much of the slides to the geological condition of the area, were used by the consultant as the basis for reversing its position on paying for removal of the slides.

This position was reflected in the consultant's September 11, 1968, letter to the Government of Peru, which stated that a large part of the slides were unavoidable and would have occurred no matter what construction methods had been employed. The letter to the Government further added that
the consultant's engineers assigned to Peru had been in-
structured to include amounts for slide removal in the monthly 
pay estimates that the consultant felt the contractor should 
be paid.

We found that representatives from the Government of 
Peru did not participate in the meeting in September 1968. 
Records furnished to us by Charles Pettis showed that the 
decision on the slides had been reached on the basis of an 
inspection of the slide area made by representatives of the 
contractor and the consultant, excluding Mr. Pettis. A 
record of this inspection, prepared by the Assistant Resi-
dent Engineer for the consultant, indicated that the offi-
cials of the consultant and the contractor had previously 
discussed the slides and apparently had agreed that removal 
of 80 percent of all the disputed slides would be paid for.

It was further reported that many of the decisions to 
pay for removal of the slides in question were made as the 
result of an inspection from their moving vehicle rather 
than a detailed inspection. The Assistant Resident Engineer 
expressed the view that the inspection trip had been com-
pletely unnecessary and that it had been, for all practical 
purposes, a "traveling circus."

The contractor's position on the agreement reached 
with the consultant at the September 1968 meeting was de-
scribed in a record of an interview between high-level 
contractor officials and U.S. Mission representatives in 
March 1969. This record showed that the contractor's offi-
cials had been questioned about the slides and reminded 
that there was visible evidence of questionable construction 
practices, such as horizontal shot holes and slope under-
cutting.

The contractor officials readily admitted that this 
either had occurred or could have occurred and that the 
contractor would have to expect to be penalized to some 
extent for this. The record showed further that the con-
tractor officials had insisted that for ordinary work such 
instances were not unusual and that in this case they rep-
resented a very small fraction of the total work.

The record of this meeting further reported that the 
contractor had agreed to accept payment for removal of about
80 percent of the total volume of disputed slides that had occurred as a reasonable compromise in order to get paid. The record of the meeting also reported that a contractor official had insisted that the 20-percent reduction did not represent the contractor's true opinion as to its actual liability but only a compromise to keep from coming to a dead halt on the question of slide removal.

U.S. Mission records confirm Mr. Pettis' statement that three separate September 1968 pay estimates were prepared. A report of what transpired in the preparation of these estimates was given to us by the U.S. Mission, as follows:

"***The result of this joint inspection was that Pettis, Donelson, et al were instructed to include 1,298,000 M3 [cubic meters] as Slide Removal on the next, or September, Estimate. Pettis refused to do this, and instead, prepared the September Estimate without including the Slide Removal Item. As was customary, he furnished an advance (unsigned) copy of the Estimate to the GOP [Government of Peru] Coordinator for his review. The Contractor refused to sign this Estimate; Pettis was removed as Resident Engineer and Donelson designated, and a new Estimate was prepared including the slides. The GOP Coordinator then refused to sign the new Estimate. A party of the Engineer [consultant] and Contractor then left for Lima with the Estimate, apparently with the idea of getting it signed by the GOP in the Ministry. In Lima, second thought were had about the legality, of paying for the slides as Item 7, Slide Removal; therefore, the Engineer [consultant] prepared a third Estimate, this time putting the precise amount of 1,298,000 M3 in as additional excavation. By this time, however, the GOP Coordinator in Tarapoto had informed the Ministry of the other 2 Estimates, there had been a change in Government, and the Estimate was never accepted by the Ministry. ***"

At the exchange rate and unit cost provided for in the contract, payment for removal of 1,298,000 cubic meters of slides would have amounted to about $2.2 million.
The U.S. Mission informed us that it never had been consulted concerning the September 1968 change in the consultant's policy on slide removal payment and that, since the monthly pay estimates came to the U.S. Mission from the Government of Peru, the U.S. Mission never had had to officially pass judgment on whether the slide removal could be paid for in one way or another because the pay estimates in question never had been approved by the Government of Peru.
ALLEGED COLLUSION BETWEEN CONSULTANT AND CONTRACTOR FOR PURPOSE OF PAYING FOR SLIDE REMOVAL

Mr. Pettis stated that meetings between the consultant and contractor and the consultant's change of position in September 1968 agreeing to pay for removal of the disputed slides indicated that collusion had existed between the two firms.

GAO observations

In support of his charge of collusion, Mr. Pettis furnished us with copies of two letters. One letter was a confidential-personal exchange from a vice president of the contractor to the consultant's vice president for Latin America in March 1968 concerning the slide dispute. The letter expressed the view that, historically, the Highway Department had been willing to pay for removal of slides that occurred on such projects, and the writer hoped that the contractor had not been prejudiced because of past correspondence from the consultant.

This letter, rather than referring to a request for payment for removal of all slides without reverting to arbitration, as maintained by Mr. Pettis, appeared to be discussing removal of one particular slide in this context. The letter, however, did refer to the very large quantity of slide material which the contractor had removed and for which he felt entitled to payment. The contractor official expressed the hope that the consultant official would do everything he could to pick up these payments.

The other letter was written in October 1968 by the consultant's regional engineer to his manager in Lima. This letter, which was used by the regional engineer to deliver the second September 1968 pay estimate, stated that the estimate included the cost for 1,290,000 cubic meters of additional excavation in accordance with orders received from executives of the consultant. The regional engineer's letter further stated that the quantity for removal of additional excavation had been given by the contractor and had not been confirmed by the technical staff. The letter reportedly was a personal communication obtained by a Peruvian employee of the consultant.
U.S. Mission records showed that Mr. Pettis, along with a Peruvian engineer from the road project, had met with U.S. Mission officials in late December 1968 concerning the collusion charge, the regional engineer's use of the food fund, and the construction of a house for the regional engineer with consultant's labor. The U.S. Mission records indicated that Mr. Pettis went to the U.S. Mission on these matters because the Peruvian engineers on the project intended to release information on the irregularities to the press in Lima if something was not done on the project problems.

U.S. Mission records showed that, as a result of these meetings, the U.S. Mission took action in December 1968 to initiate an audit of the consultant's food fund and an investigation into the construction of the regional engineer's house. Details on these matters are included in chapter 6.

In February 1969 AID initiated an investigation of the collusion charge. After an extensive study which lasted until June 1970, AID's General Counsel reviewed the investigation's results and concluded that the amount associated with the alleged collusion (concerning claims for slide removal) had not been paid out by either AID from loan funds or the Government of Peru from other funds. The Office of the General Counsel, AID, commented that the contractor apparently never actually had submitted a final claim for payment for slide removal and concluded that, since no funds had been spent for the slide-removal item, no claim or further action by AID in this regard appeared to be warranted. Accordingly the case was not submitted to the Department of Justice and was closed.

From the records available to us, we noted that the contractor and the consultant had included amounts for the disputed slide-removal charge on pay estimates. These amounts were subsequently withdrawn from the pay estimates by the contractor and the consultant, and consequently no U.S. Government or Peruvian funds were paid for removal of any of the disputed slides.
CONCLUSIONS

The records showed that the interpretation of contract terms regarding payment for slide removal by concerned parties had varied from one of supporting Mr. Pettis' position to one contending that the specifications are unclear. Regarding Mr. Pettis' charge of negligence on the part of the contractor, we found that the evidence in support of this charge was conflicting. This conflict existed between positions taken by the various consultants brought to the project site to study the cause of the slide problem. In addition, different opinions have been expressed by officials within the U.S. Mission and AID/Washington on the charge of contractor negligence.

The Government of Peru and the contractor have made charges and countercharges which relate, in part, to the dispute over the interpretation of the contract specifications for payment of slide removal and to the issues of poor workmanship, fraud, and collusion between the two firms. We believe that, because these issues are before the Peruvian courts, they are matters for the courts to decide. Therefore we believe that we should not attempt to interpret the contract terms nor comment on the collusion charges.

The record is clear that meetings were held between the contractor and consultant in September 1968 and that as a result the consultant reversed its position on paying for removal of slides which occurred during construction and which earlier had been considered as unacceptable for payment due to contractor negligence. In view of the significance of this change in position and the fact that the change would have required about $2.2 million additional for payment for removal of quantities of material involved in the slide dispute, we believe it worthy of note that officials of the Government of Peru and the U.S. Mission did not participate in any study or decisions reached by the consultant to authorize payment for removal of the slides.
CHAPTER 4

ENGINEERING DESIGN AND PRACTICES BY CONSULTANT

Mr. Pettis raised several issues concerning the design prepared by the consultant. Details on these issues and the evidence found by us are as follows.

SLIDES COULD BE EXPECTED DUE TO PROJECT DESIGN

Although Mr. Pettis took the position that many of the slides had been due to contractor's negligence, as discussed in chapter 3, he did recognize that a great deal of sliding could be expected because of the roadway cuts and the almost vertical slopes of the cuts required by the design.

GAO observation

Available records showed that the deep cuts and high slopes were attributable to the design standards adopted by the Government of Peru. The road as designed had high standards with respect to its grade, curvature, and width. U.S. Mission records indicated that, to achieve the design standards set for this road in the terrain involved, enormous road cuts and fills had been required. The design philosophy for the project specified steep slopes to conserve excavation quantities for reasons of economy.

The records showed also that the Government of Peru, AID, and the Bank had approved the road design which included the deep cuts and high slopes. Reports made on the project and opinions expressed in connection with the slide difficulties since 1968, however, pointed out that slide problems could be expected on the project due to the deep cuts and high slopes. For example, the former Chief of Engineering in AID/Washington advised us that, on the basis of the design criteria for the project, slides should have been expected.

LIMITED CORE BORINGS TAKEN BY CONSULTANT

Mr. Pettis contended that no core borings had been made but, instead, only shallow holes had been dug on the
road line. He indicated that soil surveys and core borings normally are made prior to the design phase of a project for the purpose of determining subsoil conditions. Such information is then used to assist in deciding the best line of a proposed roadway.

**GAO observation**

From a review of engineering literature and discussions with engineers, we observed that geologic studies, soil surveys, and core borings usually are taken prior to any decision concerning the road alignment. Further review showed that no geologic studies were made and that the soil surveys made by the consultant had consisted of digging holes 6 to 10 feet deep along the route of the roadway. In 1964 a U.S. Mission official reported that core borings had not been taken in a few sections where deep cuts were required because of the lack of equipment and funds. The U.S. Mission official contended that such sections were limited. During our visit to the project in May 1971, we noted numerous cuts which were much deeper than 10 feet.

In May 1971, in a discussion with us on this matter, the U.S. Mission's Chief Engineer admitted that the core borings had not been made over the length of the project but explained that the method of design employed by the consultant had envisioned that, after construction was started, the consultant normally would make adjustments to the road alignment to keep it running correctly.

It is interesting to note that U.S. Mission records indicated that the project consultant's manager and regional engineer in many cases had refused to make adjustments to the road alignment after the construction started in 1966. This policy was confirmed by an expert hired by AID in 1969 to study the project. The expert stated that the project consultant was inflexible when it came to changing the design and that this policy, in itself, was self-destructive.

There is conflicting information as to the reason why core borings or geologic studies were not performed by the consultant. The Government of Peru's investigating committee on the Tarapoto highway in August 1969 criticized the
consultant for not making adequate core borings and geologic studies of the area prior to design. On the other hand U.S. Mission records indicate that the consultant had contended that its request to do the above-mentioned borings and studies had been turned down by the Government of Peru. The consultant's contention was disputed by the Government of Peru in its court action against the consultant and the contractor.

ROAD FILL FAILURES DUE TO DEFICIENCIES IN CONSULTANT'S DESIGN

The basic issue raised by Mr. Pettis on this aspect of the work was that the consultant's design did not permit the placing of drainage pipes at the bottom of the fills but, instead, required that they be placed on the side of the fill. Mr. Pettis contended that, as a consequence, water weakened the bottom of the fills and eventually caused the fills to fail. An illustration of Mr. Pettis' allegation follows.

GAO observation

During construction many locations were encountered where the road line crossed over draws or ravines on the sides of the mountains. For the road to cross these areas, it was necessary to fill them in with dirt, usually brought in from other sections of the project. Under these fill areas the drainage pipes were to be so placed as to enable water to flow freely through the fill area and down the mountains.

In May 1971, accompanied by the Highway Advisor and two Peruvian Highway Department engineers, we visited the road site. The Peruvians pointed out eight large fill failures which had occurred along sections of the roadway constructed by the contractor. These failures essentially occurred after the contractor had left the project site. The Peruvian engineers attributed the failures to incomplete or improperly installed subdrainage facilities or to the lack of complete stripping of unsuitable materials under the fill.
SIDE VIEW OF ROAD

ILLUSTRATING THE ALLEGATION THAT DRAINAGE PIPES WERE IMPROPERLY PLACED AT THE SIDES OF FILL AREAS, RATHER THAN AT THE BOTTOM

EXCAVATION AREA

FILL AREA

DRAINAGE PIPE AS PLACED BY THE CONTRACTOR

ALLEGED PROPER LOCATION
The Highway Advisor, in response to our inquiry on this matter, concurred with the reasons given by the Peruvian engineers for the fill failures. He stated that:

"***Without a time consuming study involving a lengthy trip to the project site, it will not be possible to go into the reasons for each individual failure, and even then the conclusions may be suspect since it depends upon the memory of persons involved. My own inspections of the project, however, permit me to make observations pinpointing three causes which, to my knowledge, occurred singly or in combination in all of the eight failures. These are, in order of importance, the following:

"1. Failure to install sufficient amounts of sub-drainage facilities under the fills, or incorrect location of such drainage facilities.

"2. Failure to strip out unsuitable materials and prepare an adequate foundation under the fills, most of which are on steeply sloping side hills.

"3. Improper location, both horizontally and vertically, of the main drainage facility (culvert) in the fills.

"All three of the above factors are the direct responsibility of the Engineer [consultant] since he orders the amount and placement of the sub-drainage, the amount of stripping and foundation preparation to be performed, and the length, spatial placement and entrance exit treatment of the main culvert."

The Highway Advisor also informed us that the Peruvian engineers maintained that construction practices had not been the underlying causes of the eight fill failures.

The Highway Advisor made an effort to find out why sufficient quantities of drainage pipe had not been used. He informed us further that the consultant's employees had advised him that all the items for the drainage facilities
had been involved in overruns of quantities greatly exceeding the original estimates with the implication that efforts had been made by the consultant to keep these overruns within reason and within project financing.

The Highway Advisor added that the construction site is subject to heavy rainfall; that the lower parts of the fills and foundations had become saturated 1 or 2 years after construction; and that, as a result, almost any cause, such as the weight of the fill itself or a period of heavy rain, could have triggered the failure.

The Highway Advisor also mentioned that consideration must be given to the fact that the fills which had failed had been inspected regularly by the Peruvian project coordinator or his employees during construction and that therefore it must be assumed that the coordinator had been aware of the consultant's cost-cutting efforts.
CHARLES PETTIS CHARGED THAT IN JULY OR AUGUST 1968 THE CONSULTANT'S REGIONAL ENGINEER HAD ORDERED THE CONTRACTOR TO PERFORM WORK THAT TOALED ALMOST $1 MILLION WITHOUT HAVING AUTHORITY TO DO SO FROM THE GOVERNMENT OF PERU OR THE U.S. MISSION. MR. PETTIS CHARGED ALSO THAT THIS WORK WAS GIVEN TO THE CONTRACTOR THROUGH WHAT IS KNOWN AS A DIRECTIVE INSTEAD OF THROUGH AN APPROPRIATELY APPROVED CHANGE ORDER. MR. PETTIS ALSO STATED THAT IN CERTAIN AREAS THE CHANGES FOR WHICH THE REGIONAL ENGINEER HAD APPROVED PAYMENT WERE CHANGES THAT THE CONTRACTOR ALREADY WAS OBLIGATED TO PERFORM UNDER THE CONTRACT AS A PART OF MAINTENANCE.

GAO OBSERVATION

A CHANGE ORDER CONSISTS OF A WRITTEN REQUEST FROM THE CONSULTANT TO THE CONTRACTOR REQUIRING WORK TO BE PERFORMED THAT IS IN ADDITION TO THE WORK SPECIFIED IN THE BASIC CONTRACT. A U.S. MISSION AUDIT REPORT ISSUED IN JUNE 1969 ON THE AID LOAN FOR THE PROJECT STATED THAT CHANGE ORDERS HAD BEEN ISSUED WITHOUT THE U.S. MISSION'S APPROVAL AND THAT THIS FACT WAS FIRST REPORTED TO THE MISSION IN DECEMBER 1966 AFTER THREE CHANGE ORDERS HAD BEEN ISSUED.

The audit report stated also that it took the U.S. Mission 2 years, until December 1968, before it was able to work out appropriate procedures between the Government of Peru's Highway Department and the consultant for AID approval of change orders. The audit report also pointed out that a difference in interpretation of provisions of the consultant's contract by the U.S. Mission, the Government of Peru's Highway Department, and the consultant made it difficult to require the consultant to submit change orders to the U.S. Mission for approval.

The audit report pointed out also that, as of April 1969, the consultant had issued a total of 428 directives, none of which had been approved by the U.S. Mission. A directive is a written order from the consultant to the contractor requiring that the work, including all changes that do not involve any adjustment in the basis of payment, be performed in accordance with the contract.
The consultant took the position that, since the directives did not represent major changes in work, the U.S. Mission's approval was not needed and in any event progress of the work could not be held up waiting for approval. The audit report presented a summary of 12 significant directives issued by the consultant that had an estimated total dollar value of about $970,000. Three of these directives were over $150,000 each in value. The U.S. Mission's audit report recommended that AID work out approval arrangements for the consultant's issuance of directives.

CONCLUSIONS

In view of the opinion expressed as to the distinct possibility of slides occurring because of the design adopted, we do not understand why the contract specifications dealing with payment for removal of slides during construction were so written that they could be interpreted in a different manner by the consultant and by the contractor, as described in chapter 3.

On the basis of the data available to us, it is evident that the consultant did not perform geologic surveys nor take adequate core borings, in areas involving deep cuts; that the drainage facilities under large fills were not properly placed, which, in part, caused roadway fills to fail; and that the consultant approved a substantial amount of work without obtaining approval of the Government of Peru and of the U.S. Mission. The record is not clear as to the reasons why geologic surveys and core borings were not taken and why sufficient pipe was not authorized or used on the project.

The consultant's approval of a substantial amount of work without authorization appears to have stemmed from a disagreement over interpretation of contract terms. We are unable to determine from the available records whether the work ordered by the directives, as discussed in the U.S. Mission's audit report, is a part of the work referred to in Mr. Pettis' allegation.
CHAPTER 5

CONSTRUCTION PRACTICES

Mr. Pettis stated that during the early stages of the project the contractor did not have experienced employees or the proper construction equipment. Mr. Pettis contended that these factors affected the progress of the project.

Details of the evidence we found concerning these allegations are discussed below.

INEXPERIENCED CONTRACTOR EMPLOYEES ON PROJECT DURING EARLY STAGES

Mr. Pettis charged that the contractor's American employees assigned to the road project were experienced in dam building but not in road construction.

GAO observation

We found references to the lack of experienced contractor employees in the Highway Advisors' site-inspection reports on the project. For example, a July 1967 report noted that weaknesses in the project operation was the apparent lack of know-how on the part of contractor employees regarding highway construction and the apparent lack of action by the contractor's top management to correct the situation. The report also stated that supervisory employees on the job had gotten most of their experience constructing missile sites, which is not the same as constructing roads. The report also pointed out, however, that recent changes in supervisory employees might ease the problem.

In April 1968 the Highway Advisor, in a report to the U.S. Mission's Chief Engineer concerning project problems, pointed out that the contractor did not appear to be making satisfactory progress on the project and that the workmanship was not compatible with the contractor's reputation as a top American contractor. The progress and workmanship problems were attributed to the lack of trained, skilled equipment operators and top-level supervisors. The report added that the experience problem had been reduced
considerably by changes in supervisory employees but that the problem of getting skilled help remained.

The lack of trained operators had been cited earlier by the Highway Advisor as contributing to an uncommonly high accident rate on the project. A March 1967 site-inspection report noted that the consultant's resident engineer had expressed concern about safety on the project because one of his laboratory technicians had been killed while making a compaction test.

The contractor's concern over the lack of trained Peruvian employees had been noted in the files we reviewed. In March 1967 the contractor requested the Peruvian Highway Department to change a contract limitation concerning employment of third-country nationals. The contractor's purpose in requesting the change was to bring to the project a limited number of Spanish-speaking Colombian and Panamanian operators to be used as instructors to train locally hired employees.

The records available to us did not show what action, if any, the Government of Peru had taken on this request. The records we reviewed showed that the contractor had made several changes in top supervisory employees during the period of the project, the last in July 1967.

LACK OF PROPER CONSTRUCTION EQUIPMENT

Mr. Pettis stated that the contractor did not have the proper compaction equipment to build the Tarapoto highway during the early period of the project. Mr. Pettis added that proper compaction of soils is necessary to help ensure that the road surface is stabilized. He stated also that problems with the road's compaction were less serious by the end of 1967 as additional equipment had been brought to the construction site.

GAO observation

Our review of available records showed that in August 1965, at the time the award was made, the consultant informed the Government of Peru that the quantity of heavy equipment the contractor planned to use on the project was
less than the minimum recommended. The consultant recom-
mended that the Government discuss the equipment matter
with the contractor to make certain that sufficient com-
paction equipment would be on the job site. Records showed
that the U.S. Mission also was made aware of the consultant's
observations on the equipment matter in August 1965.

Although the contractor's equipment deficiencies had
been pointed out by the consultant, apparently little, if
any, action was taken because Highway Advisors' site in-
spection reports of August 1966 and January 1967 commented
on the lack of suitable compaction equipment.

The reports differed on the effect that this lack of
equipment had had on the project. For example, the August
1966 report stated that rollers being used by the contractor
were not able to provide the required compaction and that
therefore the contractor was using rubber-tired Euclid
scrapers to obtain the required compaction.

On the other hand the January 1967 report pointed out
that the work observed had been spread over approximately
50 kilometers and that no section of the subgrade had been
satisfactorily completed or compacted to the required den-
sity and added that this was due to the lack of suitable
compaction equipment. The report noted that the contractor
had received one 25-ton pneumatic roller but added that it
would have been more advantageous for the contractor to
have gotten heavier ones (pneumatic rollers) and more of
them. An earlier report (dated November 22, 1967, prepared
for the contractor) recommended that a 50-ton rubber-tired
roller and a smaller type roller loaded to 4,000 pounds per
linear foot be utilized to obtain the required compaction.

A Highway Advisor site-inspection report in March 1967
again mentioned the lack of proper compaction equipment but
added that additional equipment was reported to be en route.

CONCLUSION

The evidence available to us tended to support
Mr. Pettis' charges that, during the early stages of the
project, the contractor used employees inexperienced in
road construction and did not have the proper equipment
to compact the road. The reasons why these problems oc-
curred and the detrimental effect they had on the overall 
progress and quality of road construction is not clear from 
the records we reviewed.
CHAPTER 6

ALLEGED IMPROPER USE OF CONTRACT FUNDS

Mr. Pettis alleged that a fellow consultant employee had improperly used contract funds. According to Mr. Pettis, this employee, who had been the resident engineer for the consultant early in the Tarapoto project and who later had been promoted to regional engineer, had used subsistence funds to pay for personal expenses and had charged the contract for material and labor used to construct a private house for himself.

Details on the specific allegations and the evidence we found follow.

IMPROPER USE OF EXCESS FOOD FUNDS

Mr. Pettis charged that the contractor was responsible for providing meals to consultant personnel but instead paid a consultant employee to do so. Mr. Pettis stated that the consultant employee had provided some food but in many cases had paid laborers an equivalent of $1 a day instead of providing meals. Funds generated from this food operation were then used in some instances by the consultant employee to pay his own personal expenses.

GAO observations

The contract specifications provide that the contractor is responsible for preparing and serving meals to the employees and laborers of the consultant. The specifications provide that one person's meals for 1 day, properly furnished, prepared and served, are the unit of measurement. The contractor was paid PS/170(1) for each employee's daily meal.

1 At the time the contract was signed and through the early stages of the project, the exchange rate was PS/26.80 for 1 U.S. dollar. This item initially provided the equivalent of $6.30 a man-day. By June 1968 the exchange rate had risen to PS/43.75 for 1 U.S. dollar; thus PS/170 was worth approximately $3.90.
meals and PS/100(1) for each laborer's daily meals. These two items were financed 60 percent by the Bank in dollars and 24 percent by the Peruvian Government and 16 percent by AID in local currency.

Before actual construction began the above-mentioned consultant employee verbally agreed with the contractor's project manager that the consultant would feed its own personnel. The consultant would bill the contractor at the contract unit price for the number of man-days on a monthly basis and, in turn, the contractor would bill the Peruvian Government for that amount.

The consultant employee acted as the agent in Tarapoto for the consultant. As the consultant's agent he had the authority to bill the contractor, receive the resultant check, endorse it for the consultant, and cash it. Once the check was cashed, the employee exercised complete control over the funds. The feeding agreement, therefore, can be viewed as an agreement between the companies.

By mid-November 1966, the contractor had the facilities needed to feed consultant personnel, but the consultant employee continued to furnish food while the contractor prepared the food and served the meals. It was agreed that the consultant would receive PS/55 a man-day to cover the cost of food for employees and laborers alike. The contractor retained the difference between the amount paid to the consultant employee and the contract unit prices as reimbursement for meal preparation and service.

According to U.S. Mission audit report, the consultant employee, rather than provide meals to all laborers, paid them at a daily rate of PS/30 a man-day until August 1968, at which time the rate was increased to PS/40 a day. The difference between the rates received by the consultant and those paid to laborers before and after August 1960--PS/25 and PS/15, respectively--were put into a food fund directly controlled by the consultant's employee and were used by him for a wide variety of purposes, many of a personal

---

1. This item initially was worth approximately $3.75, but by June 1968 it was worth approximately $2.30.
nature. Any profits accruing from operation of employee
club facilities also were put into this fund.

An audit of the food fund performed by the U.S. Mission
early in 1969 revealed that no accounting had ever been made
of the money received by the consultant from the contractor
between February and mid-November 1966. Since the number
of man-days worked during that period is known, we can es-
timate that the consultant received about PS/808,000, or
approximately $30,150, from the contractor during that pe-
riod.

From mid-November 1966 until December 30, 1968, when
the verbal agreement was terminated, the consultant received
PS/55 for each laborer and employee man-day. A total of
90,638 man-days were worked, for which the consultant re-
ceived about PS/5,000,000 (approximately $165,200).

Additionally, the contractor paid the consultant about
PS/596,000 (approximately $16,400) for food provided to con-
tactor kitchen help, project visitors, and the Peruvian
coordinating engineer. The consultant employee therefore
received about PS/5,580,600 (approximately $181,600) from
November 1966 to December 1968, or a total of about
PS/6,400,000 (approximately $212,000) over an almost 3-year
period. Subsistence paid to the consultant by the Peruvian
Government involving other projects in Peru was com mingled
by the consultant employee with the Tarapoto project money.
These additional subsistence payments amounted to about
PS/321,260 (approximately $8,640).

AID's audit showed that after November 17, 1966, a
journal was maintained to record purchases of food, subsis-
tence payments to laborers, and miscellaneous expenditures.
The report stated that it was not possible to substantiate
all of these journal entries because invoices or paid re-
cipts in support of journal entries frequently did not state
the purpose of the expenditures. The AID audits and inves-
tigations were able to identify expenditures of about
PS/5,070,000 (approximately $168,000) for food and subsis-
tence payments to laborers from mid-November 1966 to Decem-
ber 1968. In addition, approximately PS/765,000 (about
$25,300) was identified as miscellaneous expenditures during
that period from the food fund controlled by the consultant
employee.
The charge that the consultant employee had used the excess food money for personal expenses was confirmed by the U.S. Mission audit. The audit was able to identify the following personal expenditures from the food fund.

<table>
<thead>
<tr>
<th>Sales</th>
<th>Approximate U.S. dollar equivalent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Stereo equipment</td>
<td>PS/9,643</td>
</tr>
<tr>
<td>Office furniture</td>
<td>5,700</td>
</tr>
<tr>
<td>Silver</td>
<td>6,700</td>
</tr>
<tr>
<td>Tools for house</td>
<td>30,000</td>
</tr>
<tr>
<td>construction</td>
<td></td>
</tr>
<tr>
<td>Wedding costs</td>
<td>56,034</td>
</tr>
<tr>
<td></td>
<td><strong>PS/108,077</strong></td>
</tr>
</tbody>
</table>

The audit report stated that the wedding costs included such items as the orchestra, furniture rental, liquor, bartenders, waiters, flowers, and hotel rooms for guests.

It appears that, when contractor and consultant employees in Tarapoto reached the verbal agreement concerning the subsistence of consultant personnel, they did not comply with the contract terms. The contract between the Government of Peru and the contractor provides that the contractor not sublet, assign, sell, transfer, or otherwise dispose of any part of the contract without the written consent from the Peruvian Government. In effect, the contractor had assigned his responsibility to feed the consultant's personnel to another party—the consultant represented by its employee in Tarapoto—and never had obtained the written consent from the Peruvian Government.

In this case, the consultant employee became a subcontractor of the contractor. Since the consultant was responsible, at different times during the contract period, for preparing the monthly pay estimates which covered the amounts payable to the contractor and was at the same time a subcontractor of the contractor, the objectivity with which the consultant could attest to the work done by the contractor could be questioned.
The monthly pay estimates covering amounts payable to the contractor for work performed were signed by contractor and consultant personnel in Tarapoto and Lima. Signature on the pay estimates certified that the work for which payments were requested had been executed in accordance with plans, specifications, and terms of the contract. Monthly pay estimates were prepared, signed, and submitted as if the contractor was, in fact, discharging the contract obligation for feeding consultant personnel. Moreover, the fact that certain consultant personnel received cash amounts substantially less than the amounts billed to the Government of Peru raises a further question as to validity of the certifications.

The AID Office of General Counsel expressed the following views on the food fund.

1. In August 1970 it was reported that no action would be taken against the consultant employee or the consultant regarding the misuse of the food fund. It was pointed out that the employee had made restitution of the amounts in question. It was further reported that, regarding any possible claim against the contractor relating to the question of its certification of vouchers, it had been agreed that AID should await the outcome of the Peruvian suit.

2. In January 1971 it was reported that no action should be taken on the matter of the food fund pending the outcome of the court actions instituted by the Government of Peru. In the event that, for one reason or another, the Government of Peru does not take action on the amount which represents the amounts retained by the companies and not, in fact, paid to the consultant's laborers or used for their subsistence, AID should then consider billing the appropriate parties for such amounts.
UNAUTHORIZED DIVERSION OF LABOR AND MATERIALS
FOR CONSTRUCTION OF A PRIVATE RESIDENCE

Mr. Pettis charged that consultant laborers had been used on the construction of an employee's private residence, the contractor had put power and water lines into the house, and these costs had been charged to the Government of Peru.

GAO observations

Two houses for American employees of the consultant had been built at the project site. Construction of the houses was not authorized originally under the consultant's contract; however, they were paid for after Peruvian approval had been obtained. The consultant employee had requested an estimate for a third house from the contractor, who had constructed the other two houses at the site. When the employee received the estimate, he considered it excessive and decided to build a house himself.

As had been done for the two houses originally built, the consultant employee expected to have the house authorized by Peru after it was occupied. The consultant employee believed that such action was justified in that there was not sufficient housing at the site for American consultant employees.

Records showed that the third house was constructed at a cost of about PS/692,000, or $16,000. The U.S. Mission provided us with the following photograph taken during construction of the house.
PICTURED ABOVE DURING ITS CONSTRUCTION IN 1968, THE CONSULTANT EMPLOYEE'S HOUSE WAS THE ONLY LUXURIOUS RESIDENCE IN TARAPOTO.

The U.S. Mission's audit report stated that laborers on the consultant's payroll had been utilized on the house but that, until August 1968, a separate payroll ledger had been maintained. The cost of this labor was not included in monthly billings to Peru. (Local currency costs of the consultant were paid 60 percent by Peru and 40 percent by AID.) From September to early in November 1968, however, this labor was included on the regular payroll billed to Peru by the consultant. The Government of Peru was subsequently given a credit of about PS/88,500 for this charge.

Further investigation by U.S. Mission auditors revealed an additional credit of about PS/51,000 was owed the Peruvian Government, because 10 additional laborers not included in the above credit had worked a total of 245 man-days on the employee's house. The credit would cover about PS/26,300 in wages and PS/24,500 in subsistence.

The U.S. Mission audit mentioned above also confirmed that the contractor had provided the consultant employee with a considerable amount of electrical and plumbing
supplies, as well as the services of its plumbers and electricians on the house. Due to the results of the U.S. Mission's audit, the contractor's project manager ordered a complete review of all material and services provided to the employee. This resulted in billings of about PS/31,600 to the employee, which brought the total billings to about PS/47,000. The U.S. Mission's audit report contained a summary of the improper costs incurred for the house, as follows:

<table>
<thead>
<tr>
<th>Cost item</th>
<th>Consultant's charges to Peru</th>
<th>Contractor billings to employee</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Credit given</td>
<td>Credit due</td>
</tr>
<tr>
<td>Building materials</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Labor and related costs</td>
<td>PS/88,472.56</td>
<td>PS/26,318.06</td>
</tr>
<tr>
<td>Subsistence</td>
<td>-</td>
<td>24,500.00</td>
</tr>
<tr>
<td>Electrical services and material</td>
<td>-</td>
<td>1,200.00</td>
</tr>
<tr>
<td>Plumbing services and material</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Air travel</td>
<td>-</td>
<td>3,778.40</td>
</tr>
<tr>
<td></td>
<td>PS/88,472.56</td>
<td>PS/55,896.46</td>
</tr>
</tbody>
</table>

In December 1970 the AID Office of General Counsel took the view, with respect to the irregularities on the project, that the only unresolved issue concerned the food fund. This would infer that the issue of the consultant employee's diversion of labor and materials for the construction of his private residence had been satisfactorily resolved. On the basis of available records, we believe that full restitution may not as yet have been made for the construction of the house.
CONCLUSIONS

We believe that the U.S. Mission's audit and other records substantiate the charge that contract funds, material, and labor were used by a consultant employee for his personal use and to pay part of the cost of construction of his private house at Tarapoto.

Our analysis of available records raises a question as to whether full restitution has been made by the consultant employee. The U.S. Mission reported that restitution had been made in the following amounts for the consultant employee's house.

1. About PS/88,500 (approximately $1,980) was credited to the November 1968 consultant's pay estimate payable by Peru.

2. About PS/31,300 (approximately $720) was paid on August 12, 1969, in the form of an invoice issued to the Peruvian Government.

In addition, the employee was billed for about PS/47,000 (approximately $1,080) by the contractor, which, according to the employee, the consultant deducted from his salary without his knowledge.

The amount which internal AID audits determined the employee owed to Peru, in addition to the PS/88,500 previously credited, was about PS/55,800 (approximately $1,285), of which the employee paid about PS/31,400. Subsistence of PS/24,500 (approximately $810) owed to the Peruvian Government, as shown in the summary of improper costs on page 48, was not included in that amount. We found no records which showed any restitution by the employee other than the two amounts shown above.

In addition, we have been unable to locate any information which documents restitution by the consultant employee for about PS/108,080 ($2,440) identified in the U.S. Mission's audit as having been diverted from the food fund for his personal expenditures. Thus it seems that restitution remains to be made for at least PS/132,580, the equivalent of about $3,200.
We believe that, if the Government of Peru does not recover funds involved in the irregularities with respect to the food operation under the contract or recovers only its share of the food payments, AID and the Bank should determine the validity of the certification made by the companies regarding the payments for the consultant personnel's food, the amount thereof, and take action to recover any improper payments.

RECOMMENDATIONS

We recommend that the Administrator of AID and the President of the Bank take action to ensure that:

1. The consultant employee has made or will make full restitution of contract funds, material, and labor.

2. If the Government of Peru does not pursue this matter or if it recovers only its share of the food payments, AID and the Bank determine the validity of the certifications made on the food payments and recover any improper payments to the companies.
CHAPTER 7

PERSONAL CHARGES AGAINST MR. PETTIS

Charles Pettis stated that, after the termination of his employment by the consultant in December 1968, he had been unable to find employment because the consultant had blackballed him in the U.S. engineering-construction industry; his professional qualifications had been challenged; and, when he attempted to leave Peru in August 1969, he was issued a restricted passport without any explanation.

GAO OBSERVATIONS

Whether Mr. Pettis was blackballed by the consultant is virtually impossible to substantiate. Since December 1968, he has applied for positions with 31 engineering-construction firms. In all cases except one, the firms did not respond or responded negatively to his applications. In one instance, his resume was accepted, but no further action was taken after he expressed interest in the job over a year ago.

AID, consultant, and contractor officials deny any attempt to blackball Mr. Pettis. We noted instances where AID, contractor, and consultant officials had expressed doubt about his qualifications as a resident engineer. For example, a U.S. Mission official explained to representatives of Peru that, although Mr. Pettis was a good soils engineer, his promotion to resident engineer had not worked out.

An official of the contractor claimed that the slide problem could have been solved a year earlier but for consultant employees who lacked competence to manage a job of that size and who wrongly had opposed contractor requests for payment.

Although the consultant had reservations about Mr. Pettis' competence as a resident engineer, it informed the

1Mr. Pettis advised GAO that, to the best of his knowledge, two of the positions for which he applied were AID funded.
Government of Peru in August 1969 that Mr. Pettis deserved his old job back as a soils engineer. Mr. Pettis stated that accepting employment with the consultant would compromise his claim against the consultant.

In regard to the charge that Mr. Pettis was issued a restricted passport, we noted that he had been given a limited 4-month passport extension. According to the U.S. Mission, the limited passport was issued in accordance with section 349 of the Immigration and Nationality Act. This section of the act deals with its loss of nationality by native-born or naturalized citizen. Subsection 4 is apparently the section which was applied to Mr. Pettis.

"(A) accepting, serving in, or performing the duties of any office, post, or employment under the government of a foreign state or a political subdivision thereof, if he has or acquires the nationality of such foreign states; or (B) accepting, serving in, or performing the duties of any office, post, or employment under the government of a foreign state or a political subdivision thereof, for which office, post, or employment an oath, affirmation, or declaration of allegiance is required; ***."

According to Mr. Pettis, he had explained, when questioned by the U.S. Embassy's vice consul regarding passport renewal, that he had never taken an oath of allegiance to the Government of Peru.

Records available to us contained the following explanation of why a limited passport had been issued by the U.S. Embassy.

1. When Mr. Pettis arrived at the U.S. Embassy in Peru, he submitted a completed passport application, took an oath of allegiance to the United States of America, and departed the Embassy. After he left the Embassy, the consular officer noted that he was employed by the Government of Peru.

2. The consular officer reported that he had been unable to contact Mr. Pettis concerning his employment
with the Government of Peru. The limited amount of
time between Mr. Pettis' application and issuance of
the passport and in order not to leave Mr. Pettis
without a passport, the Embassy issued a passport
valid for a 4-month period.

3. State Department records showed that, after it had
verified Mr. Pettis' statements, it had issued him
an unrestricted passport in September 1969.

CONCLUSION

The question of whether Mr. Pettis had been blackballed
cannot be established, as any such action would, by defini-
tion, be informal and not necessarily documented. We could
not find any overt action to blackball Mr. Pettis. The fact
remains, however, that he has applied for 31 jobs since 1969
and has been unsuccessful in obtaining employment in the
engineering-construction field.

In regard to the passport renewal, it appears that
Mr. Pettis' difficulties were a matter of misunderstanding
and expediency.
CHAPTER 8

U.S. GOVERNMENT AGENCIES INVOLVED IN HIGHWAY PROJECT

Our review of available evidence showed that both the U.S. Mission and AID/Washington had been aware of many project problems long before they became major stumbling blocks to project progress but had failed to take timely action on most of the problems. Our review showed also that the Bank had followed its practice of relying on the other U.S. agencies and U.S. firms involved to monitor the project.

Since mid-1969 the United States Government has engaged in a series of meetings with the Government of Peru to resolve the differences between Peru and the two U.S. firms on the cause of project problems. As of November 1971, informal discussions are continuing. Details concerning the U.S. Government agencies' involvement in this project are discussed below.

AID MONITORING RESPONSIBILITIES

Internal AID policy guidance delineates responsibility for project monitoring. After a loan is extended, AID's principal role in project implementation is to keep the activity under surveillance. This is to ensure that the project's physical and financial progress is consistent with plans and schedules and that the project is proceeding with due diligence and efficiency in conformity with sound engineering, management, and financial practices.

The minimum actions required by AID policy on project monitoring include (1) approval of the proposed engineering firm and the contract for engineering and other professional services, (2) approval of bidding documents, including plans and specifications, (3) approval of construction contract award and of firms to whom awards are made, (4) review of periodic progress reports submitted under the terms of the agreement to ensure that implementation is proceeding satisfactorily, (5) inspection at the project site by the U.S. Mission and AID/Washington, as appropriate, and (6) approval of contract change orders.
Our review of available records showed that AID had approved (1) the engineering firm and its contract with the Peruvian Government, (2) bidding documents, including plans and specifications, and (3) award of the construction contract and the consortium to which the award was made.

Review of periodic progress reports submitted by the consultant (item 4 above) and site inspections (item 5 above) were carried out by the Highway Advisors assigned to the U.S. Mission in Peru under a participating agency service agreement between AID and the Department of Transportation.

From June 1965 through November 1971, a total of 31 site inspection reports by Highway Advisors were submitted to the U.S. Mission and forwarded to AID/Washington's Office of Engineering. Copies of the analyses of consultant progress reports were submitted to the U.S. Mission's Chief Engineer, who, in turn, reported to AID/Washington. In addition, a Highway Advisor was designated as the loan implementation officer and, as such, was charged with the responsibility of continuing project surveillance.

Although AID had designated a Highway Advisor as loan implementation officer, he had little authority to act. All decisions based on project monitoring had to be channeled through the U.S. Mission's Transportation Coordinator (who, according to mission records, was a botanist, not an engineer), the U.S. Mission's engineers, and the Capital Development Officer before reaching the U.S. Mission Director. Because of the organizational relationships within the U.S. Mission, one Highway Advisor reported in April 1968 that Bureau employees were unable to effectively monitor the Tarpoto project.

**SITE-INSPECTION REPORTS INDICATED NUMEROUS PROJECT PROBLEMS**

Our review of available documents showed that reports filed with the U.S. Mission and AID/Washington by Highway Advisors accurately reflected most of the major project problems. For example, from January 1967, when first reported, to December 1968, the slide issue was cited as a problem in nine out of 14 of the Highway Advisors' reports. The first report of slides noted that the contractor had been warned...
by the consultant about excessive dynamiting, overexcavation, and a possible citation of negligence, which would preclude payment for slide removal. The inspection report for April 1968 stated that a major problem of slides existed and that there was a complete difference of opinion on the subject between the consultant and the contractor. The June 1968 report reaffirmed the seriousness of the slide problem, as did every report from July to December 1968.

Similarly, the site inspection reports noted conflicting contractor and consultant interpretation of specifications. As early as April 1967, the contractor and the consultant disagreed on the method of work that would have complied with specifications. In October 1967 and February and April 1968, continuing disagreement was reported, particularly in regard to specifications dealing with payment for slide removal.

It should be noted that numerous problems were reported in addition to the slide and specification disputes. Foremost among these other reported problems were the lack of proper compaction equipment and the inadequate number of skilled employees. Both problems were first cited in August 1966 and continued to be cited in subsequent reports until as late as October 1967.
LACK OF TIMELY AID ACTION ON IDENTIFIED PROJECT PROBLEMS

The record is not entirely clear on the action taken by AID to resolve the problems identified in the site inspection reports. Although most of the problems were identified by the first month of 1967, we noted no real U.S. Mission efforts to solve them until April 1968.

At that time the U.S. Mission's Chief Engineer, after accompanying a Highway Advisor to the road site, reported on the seriousness of the problem of slides to the U.S. Mission Director (through the Assistant Director for Capital Development). The Chief Engineer recommended that (1) a common U.S. Mission viewpoint be established, (2) the Bank be advised of the problem, (3) the Peruvian Government be requested to take action, and (4) the services of a specialist be obtained.

The U.S. Mission's Chief Engineer wrote to AID/Washington early in May 1968 stating that, on the basis of internal discussions, the U.S. Mission would request Peruvian action on the situation and that the Bank should be advised. The request for a specialist would be made only as a last resort, the letter explained, if the Peruvian Government was unsuccessful.

In mid-June 1968 the U.S. Mission informed AID/Washington of the apparent reluctance on the part of the Peruvian Ministry and the contractor to bring the matter of slides to a head. The U.S. Mission stated that the Peruvian Highway Department would await a formal claim for payment from the contractor—submission of which the U.S. Mission would encourage—before focusing on the problem.

Also in June 1968 the Acting U.S. Mission Director wrote to the Peruvian Highway Department indicating that there might be significant work overruns on the job that would substantially increase the project's total cost. Near the end of June, AID advised Peru that, until some fair solution was found by the Peruvian Highway Department and general agreement was reached on interpretation of the specifications, AID would have to follow a more cautious disbursement policy, to ensure that loan funds were available
to pay basic construction costs over the entire life of the project.

Although the record indicated that there had been limited correspondence and some conversations between U.S. Mission officials and the Government of Peru, we could find no record of any substantial action by AID until December 1968. In December 1968 AID became involved in the charges made by Mr. Pettis. As a result of these charges, AID notified the Government of Peru of possible irregularities and arranged for an audit of the project.

After this significant first step, AID (1) obtained the services of a geological consultant in February 1969--10 months after the possible need was identified, (2) conducted several audits into allegations made on the project, (3) engaged in a series of meetings with Peru concerning project irregularities, and (4) agreed, in February 1970, to send a special emissary to Peru in an attempt to resolve project problems.

**PROJECT MONITORING BY BANK**

Unlike AID, the Bank does not have written guidelines that delineate monitoring responsibilities for loan projects. Instead, the Bank determines the appropriate type of monitoring on a project-by-project basis.

Prior to the Government of Peru's contract with the contractor, Bank officials visited the project site in Peru and approved the bid documents, plans, and specifications for the road. Additionally, the Bank approved the contracts for the consultant and the contractor and the award of the contracts. As officials of two U.S. Government agencies--AID and the Bureau of Public Roads--were in Peru during project implementation, the Bank could see no reason to conduct its own onsite monitoring. Additionally, Bank officials felt that the interests of the Bank were safeguarded by having a U.S. construction contractor like Morrison-Knudsen and a U.S. engineering consultant like Brown & Root on the job.

The Bank kept informed of project activities mainly through monthly reports from the consultant. The Government
of Peru had required the consultant to submit to the Bank, AID, and the Peruvian Highway Department monthly progress reports containing complete information on the work being done on all phases of the project.

Our review of the consultant's reports showed that they did not include most of the major problems reflected in site inspections prepared by Highway Advisors. The Bank did not start receiving copies of the Highway Advisors' reports until April 1968, at which time it was provided with copies of prior reports.

DISCUSSIONS BETWEEN OFFICIALS OF PERUVIAN GOVERNMENT AND UNITED STATES GOVERNMENT TO RESOLVE PROJECT PROBLEMS

In May and June 1969, the U.S. Ambassador and the U.S. Mission Director engaged in a series of meetings with officials of the Government of Peru on Tarapoto-Rio Nieva Highway project irregularities. The discussions centered around payments for slide removal and the charge of collusion between the consultant and the contractor.

In a letter dated July 18, 1969, the Peruvian Minister of Transport and Communication formally requested AID/Washington's assistance in solving the problems of the Tarapoto-Rio Nieva Highway project. This letter was never responded to by AID/Washington and as a result became an irritant in already sensitive relations. The letter and the related material subsequently provided to AID were intended to demonstrate that immediate action was necessary.

A copy of the July 18 letter was sent to the U.S. Mission which sent an interim response to the Director Superior, Ministry of Transport and Communications. The response was primarily a statement of how the U.S. Mission had cooperated with the Ministry.

During our review we attempted to determine what happened to the letter once it reached AID/Washington. In response to our questions, AID officials stated that they assumed that the letter had been lost within AID and that therefore no reply had been made.
At the U.S. Mission, we noted a memorandum dated August 14, 1969, which was sent to AID's Latin American Engineering Division, transmitting a copy of the July 18 letter and a listing of the related material. AID/Washington officials informed us again that they had no knowledge of receiving these documents. No other references to the Minister's letter were identified.

In January 1970 the Minister of Economy and Finance wrote to AID/Washington requesting high-level attention to road-project problems. In response to this request, a special mission was sent to Peru to discuss claims against the two American firms and possible methods for resuming AID and Bank loan disbursements. The U.S. team met frequently with representatives of the Government of Peru, principally the Minister of Transport and Communications and his staff, in February, April, and May 1970; however, no settlement was reached.

It was the position of the special team that (1) AID and Bank loan disbursements could not be resumed until such time as the suits against the contractor and the consultant were resolved, (2) the Government of Peru's responsibility for constructing the road would require adequate proof that the Government of Peru was capable of such an undertaking, and (3) that the performance of the Government of Peru would be monitored by a U.S. company.

Along these lines, the U.S. team argued that the two companies had good reputations and should be paid for the work which was generally agreed to have been satisfactorily performed. The U.S. team was firm in its position that the two companies had performed, on the whole, satisfactorily. The team leader stated that he had considered all evidence supporting the charges against the two companies and had concluded that the Government of Peru had not provided any information not previously available.

The meetings between the U.S. team and the Government of Peru's representatives did not resolve the road project issues, and thereafter the pace of official diplomatic discussions slowed. In April 1971 the U.S. Mission reported that the U.S. Ambassador and the U.S. Mission Director had raised the issue informally with high-level Peruvian
officials on two or three occasions. Quiet diplomatic probing would continue, according to the U.S. Mission, to determine whether there was any disposition on the part of Peru to reopen discussions.

The Government of Peru and the contractor are currently conducting negotiations in an effort to resolve project problems.
CONCLUSIONS

The U.S. Mission and AID/Washington were aware of many of the major project problems by early 1967 but did not take substantive action until the end of 1968. It appears that several factors contributed to AID's lack of timely action.

One problem concerned the U.S. Mission's organizational structure for managing the project. The procedures required that decisions on problems noted during project monitoring had to be reviewed and filtered through several layers of U.S. Mission management before reaching the U.S. Mission Director. This procedure existed despite the fact that a Highway Advisor had been designated as the loan implementation officer with primary responsibility for the project. We were informed that in October 1968 the organizational structure was changed so that the Highway Advisor reported directly to the U.S. Mission's Chief Engineer.

Another contributing factor was the apparent lack of adequate coordination among all parties involved on the project from its inception through 1968. The records indicated that AID was waiting for someone else to take leadership in settling project problems. The initial U.S. Mission audit report on the project—covering the period May 1964 through April 1969—stated that there was a lack of adequate coordination among AID management officials, the Government of Peru, the contractor, and the consultant. One factor contributing to this lack of coordination was the change of government in Peru in October 1968. It should be noted, however, that that was over a year after the major project problems had been identified.

Although the Bank had committed $23 million to the Tarapoto road project, we were told, and the record showed, that the Bank had relied on the other U.S. Government agencies and the two American firms involved to monitor the project. Additionally, the records available to us indicated that the Bank was not aware of the project difficulties from initiation of the project in 1966 until April 1968 when AID started to make efforts to resolve project problems.

The Bank would have been aware of the major project problems over a year earlier if it originally had received
copies of the site-inspection reports prepared by the Highway Advisors. Thus the Bank would have had the opportunity to take action to eliminate some of the project problems.

RECOMMENDATIONS

The role of AID in project implementation had been defined in its policy guidance as one of ensuring that projects are progressing as planned and with due diligence and efficiency in conformity with sound engineering, management, and financial practices. We recommend that the Administrator of AID take action to ensure that AID officials responsible for project implementation are fully aware of, and carry out AID's role in monitoring programs financed with U.S. foreign-aid funds.

We recommend also that, in projects where Bank funds are being used jointly, with those of another Government agency, the President of the Bank take action to ensure that the Bank is provided with inspection or evaluation reports made by the other Government agency involved.
CHAPTER 9

AGENCY, CONTRACTOR, AND CONSULTANT COMMENTS

Upon completion of our review, we met with, and discussed the results of the review with, officials of AID, the Bank, the Department of Transportation, the contractor, and the consultant. These officials generally agreed that the facts presented in this report were accurate. The officials of AID, the contractor, and the consultant, however, did request that additional clarification be made of some of the matters discussed. The following information summarizes these views and our observations thereon, where appropriate.

HISTORY AND CURRENT STATUS OF TARAPOTO HIGHWAY PROJECT--CHAPTER 2

AID informed us that:

"Essential to an understanding of the developments in the Tarapoto road problem is the political background in Peru at this period which had an overriding impact on all bilateral relationships. Until October 1968 the democratically-elected Belaunde government was in power. Highway building was one of the highest priorities of the Belaunde government and there was every reason to believe that the kinds of technical and contractual problems that emerged in the construction of the Tarapoto road could be settled by negotiations in good faith among the parties concerned. The situation changed drastically in October 1968 when a coup brought the present military government to power. The nationalist and uncompromising military government came to power determined to stamp out what it regarded as the corruption and inefficiency of its predecessor. One of its first acts was the expropriation of the International Petroleum Company which cast a pall over U.S.-Peru relationships that still has an overpowering impact. This shift in the political climate clearly had a crucial effect on the possibility of making needed adjustments in the Tarapoto project and made the present impasse a certainty."
The consultant stated that, because the contract included an amount for slide removal, it is not correct to imply that all slide removals would represent overruns in the estimated costs. The consultant stated also that an unusually large overrun would not have occurred in the costs for slide removal.

**GAO observations**

The contract specifies an item of 1,320,000 cubic meters for removal of rubble which is interpreted by the parties to be slide removal. This represents 10 percent of the excavation quantities provided for in the contract. That considerable cost overruns would have occurred on the project as the result of the consultant's decision in September 1968 to authorize payment for removal of slides which occurred during construction is evident from the following data provided to us by the U.S. Mission.

<table>
<thead>
<tr>
<th>Cubic meters</th>
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<tbody>
<tr>
<td>Identifiable slide removal through February 1969</td>
<td>3,300,000</td>
</tr>
<tr>
<td>Additional slide removal (rough estimate) expected if roadway were completed under same standards (class II highway)</td>
<td>3,000,000</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>6,300,000</strong></td>
</tr>
</tbody>
</table>

Comparing the above quantities of identified and expected slide removal of 6,300,000 cubic meters with the quantity of 1,320,000 cubic meters included in the contract for slide removal, it is apparent that significant cost overruns for slide removal would have occurred on the project.

**CONSULTANT CHANGED POSITION AND AGREED TO AUTHORIZE PAYMENT FOR SLIDE REMOVAL--CHAPTER 3**

The consultant stated that, with respect to the report statement that Mr. Pettis had been excluded from an
inspection trip of the slide area made by officials of the consultant and the contractor, it should be pointed out that Mr. Pettis' immediate supervisor, who at that time shared Mr. Pettis' opinion of the cause of the slides, was present throughout the inspection trip. The consultant added that there was no real reason for Mr. Pettis' presence on the inspection as his opinion was fully known to the parties at that time. The contractor presented similar views on this matter. Regarding the circumstances of Mr. Pettis' removal as Resident Engineer, the consultant stated that his removal had been based on his refusal to obey the direct instructions of his project manager to return to Lima for a conference and not on his refusal to sign the pay estimate.

**ALLEGED COLLUSION BETWEEN CONSULTANT AND CONTRACTOR FOR PURPOSE OF PAYING FOR SLIDE REMOVAL--CHAPTER 3**

The consultant denied emphatically the charge of any collusion. The consultant stated that there were no secret meetings and that what meetings had been held were not for fraudulent or deceitful purposes but rather were, in effect, bona fide efforts to decide the contractor's appeal of the decisions denying payment for slide removal reached by the consultant's field representatives.

**SLIDES COULD BE EXPECTED DUE TO PROJECT DESIGN--CHAPTER 4**

The consultant's Chief Engineer informed us, in regard to the design philosophy which specified steep slopes, that flattening the slopes would have generated earth excavation quantities that would have made the project costs prohibitive. The Chief Engineer added that years of Peruvian highway experience dictated that steep slopes were less susceptible to continuing erosion and to erosion-induced slides which caused severe long-term maintenance problems.

The consultant stated that the advice of AID's former Chief of Engineering that slides should have been expected on the design criteria for the project could be amplified. The consultant contended that slides not only should have been expected but were expected and were allowed for in a significant amount in the job estimate and in the pay quantities in the bidding documents.
GAO observations

Although the consultant believes that the contract terms are clear on the payment for slide removal, the fact remains that a significant difference of interpretation of the specifications existed between the consultant's field employees and the contractor at the project site while the road was under construction. As previously pointed out the matter of contract interpretation is presently before the Peruvian courts.

ROAD FILL FAILURES DUE TO DEFICIENCIES IN CONSULTANT'S DESIGN--CHAPTER 4

The consultant commented that the proper placement of culverts was the responsibility of the Resident Engineer, who, at certain times during the project, was Mr. Pettis.

GAO observation

The consultant's position seems to have ignored the fact that Mr. Pettis was an employee of the consultant and that the consultant had responsibility for control of its field personnel.
INEXPERIENCED CONTRACTOR EMPLOYEES--CHAPTER 5

In the opinion of contractor officials, the supervisory employees on the road project were experienced and were qualified to handle this project since many of them did have some previous highway experience. It was also the officials' position that the expertise required for excavation and fill on large earth-fill dams and missile sites was very similar to that required for heavy excavation on highway projects. In addition, they said that their supervisor had had extensive experience in the excavation and grading of railways, which is similar to highway construction.

It is the contractor's position that the accident rate on the project was not uncommonly high. The accident record for the project compares favorably, according to the contractor, with that for other foreign construction work where a large number of untrained persons, inexperienced with equipment, are employed. According to the contractor statistical data varies too much from country to country to be comparable because of differences in the workmen compensation laws and the method of tying in these laws with social benefits.

LACK OF PROPER CONSTRUCTION EQUIPMENT--CHAPTER 5

It was the contractor's observation that the exact piece of equipment to be used was a matter of the contractor's judgment and that the important thing to be determined was whether proper compaction was made.

GAO observation

Records we reviewed indicated that the equipment used during early project stages could not achieve the required compaction.

ALLEGED IMPROPER USE OF CONTRACT FUNDS--CHAPTER 6

Both the contractor and the consultant presented arguments concerning the legality of the method used for providing subsistence or payment in lieu thereof to employees of the consultant.
The contractor advised us that the agreement to, in effect, subcontract a portion of the contractor's responsibility to feed the consultant's employees was a valid subcontract authorized under the contract and was not in violation of the assignment clause of the contract.

The consultant, on the other hand, denied that it had entered into a subcontract and stated that from November 1966 it had only supplied the contractor with the required foodstuffs to feed its employees. The consultant advised us that it appeared not to be any concern of the Government of Peru as to the monetary terms upon which its Tarapoto office purchased and provided these foodstuffs to the contractor.

The consultant stated that it was not accurate to allege or imply that the consultant had unduly retained money from its employees and pointed out that it was not required to provide food to its employees who chose to eat their meals elsewhere. The consultant added that, at the request of, and as a convenience to, such workers, it actually had given them amounts of money representing the actual cost of the food they would require, in order to satisfy the contractor's duty to feed them. Any difference between what was paid to employees and the consultant's receipts was not a profit, according to the consultant, but was used for the recreational benefit of the people in the area and for defraying the incidental cost of hospitality in the area for visiting dignitaries, students, official and military commissions, etc.

**GAO observations**

Regardless of whether the arrangements made between the contractor and the consultant for the feeding of the consultant's employees is regarded as a subcontract, the specifications provided that the unit of measurement was one person's meal for 1 day, properly furnished, prepared, and served. The reimbursement of the employees at a rate of PS/30 a day did not, in our opinion, form a basis for the contractor's charging PS/170 a day.
PERSONAL CHARGES AGAINST MR. PETTIS--CHAPTER 7

The consultant denied emphatically that it blackballed Mr. Pettis in the U.S. engineering-construction industry. In fact, it has offered him a job as a soils engineer and has kept that offer open.

LACK OF TIMELY AID ACTION ON IDENTIFIED PROJECT PROBLEMS--CHAPTER 8

AID officials stated that the role of the U.S. Mission (during 1968) was not that of an arbitrator or mediator of a complex dispute between two reputable U.S. firms, both of which were under contract to the Government of Peru. In AID's opinion such mediation or arbitration efforts would have conflicted with contractual procedures regarding claims. Early in the project, the slide-removal payment issue was in dispute between the consultant—technically the advisor to the Government of Peru—and the contractor. The consultant, hence the Peruvian Government, was consistently advising against payment to the contractor. The U.S. Mission did not believe it appropriate to question the judgment of both the consultant and the Peruvian Government by independently looking into the merits of the contractor's claims for payment for slide removal.

AID stated the U.S. Mission's role clearly was to do what it could to have the project carried out in accordance with the terms of the loan agreement. AID officials noted that, during the entire 1966 to April 1968 period cited by GAO, construction of the road continued without interruption. AID officials pointed out that at least six experts or groups of consultants had been taken to Peru to provide information or judgments on the causes of the slide problem prior to the time that AID obtained the services of its own consultant.

GAO observations

In our opinion the U.S. Mission's role in seeing that this project was proceeding as planned should have included the use of AID's good offices, as an interested third party, to get the contractor, consultant, and Peruvian Government together for discussions to solve the major problems, once they were identified (as current AID policy requires).
In our opinion an independent geologist was needed because the differences in the conclusions on the cause of the slides reached by the various consultants employed by the parties to the dispute could not be reconciled.
April 19, 1971

Honorable Elmer B. Staats
Comptroller General
General Accounting Office
Washington, D.C. 20548

Dear Elmer:

I would appreciate receiving a report from the General Accounting Office on the validity of Mr. Charles Pettis' allegations regarding the mismanagement on the Peruvian road building contract he worked on. I believe your Assistant Director, John Milgate, has most of the material which Mr. Pettis has submitted.

I would also like to know whether Mr. Pettis has since "blowing the whistle" in Peru worked on any government funded projects and, if not, whether this was the result of some sort of formal or informal black list.

Thank you for your cooperation.

Sincerely,

William Proxmire, U.S.S.

WP: ml
APPENDIX II

THIS MAP OF PERU ILLUSTRATES THE GENERAL LOCATION OF THE TARAPOTO-RIO NIEVA HIGHWAY PROJECT

(COURTESY OF U.S. MISSION)
APPENDIX II

PHOTOGRAPHS TAKEN LOOKING TOWARD TARAPOTO. AT THIS SITE, ONE OF THE FIRST BIG PROJECT LANDSLIDES OCCURRED.
(GAO PHOTOGRAPH, MAY 1971)
THIS PHOTOGRAPH, LOOKING TOWARD MOYOBAMBA, ILLUSTRATES AN AREA IN THE FIRST 35 KILOMETERS OF THE HIGHWAY PROJECT WHICH HAD ORIGINALLY BEEN CLEARED BY THE CONTRACTOR, AS INDICATED. DENSE JUNGLE GROWTH IS POSING A THREAT OF BLOCKING DRAINAGE DITCHES. (GAO PHOTOGRAPH, MAY 1971)

- Indicates area originally cleared by contractor
- Indicates location of drainage ditch
### APPENDIX III

**LIST OF REPORTS ON AID LOAN 527-L-028**

**TARAPOTO-RIO NIEVA HIGHWAY (note a)**

<table>
<thead>
<tr>
<th>Title</th>
<th>Author</th>
<th>Date</th>
</tr>
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<tbody>
<tr>
<td>2. Stability of Slopes and Slides Carretera Bolivarian Marginal de la Selva</td>
<td>Luis A. Mares Medina, Jose Vera Romero, Edmundo Chavez C., Oscar Muelle Flores, Lindbergh Meza C.</td>
<td>July 1968</td>
</tr>
<tr>
<td>5. Geological Study Land Movements at the Carretera Marginal de la Selva</td>
<td>Dr. Leonidas Castro and Alberto Martinez</td>
<td>Dec. 16, 1968</td>
</tr>
</tbody>
</table>

*a This list supplied by the U.S. Mission. It does not include reports prepared for the consultant by Dr. Arthur B. Cleaves in May 1967 and by Dr. Mario Pegorer in June 1967.

*b Reports reportedly withdrawn by Government of Peru immediately after issuance.
APPENDIX IV

PRINCIPAL OFFICIALS

HAVING MANAGEMENT RESPONSIBILITIES

ASSOCIATED WITH MATTERS DISCUSSED IN THIS REPORT

<table>
<thead>
<tr>
<th>Tenure of office</th>
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<th>To</th>
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</table>

**DEPARTMENT OF STATE**

**SECRETARY OF STATE:**
- William P. Rogers: Jan. 1969 - Present

**UNDER SECRETARY OF STATE:**
- John N. Irwin II: Sept. 1970 - Present

**ASSISTANT SECRETARY FOR INTER-AMERICAN AFFAIRS AND U.S. COORDINATOR, ALLIANCE FOR PROGRESS**

(note a):
- Covey T. Oliver: July 1967 - Dec. 1968
- Charles A. Meyer: Apr. 1969 - Present

**U.S. AMBASSADOR TO PERU:**
- J. Wesley Jones: Nov. 1962 - July 1969
- Taylor Garrison Belcher: Aug. 1969 - Present
APPENDIX IV

<table>
<thead>
<tr>
<th>Agency for International Development</th>
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<tr>
<td><strong>AGENCY FOR INTERNATIONAL DEVELOPMENT</strong></td>
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<tr>
<td>David E. Bell</td>
<td>Dec. 1962</td>
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<tr>
<td>John A. Hannah</td>
<td>Mar. 1969</td>
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<td><strong>PERU MISSION DIRECTOR:</strong></td>
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<tr>
<td>Robert E. Culbertson</td>
<td>Nov. 1961</td>
</tr>
<tr>
<td>Samuel Eaton</td>
<td>July 1968</td>
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<td>Louis V. Perez</td>
<td>Dec. 1970</td>
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<tr>
<td>Harold F. Linder</td>
<td>Chairman of the Board</td>
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<td>(note b)</td>
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<td>Henry Kearns</td>
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<tr>
<td>Walter C. Sauer</td>
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<tr>
<td>Elizabeth S. May</td>
<td>Director</td>
</tr>
<tr>
<td>(Mrs.) (note c)</td>
<td></td>
</tr>
<tr>
<td>Hobart Taylor, Jr.</td>
<td>Director</td>
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<tr>
<td>(note c)</td>
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<td>Tom Lilley</td>
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<tr>
<td>R. Alex McCullough</td>
<td>Director</td>
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<tr>
<td>John Clark</td>
<td>Director</td>
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<td><strong>OFFICERS:</strong></td>
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<td>Harold F. Linder</td>
<td>President and Chairman</td>
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<td>(note b)</td>
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<td>Henry Kearns</td>
<td>President and Chairman</td>
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</table>
Tenure of office

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<tr>
<td><strong>SECRETARY OF COMMERCE (note d):</strong></td>
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<tr>
<td>Luther Hodges          Jan. 1961 Jan. 1965</td>
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<td><strong>FEDERAL HIGHWAY ADMINISTRATOR:</strong></td>
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<tr>
<td>John A. Volpe Jan. 1969 Present</td>
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<tr>
<td><strong>FEDERAL HIGHWAY ADMINISTRATOR:</strong></td>
</tr>
<tr>
<td>Francis C. Turner Mar. 1969 Present</td>
</tr>
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</table>

<table>
<thead>
<tr>
<th><em>a</em> The positions of Assistant Secretary for Inter-American Affairs and U.S. Coordinator, Alliance for Progress, were combined in February 1964. Mr. Teodoro Moscoso was appointed to the post of Coordinator, Alliance for Progress, in February 1962.</th>
</tr>
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<tbody>
<tr>
<td><em>b</em> Mr. Linder left the Bank in July 1968. Mr. Sauer acted as Chairman of the Board and President of the Bank until Mr. Kearns' appointment.</td>
</tr>
<tr>
<td><em>c</em> No longer a Board member.</td>
</tr>
<tr>
<td><em>d</em> All functions, powers and duties of the Secretary of Commerce under certain laws and provisions of law relating generally to highways were transferred to and vested in the Secretary of Transportation, which position and department were created by the Department of Transportation Act (49 U.S.C. 1651 note).</td>
</tr>
</tbody>
</table>