

U. S. NAVAL OBSERVATORY

WASHINGTON, D. C. 20390

IN REPLY REFER TO 62 2400 Ser 91

JAN 2 3 1968

From: Superintendent, U. S. Naval Observatory

To: Commandant, U. S. Coast Guard (0), Washington, D.C.

Subj: Proposal for use of U. S. Coast Guard Loran-C monitor station in Fuchu, Japan as U. S. Naval Observatory Time Reference and Monitor

- Ref: (a) DoD Directive 5160.51 of 1 February 1965
- (b) DoD Instruction 4630.4 of 22 June 1966
- (c) Time Service Announcement of 21 Sep 1967 (attached)
- 1. References (a) and (b) established Single Manager responsibilities for coordination, control, and dissemination of precise time within the Department of Defense (DoD) and charged the Superintendent, U. S. Naval Observatory, with the execution of these responsibilities.
- 2. Reference (c) lists a number of U. S. Naval Observatory reference and monitor stations which have been set up in cooperation with various organizations in partial support of the responsibilities mentioned in paragraph 1.
- 3. Existing requirements, which have been coordinated with the U. S. Coast Guard Loran-C Management, now dictate the need to synchronize and monitor the output of the Loran-C Master Station in Iwo Jima, WestPac. This monitoring will be required beginning in March 1968. It will necessitate activities very similar to the ones, at the present time, that are executed by Detachment CHARLIE in respect to the Johnston Island Loran-C Master Station.
- 4. Preliminary discussions with Lt Cdr George Asche and Lt Cdr Paul Pakos of the U. S. Coast Guard have indicated the possibility of using the U. S. Coast Guard Loran-C Monitor Station in Fuchu, Japan, for the purposes mentioned above.
- 5. Although other possibilities for the establishment of a U. S. Naval Observatory Time Reference and Monitor Station in the Japanese area do exist, the use of the Coast Guard Loran-C Monitor Station, Fuchu, Japan, for this purpose appears extremely desirable for the following reasons:
- a. Direct communication with the Coast Guard Master Station on Iwo Jima is already established.
- b. The combination of equipment available at the monitor station together with equipment which would be supplied by the U. S. Naval Observatory would result in a considerable improvement of operations in the interest of both missions.

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- 6. Assuming that the Loran-C Monitoring Station discussed in paragraph 4 above is established by the U. S. Coast Guard, it is requested:
- a. That permission be granted to the U. S. Naval Observatory to declare the U. S. Coast Guard Monitor Station, Fuchu, Japan, as a U. S. Naval Observatory Time Reference and Monitor Station.
- b. That arrangements be made to allow the U. S. Naval Observatory to ship equipment for the subject purpose to the monitor station and to indoctrinate its personnel in the necessary activities.
- 7. The equipment envisioned for indefinite loan consists of the following:
 - 1 cesium beam atomic frequency standard, Model HP 5061A
 - 1 emergency power supply for the frequency standard
 - 1 cesium beam atomic frequency standard, Model HP 5061A or 5060A, as standby clock (portable clock)
 - 4 VLF receivers for phase tracking of Naval VLF stations
 - 2 Brown multipoint 6-channel recorders
 - 1 phase detector for intercomparison of the 2 cesium beam frequency standards
 - 1 electronic counter and time interval meter, type HP 5245L
 - 2 Loran-C epoch monitor-timing receivers

All of the above equipment will be mounted in three 6-foot relay racks. The portable atomic clock will represent a separate package of the usual dimensions.

8. Services to be performed by the U. S. Naval Observatory. The U. S. Naval Observatory will be responsible for regular visits to the Time Reference Station for the purposes of synchronization and familiarization concerning the time reference activities. The U. S. Naval Observatory will provide replacement equipment, as necessary. Support services to be performed by the U. S. Coast Guard personnel. After initial indoctrination and based on the experience with the NavAstroGru Det C in Hawaii, it can be expected that U. S. Coast Guard technicians time in the order of 1 hour per day will be required in support of the time reference and monitor activities to be performed. The work consists principally of regular servicing of the recorder, taking of readings twice per day, and dispatch of 1 message per day to the U. S. Naval Observatory, Washington, D. C. The regular communication with the U. S. Coast Guard Master Station on Iwo Jima will only occasionally have to be augmented by information regarding the precise timing of the emissions. In essence, therefore, the monitoring activities will provide:

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- a. Regular daily information for the U. S. Naval Observatory.
- b. Direct information for the Master Station in Iwo Jima regarding timing.
- c. The monitor station, in addition, will also be accessible to visiting portable clocks from DoD and other U. S. Government Agencies.
- 9. The activities are proposed as cooperative efforts on a non-reimbursable basis. An interservice support would follow when these informal arrangements are finalized.
- 10. It is hoped that the requested arrangements and permission can be granted by the Commandant, U. S. Coast Guard, as soon as practicable, in view of PROJECT CAESAR support requirements.

J. M. McDOWELL



U. S. NAVAL OBSERVATORY

WASHINGTON, D. C. 20390

OAN-3 IN REPLY REFER TO 3930 62 2400 3 0 JAN 1968 JAN 2 3 1968

Chief, Office of Engineering

Chief, Office of Operations

From: Superintendent, U. S. Naval Observatory

Naval Observatory Proposal regarding use of Coast Guard Loran Monitor Station, Fuchu

Ref: (a) CCS memo 28 Feb 1964 S. Naval Observatory Time Reference and Monitor

1. Enclosure (1) is a request from the U.S. Naval Observatory for support services in connection with their responsibility for coordination; control and dissemination of precise time.

- 2. In consonance with reference (a) and recognizing that a great deal of technical exchange between representatives of the Electronics littles Engineering Division and the Observatory regarding Loran-C timing has be taken place over the past few years, it is requested that you take the all enclosure for action. There is no operational requirement or consideration which would preclude the Coast Guards' compliance with the request assuming only that the technical support requested is within the capability of the Coast Guard personnel assigned. Cooperation with various
- 3. Please keep me informed of the intent and scope of any agreement consummated relating to subject proposal. I would be interested in your comments on paragraph 5b of enclosure. Coordinated with the U. S. monitor the output of the Loran-C Master Station in Nov. 1968, WestPac. This monitoring will be required beginning in March 1968. It will necessitate activities very similar to the ones, at the present time, that are executed by Detachment CMARLIE in respect to R. We GOEHRING Island Loran-C Master Station.
- 4. Preliminary discussions with Lt Cdr George Asche and Lt Cdr Paul Pakos of the U. S. Coast Guard have indicated the possibility of using the U. S. Coast Guard Loran-C Monitor Station in Fuchu Japan 68 the Enclis (1) U. S. Naval Observatory 1tr 2400 Ser 91 of 23 Jan 68
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ACTION: EEE

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PRIORITY

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LORAN-C MONITOR FUCHU A. COMDT Ø22224Z FEB 68 B. CCGD 14 Ø 60 143Z FEB 68

1. SPACE AVAIL FOR THREE SIX FT RACKS.

2. ELEC PWR: 105/210 VAC-50 CPS, 100VAC-50 CPS, 105/125 VAC-400 OPS WITH EMERG GEN OF SIX HR CAPACITY.

3. PRESENT THREE TON AIR COND UNIT MARGINAL, RECOMMEND FIVE TON

UNIT IF ADDITIONAL EQUIP. ADDED.

4. CONCUR WITH REF B. ON INCREASE OF COMPLEMENT, DUE PRESENT WORKLOAD OF LORAN-C AND OMEGA MONITORING AND MAINTENANCE.

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ACTION:

INFO:

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UNCLAS

A. YOUR 132140Z MAR 68

B. MY LTR SER 91 OF 23 JAN 68

1. FINAL DECISION ON ESTABLISHMENT OF TIME MONITOR STA AT LORAN-C MONITOR STA FUCHU JAPAN' PROPOSED BY HEF B WILL BE DEFERRED UNTIL RECEIFT OF YOUR LTR DETAILING ADMINISTRATIVE AND MAINTENANCE SUPPORT REQUIREMENTS.

2. AS STATED IN REF B FUNDS ARE NOT AVAILABLE FOR LOGISTIC SUPPORT IN JAPAN.

JW

1000 2 0 MAY 1969 Serial: 32221

From: Commander, Fourteenth Coast Guard District

To: Commandant (CPA)

Subj: Additional Electronics Technician; request for

Ref: (a) COMDT ltr 0238EEE of 8 March 1968

1. Reference (a) states that if a time monitor station is established at Fuchu Loran-C Monitor Station the personnel allowance will be increased by one electronics technician. The time monitor station was established in April 1968, and there has been no increase in personnel allowance to date.

2. It is requested that the allowance be increased by one ET1 or ET2. This ET should have some type of Loran-C training and experience (preferably AN/SPN-30) and should receive one week training in timing equipment and procedures from the Naval Observatory prior to arrival at Fuchu. An additional one week training on the GCF-W 425 Timing Cabinet would prove beneficial to the Section Office. This training might be best conducted at Electronics Engineering Center, Wildwood. No offsetting resource is available within this district.

R. C. GOULD Chief of Staff Acting

ACT INFO

COMPESEC COMDT (EEE)

COMDT (OAN)