

National Radio Astronomy Observatory

Very Large Array

June 2, 1982

To: H. Hvatum

From: W. Horne

Subject: Arrangements for Site Assembly Crew - 12 Meter Antenna-Tucson

12 METER MILLIMETER WAVE TELESCOPE

MEMO No. 171

Les Temple has requested that for his information and the information of his antenna mechanics, I summarize in writing the dates, hours of work, number of working days and living arrangements for the antenna mechanics from the VLA Site who will assemble the 12 meter back-up structure at Kitt Peak. This summary will also give you a chance to make such corrections or alterations to these plans as you consider necessary.

Schedule and work plan is based on the following assumptions:

- A. The structure will be shipped from Green Bank to arrive no earlier than Tuesday, July 27 and that delivery will not be delayed such that mechanics will not have parts to assemble. The trucking company should be aware that earlier delivery will be a problem in that mechanics to unload material will not be available.
- B. Cribbing will be in place in the ramp in front of the Electronics Building to support the back-up structure. Paul Rhodes is taking care of this.
- C. Available at the time of unloading will be a fork lift of about 4 tons capacity which Paul Rhodes has said he will provide. To finish off assembly we will probably need a small crane or cherry picker which Paul has told me that he can borrow from Kitt Peak.
- D. The large crane which we will use to remove the existing reflector and to install the new reflector will be brought to the site approximately August 4.

Plans for the antenna mechanics then are as follows:

1. A GSA pick-up truck will be procured (or borrowed from VLA) to haul the tools we will take with us from Socorro. These tools will be packaged and loaded on the truck preceding the 26th of July.
2. On the 26th of July, 2 of the Antenna Mechanics from VLA will drive the pick-up and tools to Tucson.

*O Subject to change. Will be decided no later than July 20. at the regular meeting
Sh.*

3. Work schedule for the mechanics will be a 10 hour day 6 days per week (40 hours at regular rate + 20 hours of overtime rate).
4. Mechanics will stay at night in Tucson. We should make reservations at some motel in Tucson - could Dale Webb get reasonable rates?
5. Noon meal will be on the mountain and as I understand it we pay cash there - should Kitt Peak be notified?
6. Mechanics will be reimbursed for per diem according to NRAO policy (up to \$22 per day plus room expenses).
7. Mechanics standard pay will be funded by VLA-12 Meter project will reimburse VLA for overtime, room expenses and per diem.
8. Mechanics will return to Socorro on either the 13th or 14th of August depending on work status.

Status of the work at the time of departure of the antenna mechanics to return to VLA should be:

1. Back-up structure assembled and connections welded.
2. Feed legs of existing structure removed
3. Existing reflector removed
4. New back-up structure installed on pedestal
5. Connections to elevation wheel from back-up structure installed.
6. Back-up structure aligned and shimmed so that collimation axis is orthogonal to existing elevation axis.
7. New feed legs assembled, installed and aligned.

If progress of the above tasks permits additional tasks performed by the VLA mechanics could be:

1. Touch-up painting of the back-up structure.
2. Alignment of auxiliary elevation drive checked and adjusted.
3. Installation of surface panels started.

Any comments, corrections, additions or deletions you care to make should be made before distribution to 12 Meter group.