

**ROSR INSTALLATION TRIP 1  
REPORT  
September 15-17 2015**

**DAY 1, Sep 15 2015**

- 08h — Arrive at MHI shipyard for safety training.
- 09h — Proceed to ship lab.
  - Review of install status.
  - Met with Kouji Tanaka. IP numbers. (Note 1)
  - Discussions of best data flow to ship computer system (scs). (Note 2)
  - Proceed to foremast.
  - Frame install. (Note 3)
  - Install power and network cable.
  - Confirm power at the foremast.
- 15h — In Laboratory
  - Confirm network.
  - Confirm operation.

**DAY 2, Sep 16**

- 09h — Arrive Kaimei laboratory.
  - Set proper IP numbers and confirm operation.
- 10h — Climb foremast. Add jumper wire to DAQ Hub (TX4 to RX5 for telnet)
  - Coding telnet program. (Note 4).
  - General operation of the system.

**DAY3, Sep 17**

- 09h — Arrive in Kaimei Laboratory
  - Review LAN output options. (Telnet is preferred)
  - Discuss maintenance and calibration.
  - General operation.
- 14h — Demonstration of ROSR system to officials.
- 15h — Foremast. Safety inspection. (Note 5)
  - Wrapped ROSR and DAQ in plastic.
- 18h — Depart RV Kaiwei.

**1. IP Assignments**

DAQ Hub	10.198.3.109
DAQ iBoot	10.198.3.110
DAQ PC	10.198.3.111
Tech PC	10.198.3.103
Telnet	10.198.5.1 port 4026

**2. SSST output to Ship LAN**

There was never a communication to RMRCo from the ship as to what sort of output would be required.

Four different output methods were suggested.

1. SSH — The OpenSSH connection can be used to get the data packet from the DaqPC. [√ Ready]

2. *FTP* — The FTP or SFTP is a second way to transfer the data packet.  
[√ ready]
3. *Telnet* — A telnet connection to an assigned IP and port.  
[80% ready]
4. *RS232* — An RS232 serial stream from DaqPC via a USB-serial converter.  
[50% ready]

Result: The Telnet method is preferred.

Forecast: RMRCo will finish the Telnet method by 26 Sep.

### 3. Frame status

The frame is solid. Tasks remaining:

1. Cut down vertical posts.
2. Attach top cross strut.
3. Attach rain sensor to the top strut.
4. Solid GPS attach.

Time required: 1 hour.

Missing pieces: (RMRCo will provide at Trip 2)

1. Smaller U-bolts for railing.
2. 'T' brackets (2) for cross strut.

### 4. Telnet Program

The program to create the telnet port is simple to write. However a software bug caused unreliable operation.

It was decided that the program (now 80% complete) would be better completed in the quiet office of RMRCo and not in the shipyard. We estimate this task can be completed in less than one week.

### 5. DAQ status.

Inspection identified these tasks:

1. Exposed AC wire inside. [ √ wrapped  
w electrical tape.]
2. Ground wire on RJ45 receptacle not connected. [ √ Fixed]
3. DAQ case ground needs direct connect to ship. [ Fix at Trip 2]

## PHOTOS





