

RCP02 V09 Release Notes

These notes cover changes made to the RCP02 code since release V08 of 25 May 1998. If you are upgrading from an earlier release, please read those notes also.

Bug Repairs

1. Repaired an error in the monitoring of INU angles. The "monitor INU" command would occasionally show the uncorrected (raw input) data, rather than the corrected values. This would become obvious if roll, pitch, or heading sign and/or offset corrections were being made. The values reported to IRIS in the RCV03 format would also occasionally be wrong. However the antenna stabilization itself was okay, and the antenna would move properly according to the motion commands that the RCP02 received.

New Features

1. The RCP02 now supports up to 64 additional TTL status inputs and/or control outputs (the total number is limited to 64). There must be room on the Platform-332 mother board to install an additional IP-DIGITAL-48 module for each group of 32 lines that are to be added. The auxiliary status lines are reported to the host computer via a special BITE packet whose ID may be chosen. Similarly, the reception of BITE packets (also with selectable ID) by the RCP02 is the mechanism for setting the auxiliary control outputs.
2. The BITE packet that is output by the RCP02 to represent the Kavouras TAC status now includes an additional bit to indicate that the TAC records themselves are being received properly by the RCP02. Also, the AIRFLOW, STANDBY, and WAVEGP status bits are sourced by corresponding bits in the received TAC record, and the TAC unit itself can now be reset by the command "reset ktac".

Setup Changes

1. A "View" option to the "Help" command has been added. It is used to view static internal status and configuration that is not easily visible from other RCP02 commands. So far the listing includes the date and time of the code compilation, board and code revision levels, and an inventory of all the IP modules that are plugged in.
2. The list of remapped output lines now includes "AZ0" (azimuth output bit #0). This is a useful choice when assigning the trigger blanking output, as it can be directly wired to the RVP7's TAG0 input from which the RVP7 trigger can be controlled directly. The polarity of the blanking output on AZ0 is always active low, i.e., TTL high requests a normal trigger.