

43m barometer has undecipherable char messages

8Jul13

Since the rain a couple days ago, and noted in the daily log, the 43m barometer has not been 'reporting' in cockpit and data plots. Although initially a power cycle didn't help, it later began spitting out messages again perhaps after a bit of drying of the sensor/cable. At first the messages were quite messed up but subsequently began sending normal looking messages per rserial. However there were non-printing/null characters embedded causing the scanf format to ignore it in the stats-proc for data plots, etc, so it appeared to be out completely. Today Chris went up and swapped in a fresh cable, to no avail. Nor did trying another port help. The messages look reasonable with good data via rserial and datastats show 14.83 hz, having some clearly bad lines every 10-20 messages or so. The problem is likely in the sensor/cannister itself but we don't have a spare and decided not to try opening it up. The data should be recoverable in port processing with a different scan format but for now at least we'll continue to see it as 'out.' Hopefully it will recover completely on its own.

Comment by Gordon, Jul 9. The serial driver reports many framing errors (fe) and break (brk) conditions, indicating a problem with the serial signal. These are the counts since the last reboot of the "high" DSM, 38 days ago:

```
cktty 8
8: uart:ST16654 port:F1000118 irq:3 tx:252 rx:827230600 fe:1647480 brk:3542175 RTS|CTS|DTR|DSR|CD|RI
```

As of this morning it seems that is is recovering.