

Below I summarize my current bug/wish list I compiled from the brief CASA test I have recently performed. I used a test position switch data obtained fairly recently at the 45m telescope. This data is already calibrated (and hence the on-off subtraction is done and the spectra are all in Kelvin units) using the 45m pipeline.

I apologize in advance if some of the items I list here are due to simple misunderstanding on my part. I may have also listed items that may already have JIRA tickets assigned.

CASA version: 3.0.2

Computing Environment: Linux Fedora 10 (64 bit)

possible filler (45m to scantable) issues:

- The frequency conversion appears to be wrong when the LSB is used (see attached table for a comparison between the observational setup and the “sdlist” output from CASA).
- the “beam” and “IF” headers are used in a confusing way. I am using a dataset that has 8 IFs, but when I read it into CASA, it says it has 8 beams and 4 IFs. I think the “IF” should be sequential with no overlap. The “beam” should be a single number for all IFs if a single beam receiver is used.

“sdlist” issues:

- The “Time” column appears to give the wrong time – the minutes are stored in hours, and seconds are stored in minutes (a possible filler bug?).
- It will be nice to see in the header
 - the source velocity with reference (i.e. LSR) and definition (i.e. Radio, optical)
 - the map center coordinates

“sdplot” issues:

- Would be nice if we can do data selection using the beam.
- Need a way to page thru a large number of scans (critical for OTF with a bunch of scans) (I know this is currently being worked on)
- Need a way to specify a range of scans in ‘scanlist’ (i.e. scanlist = [1-10] to specify scans from 1 to 10, rather than [1,2...9,10] which is cumbersome)
- Nice if we can zoom single panel in the GUI (currently zooms all of the panels in the GUI at the same time)

“sdflag” issues:

- Need an interactive flagging mode for this
- Nice if we can specify a beam list (currently supports scanlist, iflist, and pollist)
- plotting takes a long time (not sure how to solve this)