



## Can CASA perform Tsys calibration on WSRT data sets?

Imported Agent 83 - 2023-11-01 - CASA

There is a known issue within the gencal task that when attempting to create  $T_{\text{sys}}$  calibration tables for WSRT data it will result in the error messages:

```
SEVERE Calibrator Caught Exception: SYSCAL table is incomplete.  
Cannot proceed.  
SEVERE Exception Reported  
SEVERE gencal An error occurred running task gencal.
```

This occurs because gencal was developed with the calibration of ALMA  $T_{\text{sys}}$  data specifically in mind. ALMA  $T_{\text{sys}}$  data is measured and recorded as a spectrum which is filled into the SYSCAL table of the measurement set (MS) upon importing from the ASDM format. Because WSRT  $T_{\text{sys}}$  data is unchannelized the importation from UV FITS does not fill the SYSCAL table in the way gencal is expecting.

If the WSRT  $T_{\text{sys}}$  data is originally stored as a UV FITS TY table then it may be possible to ingest that data into the MS but it would likely require further tweaking to get the gencal task to work properly on it. There are no plans for the CASA project to address this WSRT data-compatibility problem.