LSTxxx

Trigger: OSF – Requires 'w' in LS stage

Summary

> Creates a file listing exposure names and POD file names needed to process this DATASET, including any member names if this is an association, or any special files (e.g. NIC SAA darks). If EDT files should be used for processing instead of POD files, an indication of this will appear in the generated file.

This process begins by testing DATASET (from the triggering OSF) to see if it is an association. This is performed by checking the last character of the name, and if it is a digit [0–9] or letters [a–j], and this instrument supports associations, then it is assumed to be an association. The dataset name is then converted to the name of the *primary product* by changing the last character to zero (0), and that name is searched for in the ***DSQUERY::OPUS_DB:asn_members*** database relation. Any collected members found for the association will be saved in a list of exposures. If the association has no collected members, this is considered an error, and the OSF is marked for failure.

An additional check is made for NICMOS datasets. If the dataset name appears in the ***DSQUERY::OPUS_DB:nic_saa_link*** database relation, then this dataset has a corresponding SAA dark association. The members of that association are then obtained by another query to ***DSQUERY::OPUS_DB:asn_members***, and those names are added to the exposures list. If no collected members are found for the NIC SAA dark association, again the OSF is marked for error.

If the DATASET requested was not an association, then the name of that dataset is the only entry in the exposures list.

A file named like the OTFR request, but given a **`.podlist`** extension. (e.g. **`1412020112345_n12345678.podlist`**) is created in the request-specific subdirectory to hold the data sources required for all exposures needed to re-process this DATASET. This file will indicate how to generate archive requests to retrieve the needed files for re-processing. There are currently two choices for the source of the exposure data: POD or EDT. Normally POD will be used, but there are some datasets for which valid POD files do not exist in the archive, and for these the archived EDT set will be used for re-processing.

Now the data source for each entry in the exposures list must be determined. A check is made of the ***ARCH_SERVER::ARCH_DB:otfr_special_processing*** relation, and if the exposure name appears there with ***osp_data_source*** = EDT, then this exposure is not supposed to be re-processed from POD files, but from archived EDT files instead. Usually this indicates there was a problem with the original POD files, and repaired EDT files were created and archived instead. In this case an EDT entry is made in the **`.podlist`** file for this exposure.

If no special processing records are found, then the exposure is searched for in the ***DSQUERY::OPUS_DB:podnames*** relation. This search is performed for the *first 8 characters* of the dataset name, with the last character wild-carded. This is done because the DATASET listed in the archive is not necessarily the same exact name found in the ***podnames*** relation. The last character of the dataset name can differ depending on how many times the dataset was sent from DDF/PACOR to STScI. All POD names found by this query are returned, and if different last characters in any exposure names were found a second query is made. This one goes to the ***DSQUERY::OPUS_DB:executed*** table to see what the prefered version of the exposure is. This name and the corresponding POD files are written to the **`.podlist`** file.

The **`.podlist`** file should now contain entries describing the names and data sources of all of the "raw material" files (PODs and EDT sets) needed to re-process DATASET.