1 Procedure

Three step procedure:

- Data Research Data research involves searching the literature to find out what data has been taken for a given nova.
- **Data Acquisition** Retrieving the data. This can mean either downloading the data or contacting the author of the original paper.
- Data Importation Incorporating the data into the ONC software.

2 Ticket System

We will use the ticket system: each new piece of data will be assigned a ticket. This serves a two-fold purpose:

- 1. It ensures that we are, at the very least, aware of all of the data that has been used in published articles for a given nova.
- 2. It ensures that, from the start, we maintain an accurate provenance for each piece of data, as well as complete meta-data.

Tickets will be initially created in the data research step, and fields will be filled in during both the data research and data acquisition steps. A complete ticket means that the data is ready to be incorporated into the ONC.

2.1 When to Make a New Ticket

There are several factors that determine when a new ticket should be generated

- 1. **Reference** A single ticket should never have multiple references. If the same group took data on the same nova, using the same telescope/instrument, but published part of it in a different article, it will still get its own ticket.
- 2. Nova If a single reference has data for multiple novae, every novae from that reference will get its own ticket.
- 3. **Data Types** If a single paper publishes both photometry and spectra, each of these should get their own ticket. This is because the meta-data associated with photometry and spectra are different.
- 4. Wavelength Regime If a single paper publishes both radio and optical photometry, each of these should get their own ticket. This is done mostly for the ease of bookkeeping.

2.2 When NOT to Make a New Ticket

There are also several cases that may seem like they would necessitate different tickets but do not.

1. **Telescopes/Instruments/Observers** Most collection of spectra and photometry are a compilation from many different telescopes, instruments, and observers (e.g. AAVSO). Giving each one their own ticket would end up generating a flood of tickets for each data collection. So, instead, we have included the ability to specify different Telescopes/Instruments/Observers in the data file, by allowing the user to specify columns within the file that provide information on these differences.

2.3 Naming Convention

To make parsing/understanding individual tickets easier, we will use a specific naming convention for them. Every ticket should use the following naming convention:

<Nova Name>_<First Author>_<Wavelength Regime>_<Data Type>.txt

Where data type can be photometry, spectra, or image.

So, for instance, if the ticket was for the radio photometry for FH Ser taken from Hjellming et al. (1979) the ticket name would be:

FHSer_Hjellming_Radio_Photometry.txt

A Example: Ticket for FH Ser Radio (Photometry) Data

- OBJECT NAME: FHSer
- TIME UNITS: Days
- FLUX UNITS: mJy
- FLUX ERROR UNITS: mJy
- FILTER SYSTEM: NA
- MAGNITUDE SYSTEM: NA
- WAVELENGTH REGIME: Radio
- TIME SYSTEM: MJD
- ASSUMED DATE OF OUTBURST:
- TELESCOPE: NA
- INSTRUMENT: NA
- **OBSERVER:** Hjellming, R.
- REFERENCE: 1979AJ.....84.1619H
- DATA FILENAME:
- TIME COLUMN NUMBER:
- FLUX COLUMN NUMBER:
- FLUX ERROR COLUMN NUMBER:
- FILTER/FREQUENCY/ENERGY RANGE COLUMN NUMBER:
- UPPER LIMIT FLAG COLUMN NUMBER:
- TELESCOPE COLUMN: NA
- INSTRUMENT COLUMN: NA
- OBSERVER COLUMN: NA
- TICKET STATUS: Waiting for acquisition.