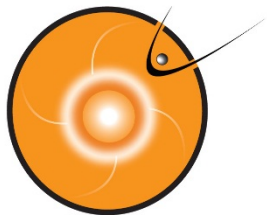# CCMC Information Architecture and Interactive Archives

Chiu Wiegand

Model Metadata: models, runs, and output

- **<u>GOAL: Enable and Improve the use of our models for the community!</u>**
  - Centralized CCMC Metadata database store metadata on:
  - <u>Simulation Model:</u>
    - Track all model info and versions
    - Help in implementing the submission interface if input parameters are included
  - <u>Simulation Run:</u>
    - Track all runs info
    - Improve search functionality on our ROR archive
    - Before new run for a model is submitted, check database for an existing or similar run. Provide option for users to view/download a similar run instead of submitting a new run
  - <u>Simulation Outputs</u>
    - Provide API and locations to obtain run outputs for users
- **Focused on providing APIs/webservice for other applications to obtain/ exchange metadata/data**
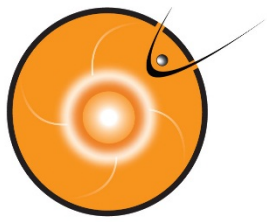
Simulation Models

Simulation Runs

Simulation Outputs
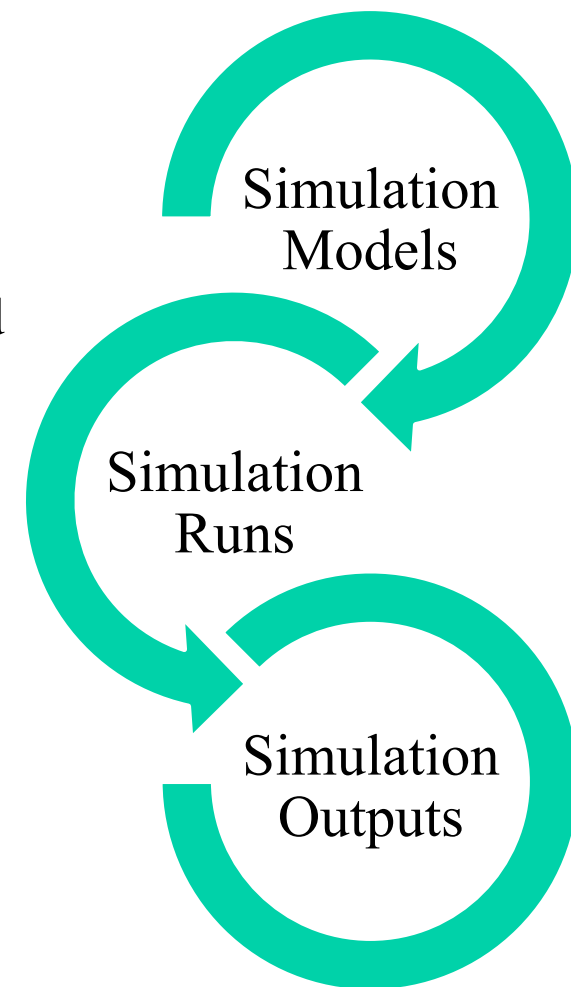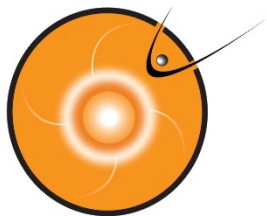
Using metadata: models, runs, and output
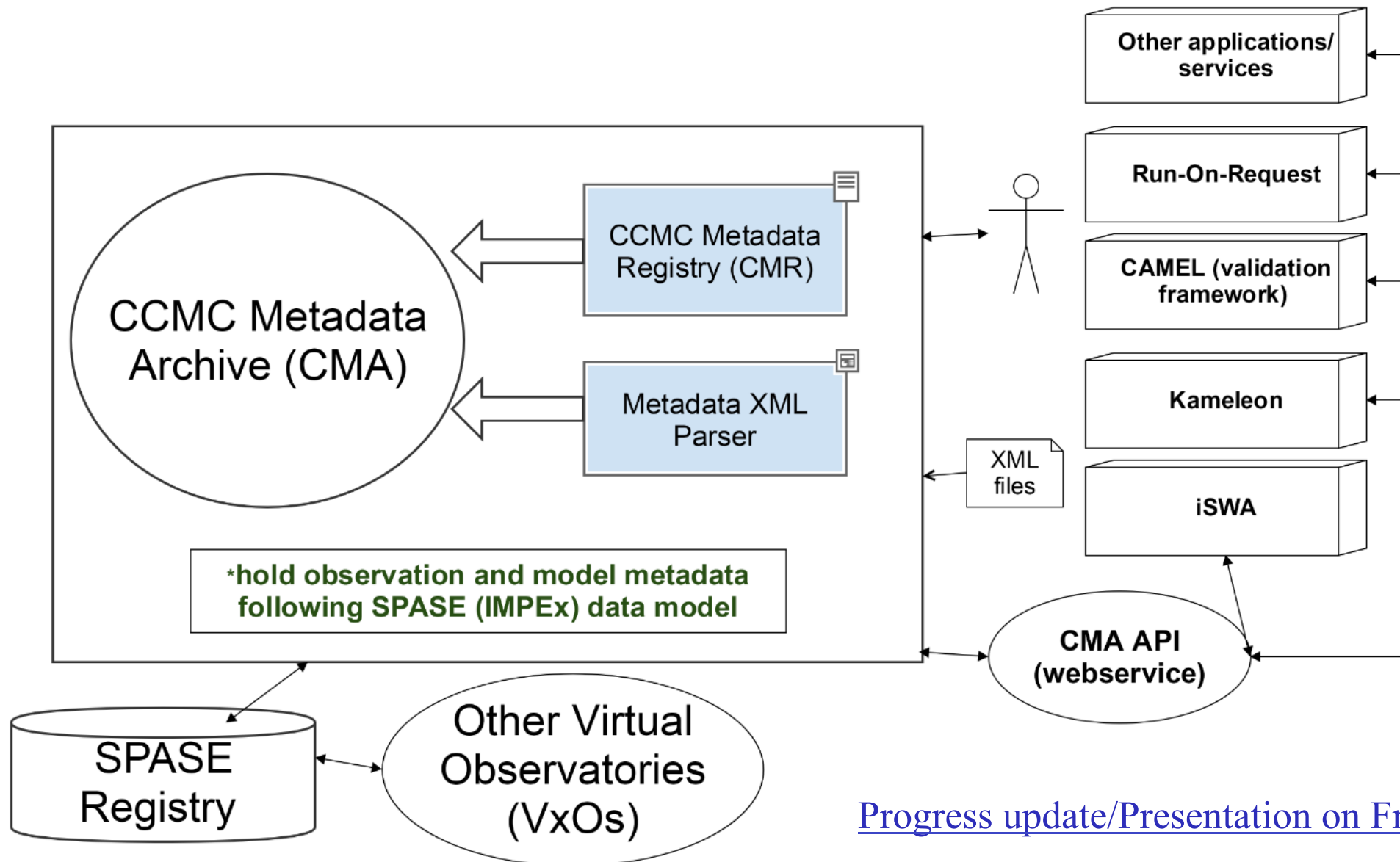
Progress update/Presentation on Friday morning!

Data Access and Data Distribution

- Focused on building common APIs to exchange data with other data/ modeling centers
- Use standards if they are available:
  - Example: Heliophysics Application Programming Interface (HAPI) Data Access Specification
    - RESTful API and streaming format specification for delivering digital time series data
    - Learn more by coming to Jon Vandergriff talk on Friday morning
- Use other data/modeling center existing APIs/webservices
  - Example: CCMC collaboration with SPENVIS (Progress update/ presentation on Friday morning)