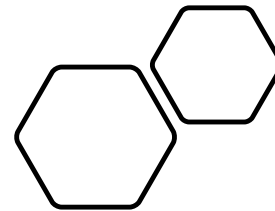


IVOA Closing Address
Virtual IVOA
Interoperability Meeting,
April 2022

<https://www.ivoa.net/>



G. Bruce Berriman
Chair, IVOA Executive
Committee
(USVOA/NAVO)

An Excellent Virtual Meeting

- Registrations: 186!
- Many thanks to everyone for attending even at ungodly local hours!
- New standards approved by Exec:
 - GMS1.0
 - SimpleDALRegExt1.2
 - MOC 2.0

| Wednesday Apr 27, 2022 | | | | |
|---|-------|-------------------|---|---|
| ZOOM LINK for Wednesday: session complete | | | | |
| 7 | 5:00 | 60 min | Grid and Web Services 1 | Giuliano Taffoni/Christine Banek / Brent Miszalski |
| | 6:00 | Break - 30 min | | |
| 8 | 6:30 | 60 min | TDIG/Radio/CSP | Ada Nebot/Brent Miszalski/Mark Cresitello Dittmar/Mark Lacy/Francois Bonnarel |
| | 7:30 | Break - 6.0 hours | | |
| 9 | 13:30 | 60 min | Education | Henrik Heini, Giulia Iafate |
| | 14:30 | Break - 30 min | | |
| 10 | 15:00 | 60 min | Data Model 1 | Laurent Michel/Jesus Salgado |
| | 16:00 | Break - 4.5 hours | | |
| 11 | 20:30 | 60 min | Applications | Tom Donaldson/Adrian Damian |
| | 21:30 | Break - 30 min | | |
| 12 | 22:00 | 60 min | Theory | Gerard Lemson/Simon O'Toole |
| | 23:00 | End of Session | | |

IVOA Leadership Positions Appointed 2022

Extensions to current appointments:

| WG/IG | Chair | Vice-Chair |
|-----------------------|-------------------|-------------------|
| Data Models | Laurent Michel | Jesus Salgado |
| Semantics | Markus Demleitner | Carlo-Maria Zwolf |
| Operations | Mark Taylor | Steve Groom |
| Grid and Web Services | Giulinao Taffoni | ... |

New appointments:

| WG/IG | Chair | Vice-Chair |
|-----------------------|----------------|-----------------------|
| Registry | Renaud Savalle | Tess Jaffe |
| KDD | ... | Yihan Tao |
| DCP | Gilles Landais | ... |
| CSP | Ada Nebot | Francesca Civano |
| Grid and Web Services | ... | Dave Morris (interim) |

| Position | |
|-------------------------------|--------------|
| Executive Committee Secretary | Marcy Harbut |

Retiring from WG/IG Positions

| Person | Role |
|-------------------|------------------------|
| Tom Donaldson | Apps WG Chair |
| Teresa Dower | Registry WG Chair |
| Pierre Le Sidaner | Registry WG Vice-Chair |
| Andre Schaff | DCP IG Chair |
| Tim Jenness | DCP IG Vice-Chair |
| Christine Banek | GWS Vice-Chair |

With thanks for your service!

Open positions May 2022

| WG/IG /Position | Role |
|-------------------|----------------|
| Applications | Chair |
| DCP | Vice-Chair |
| IAU Lab Astro. WG | Representative |

➔ Please consider nominating yourself you are interested and able to serve!

Special Thanks for A Successful Meeting!

- The Organizers making it happen!

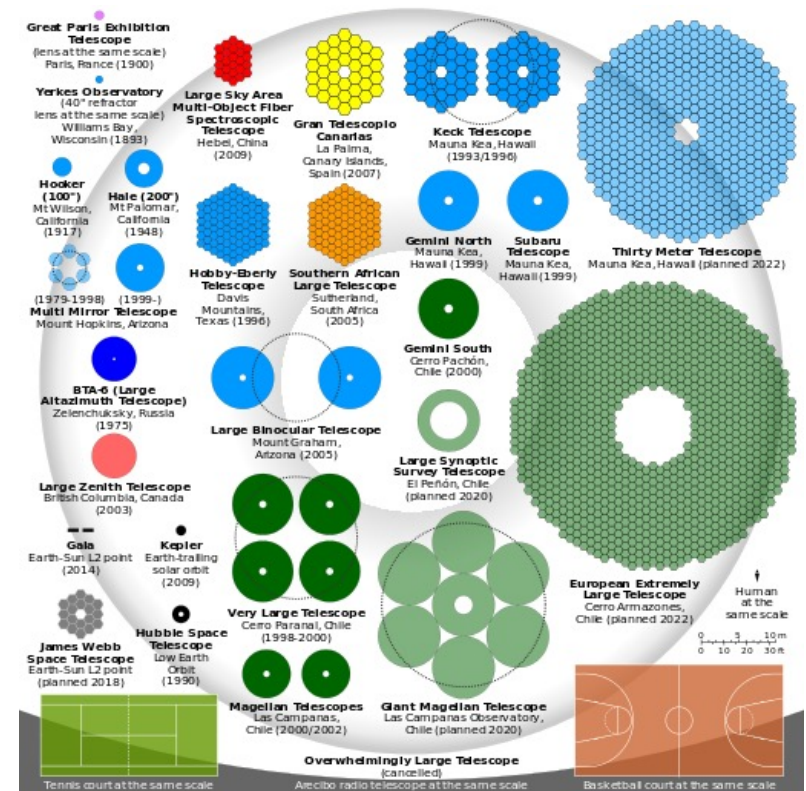
- Janet Evans
- Marco Molinaro
- Giulia Iafrate
- Giuliano Taffoni
- Hendrik Heinl
- Mark Cresitello-Dittmar
- Ada Nebot
- Anne Raugh

- Italian National Institute for Astrophysics (INAF) for registration/web site
- CANFAR for hosting the recordings.
- Special guests from the IAU: Gabriele Giovannini, Marie-Lise Dubernet, Vanessa McBride.



Challenges for the IVOA In 2022 And Beyond

- PB scale missions will be commissioned!
- Big new telescopes!
- Support "science platforms" with analysis close to data.
- Support new data-type adoption, driven by the growth in size and complexity of data sets.
- Time-domain astronomy and multi-messenger astronomy
 - MOC 2.0
- New radio projects.
- Machine learning.



Challenges and Opportunities

- VO and FAIR principles
 - IVOA well positioned to support implementation of FAIR standards.
- Survey of projects received 45 responses
- IAU
 - Special session led to suggestions for how we can best become engaged with the IAU.

Doug Tody would be pleased!



The Next Meeting

- Currently, we plan to hold a 2-3 day virtual meeting October 18-20.
- The Exec is looking into the possibility of holding a hybrid meeting instead.
- No decisions made yet!
- Please stay tuned.

Stay In Touch! Please Stay Safe

- IVOA Newsletter.
<https://www.ivoa.net/newsletter/index.html>

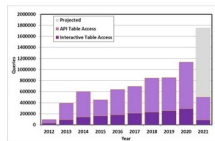


VO APPLICATIONS AND IMPLEMENTATION HIGHLIGHTS

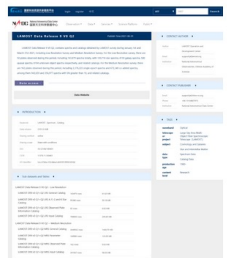
TAP Service at the NASA Exoplanet Archive

Bruce Berrman

The NASA Exoplanet Archive, operated by the NASA Exoplanet Science Institute at IPAC, has over the past 18 months redesigned its infrastructure to make the data more standardized, easier to access, more complete, and better reflect the scientific progress of the field of exoplanetary astrophysics. As part of this effort, the Exoplanet Archive released new and more comprehensive tables that were underpinned by Python-based nexsciTAP server (<https://github.com/Caltech-IPAC/nexsciTAP>). With the release of the new tables atop the new TAP services in 2020, the NASA Exoplanet Archive saw a noticeable increase in access of the tables by the community. The NASA Exoplanet Archive is now in the process of making all its tables TAP compliant.



Growth in usage of the NASA Exoplanet Archive over time. The TAP services were released in 2020.



VO standards-based Metadata Management and Data Submission System of NADC

Yihan Tao

The National Astronomical Data Center (NADC) of China has developed a metadata management and data submission system. Data preservation for research project is one of the major responsibilities for NADC. The system is aimed at supporting the data submission process of astronomical projects, including the submission and review of metadata and data. With the system, data administrators can also curate a published data catalogue and manage the metadata. The metadata standard employed in the system is consistent with and extended from the VO standards-Resource Metadata for the Virtual Observatory Version 1.12 and IVOA Observation Data Model Core Components and its Implementation in the Table Access Protocol. In order to describe and filter the dataset by types, a multifaceted taxonomy of waveband, telescope/project, subject, data product type, production age, process level, content type and content level is adopted in the system and displayed as tags.

