ASTRONOMICAL DATA ANALYSIS SOFTWARE AND SYSTEMS XXVI

COVER ILLUSTRATION:

Hundred millions 2MASS point sources photometry retrieved through HEALPix indexing query through a TAP service (top), and a billion mean isotropic positional errors from GAIA DR1, again using HEALPix indexing retrieval through a TAP service.

Taylor, Mantelet and Demleitner, this volume (page 412).

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Preface

This volume of the ASP Conference Series contains papers presented at the twenty-sixth annual conference for Astronomical Data Analysis Software and Systems, also known as ADASS XXVI, held in Trieste, Italy, October 16-20 2016.

The ADASS Conference Series provides a forum for scientists and programmers concerned with algorithms, software, and software systems employed in the acquisition, reduction, analysis, dissemination, storage and retrieval of astronomical data. An important element of the program is to foster communication between developers and users with a range of expertise in the production and use of software and systems. The program consists of invited talks, contributed oral and display papers, tutorials, user group meetings, and special interest group meetings (called BoFs).

1. Conference Overview

ADASS XXVI was hosted by the Trieste Astronomical Observatory of the Italian National Institute for Astrophysics (INAF-OATs), in collaboration with Università di Trieste (UniTS) and Comune di Trieste. The conference was held in the "Stazione Marittima" Conference Centre. Surrounded by the sea on three sides, located just a few meters from the main square (Piazza Unità d'Italia), the "Stazione Marittima" is one of Trieste's most significant historical landmarks.

ADASS XXVI called for contributions addressing the following key themes:

- Reduction and Analysis Algorithms for Large Databases and Vice-versa
- Management of Scientific and Data Analysis Projects
- New Trends in HPC and Distributed Computing
- Long-term Management of Data Archives
- Data Models in Astrophysics
- Python in Astronomy
- Surveys for Transient Objects in the Era of Gravitational Wave Astronomy

There were 314 registered participants, representing 28 countries in all continents. There were 11 students, and 16 participants received financial support.

The conference started on Sunday October 16 with two very well attended tutorials (over 100 persons each). Over the three and a half days of the conference, there were 9 invited talks, 39 oral contributions, 164 posters, 4 BoF sessions, 2 focus demos, and 11 demo booths (4 commercial, 7 institutional).

A brand new social project ("Drops Of ADASS") was available, aimed at allowing anyone working on ADASS topics to share his/her work in 90-second videos, in which they could explain who they are, their research and why it is interesting for the ADASS community.

ADASS XXVI was followed by the International Virtual Observatory Alliance (IVOA) Interoperability Workshop, held on October 21-23 at the same location. Of the 109 participants in the IVOA Workshop, 88 had participated In ADASS as well.

2. Social Events

On Sunday the tutorials were followed by a welcome reception in the Magazzino 42 area of the "Stazione Marittima" building. Participants had the opportunity to network with their ADASS colleagues in a pleasant and scenic location, while enjoying the taste of the local cuisine.

On Monday, a Gala Dinner was held at the Savoy Restaurant of the Savoia Excelsior Palace, one of the historical palaces of Trieste, now a 5-star luxury hotel.

On Tuesday, the "Connections" concert was held. Concertos K414 and K449 for piano and strings by Mozart were performed by the orchestra of the "G. Tartini" Conservatorium in Trieste and by a pianist located at the Academy of Music of the University of Ljubljana, 120 km away. The LOLA (LOw LAtency) hardware/software ultra-low-latency audio-visual streaming system was used for the event. A reception held at the Birreria Forst was associated with the concert.

On Monday, Tuesday and Wednesday mornings, there was an ADASS XXVI Jogging Wakeup, in which LOC members, starting from the "Stazione Marittima", led participants in a jogging discovery of the Trieste harbour.

3. Proceedings Overview

Of the 229 contributions to ADASS XXVI, about 80% were submitted for these proceedings, for a total of 182 papers. Over the years, the volume and complexity of data presented in papers have made the use of colours an intrinsic part of many figures, some of which can be quite intricate. For this reason, readers are encouraged to consult the electronic version of these proceedings in order to see figures in colour, and to zoom in as needed. The online proceedings are available on the ADASS website[1].

4. People and Institutions behind the Conference

Many people and institutions are needed to organize a conference, from the program itself to all the logistic aspects involved, to the funding needed to get things implemented.

The ADASS XXVI Program Organizing Committee (POC) was chaired by Nuria Lorente (AAO) and included Pascal Ballester (ESO), Sebastien Derriere (CDS), Mike Fitzpatrick (NOAO), Carlos Gabriel (ESA-ESAC), Stephen Gwyn (CADC), Jorge Ibsen (ALMA), Tony Krueger (STScI), Kathleen Labrie (Gemini Observatory), Mark Lacy (NRAO), Jim Lewis (IoA), Fabio Pasian (INAF-OATs), Arnold Rots (SAO), Keith Shortridge (AAO), Mauricio Solar (UTFSM), Tadafumi Takata (NAOJ), Harry Teplitz (IPAC/ Caltech).

The Local Organizing Committee (LOC) was co-chaired by Fabio Pasian (INAF-OATs) and Stefano Borgani (UniTS and INAF-OATs), and included Carlo Baccigalupi (SISSA), Guido Cupani (INAF-OATs), Simonetta Fabrizio (INAF-OATs), Federico Gasparo (INAF-OATs), Giorgio Giorgetti (Uni TS), Giulia Iafrate (INAF-OATs), Marco Molinaro (INAF-OATs), Erik Romelli (UniTS - INAF-OATs - Science Industries),

[1] `http://adass.org/proceedings.html`

Gabriella Schiulaz (INAF-OATs), Giuliano Taffoni (INAF-OATs), Daniele Tavagnacco (INAF-OATs - Science Industries), Claudio Vuerli (INAF-OATs).

The secretariat was provided by The Office, Professional Congress Organizers. Other people gave important support: Sara Bertocco, Thomas Gasparetto, Elisa Londero, Stefano Sartor, Sonia Zorba among others. Special thanks are due to Guido Cupani, who gave an extremely valuable help in the reviewing papers, and to Francesco Cepparo, who gave priceless contributions to the construction of these proceedings.

Finally, we gratefully acknowledge the financial support of the conference sponsors INAF, the ADASS partners, Fondazione CRTrieste, Consorzio per la Fisica di Trieste, SISSA, Altec, E4 Computer Engineering, Eurotech; the collaboration of Università di Trieste, Comune di Trieste, Regione Autonoma Friuli Venezia Giulia, MHPC; and in particular the support of the LightNet consortium and of Science Industries.

5. ADASS Information

Details about ADASS XXVI are available on the Web[2]. Past conferences are listed on the ADASS webpage[3]. ADASS XXVII is hosted in Santiago, Chile, in October 2017; ADASS XXVIII is hosted in College Park, MD, USA in November 2018.

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Keith Shortridge
Fabio Pasian

[2] `http://www.adass2016.inaf.it`

[3] `http://www.adass.org`