Scientific Workflows

Quick status

GWS Working Group

Since Pune

- (feedback from Wf4Ever project)

- BoF about Scientific Workflows at ADASS Paris in November 2011

- workflow@ivoa - IVOA Note about Scientific Workflows in the VO updated

Inputs from Wf4Ever (J.E. Ruiz)

- On-going efforts to improve seamless building of scientific workflows in the Astronomy domain have already produced the first <u>ready-to-install AstroTaverna plugins</u>. Among the most important features are:

  - Access to Virtual Observatory Registry

  - Access to ConeSearch, SIA and SSA VO Services

  - Efficient visualization of VOTables data and description

  - VOTable data extraction and filtering

- <u>http://wf4ever.github.com/astrotaverna/</u>

Inputs from Wf4Ever (J.E. Ruiz) (2)

- Upcoming versions will cover <u>SAMP connectivity</u> to other <u>astronomical software</u>, access to <u>CDS SOAP Services</u>, access to <u>STIL Library</u> and <u>STILTS Tools</u> via local services, as well as other local services allowing files format conversion and standard astronomical functions.

- Moreover, because astronomers are found to be heavy users of Python scripting language, some exploration studies are considering to provide Taverna users the possibility to add their own Jython beanshells when building Taverna workflows.

- The work undertaken in the frame of the Wf4Ever project will foster the development of astronomical workflows, favoring the use of <u>Virtual Observatory</u> standards for interoperability among astronomical data and process.

ADASS BoF

- Presentations
  - Wf4Ever, Juande Santander Vela
  - IceCore, Sami Maisala
  - UVES workflow, Pascal Ballester
  - Different Wf levels in a project, Christian Surace
  - OWL, Francesco Pierfederici
- Available at http://www.ivoa.net/cgi-bin/twiki/bin/view/IVOA/ADASSXXIBoF4

BoF Discussion points

- How to boost the creation / sharing of Wfs knowledge in our community ?

  - People could be reluctant to fill with care the information required as part of the workflow preservation (data used, services, references, etc.) or to make the effort to ensure that it is reusable by others

- Wf4Ever is a European project with a limited time life

  - How to preserve Wfs on the long term ? What kind of things (user datasets, methodology, tools for backward compatibility, Licenses??, etc.)

- What can we learnt / what have we learned from other communities ?

- Publishing Wfs : review methods (peer review, volunteer, etc.)

- What parameters would you use to rate a Wf ? Or which ones would you like a rating system to provide you, so that you can select based on their quality / rating ?

workflow@ivoa

- We started a Workflow initiative in July 2011with a call for discussion and collaboration (over 30 interested people)

- Creation of a mailing list, workflow@ivoa.net (27 participants)

- A Note (draft) published during the last Pune Interop

- Planned for Urbana Interop

  - Note update

  - Discussion about what we need in the VO : new standards ?, best practice guide ? work on methodology ? preservation ?, in which WG ? etc.

Discussion

- New standards ?, best practice guide ? work on methodology ? preservation ?, in which WG ? etc.