2021-vespa-implementation-workshop

Participants

Please feel free to list yourself (and your institution):

- Pierre Le Sidaner (Observatoire de Paris)
- Stéphane Erard
- Alan Loh
- Alexander Lavrukhin
- Alexis Rouillard
- Ute Amerstorfer (IWF, Space Research Institute, Austrian Academy of Sciences, Graz, Austria)
- Benjamin Mampaey
- Benjamin Renard
- Arie Bikker
- Carlos Henrique Brandt
- Chloé Azria
- Chris Piker
- Cyril Chauvin
- David Parunakian
- Freek Verstringe
- In Sook Moon
- Jean-Michel Glorian
- Lukasz Tomasik
- Marcel Popescu
- Marco Delbo
- Mariusz Pooga
- Markus Demleitner
- Matthieu Alexandre
- Mickaël Boiziot
- Nicolas Bruot
- Nicolas Manaud
- Pierre Vernazza
- Stavro L. Ivanovski
- Steve Joy
- Veronique Delouille
- Angelo Pio Rossi (Jacobs University Bremen)
- Nicolas André

Schedule

Day 1, 29 Nov 2021 , 15:00-18:00 CET - Introduction	

Introduction • 15:00 - 15:10 - Welcome and introduction Angelo Pio Rossi	welcome_introduction.pdf	
• 15:10 - 15:30 - Why using VESPA/EPN-TAP for data sharing - Stéphane Erard • 15:30 - 16:00 - How does it all works? - Stéphane Erard	VESPA_workshop_2021.pdf	
• 16:00 - 18:00 - Participants data **5-10 min** presentations - all participants (see template below)		
• **SPHERE asteroid images and shape models (LAM, Marseille) Pierre Vernazza** Similar service: spectro_asteroids, planets (simple CSV file)	vespa-LP.pdf	

• **MOVIS asteroids NIR colors (AIRA, Bucarest) Marcel Popescu** Similar services: SNBAF, TNOsarecool, MPC, planets (simple CSV file)		
• **Asteroid data catalogues - MP3C (OCA, Nice) Nicolas Bruot** Similar services: SNBAF, TNOsarecool? Or Vvex, Bass2000 (for ingestion from an existing database). Priority : best value table (the other have series of successive measurements) Can use external_link to point to detailed target pages in MP3C site		
• **PDS PPI (UCLA + Iowa Univ) Steve Joy** How do we present data file organisation? Need to insert this in the table? Maps: convert to binary files (images) with one quantity each? (will allow using Aladin, and to make HiPS from these maps if high resolution available) ascii files: convert to VOTable, which are self-described? Some applications can handle some PDS4 datatypes: Autoplot (in progress); Splash (?); TOPCAT (tables only, beta version)		

• **Sunspots and coronal holes catalogues (ROB, Brussels) Veronique Delouille** 2 services, one with 2 tables (images + groups of sunspots) - TBC, can be related either via external_link or datalink_url		
• **Various services (Polarbase, CLIMSO, STORMS, ...) at IRAP (GSO, Toulouse)Jean-Michel Glorian** Update of DaCHS server will simplify consolidating the parameter descriptions (they are predefined in the latest version) Is it possible to refer to filters characteristics in SVO service (http://svo2.cab.inta-csic.es/theory/fps/)?		
• **Europlanet TA: data from lab and field studies Arie Bikker** Test project with a familiar dataset: CSV file with spatial extension & time tag. Should also include an actual Europlanet collection from the start.		

• **Europlanet VA / ML: MESSENGER magnetometer data set for boundary crossings (LMSU, Moscow and IWF, Graz)**Da vid Parunakian Important: check consistency of parameters with AMDA services		

Day 2, 30 Nov 2021 , 15:00-18:00 CET - Discussion		
Round table (group discussions) • 15:00 - 17:00 - Participants Data/EPN-TAP modelling - all participants	 (description of EPN-TAP parameters by function - look on the left side of slides)	
References	• Template for parameters, to be used to design your service: EPN-TAP_parameters_List_template.xlsx • Longer discussion of EPN-TAP parameter: EPN-TAP v2 parameter description	
• SPHERE asteroid images and shape models (LAM, Marseille)	group_1 - Carlos Henrique Brandt Stéphane Erard	
• MOVIS asteroids NIR colors (AIRA, Bucarest)	group_1 - Carlos Henrique Brandt Stéphane Erard	
• Asteroid data catalogues - MP3C (OCA, Nice)	group_1 - Carlos Henrique Brandt Stéphane Erard	
• PDS PPI (UCLA + Iowa Univ)	group_2 - Pierre Le Sidaner	
• Sunspots and coronal holes catalogues (ROB, Brussels)	group_2 - Pierre Le Sidaner	

• Various services at IRAP (GSO, Toulouse)	group_2 - Pierre Le Sidaner	
• Europlanet TA: data from lab and field studies	group_1 - Carlos Henrique Brandt Stéphane Erard	
• Europlanet VA / ML: MESSENGER magnetometer data set for boundary crossings (LMSU, Moscow and IWF, Graz)	group_2 - Pierre Le Sidaner	
• 17:00 - 18:00 - Summary of discussions - all participants		

Day 3, 01 Dec 2021 15:00-18:00 CET - Tutorial

Tutorial (interactive)

- 15:00 - 16:30 - Dachs Deployment and data services workflow - Carlos Henrique Brandt & Baptiste Cecconi

• 16:30 - 17:15 - Importing data from CSV / SQL - Chloé Azria		
• 17:15 - 18:00 - Importing data from MongoDB - Lukasz Tomasik		
To make a long story short: Running dachs on docker		

Day 4, 02 Dec 2021 , 15:00-18:00 - CET - Hands-on & implementation

Hands-on

- 15:00 - 17:00 - Participants implementation - all participants
- 17:00 - 18:00 - Running / testing / optimising workflow - all participants

Follow-up sessions

To finalize your service, we'll keep in touch through:

- Confluence workshop pages
- Discord channels
- https://voparis-gitlab.obspm.fr/vespa/dachs/services through issues (keep your q.rd updated even if your server is not installed)

Service follow-up status summary

see 2021-workshop-service-info

Connection info

• Please register on:

https://discord.io/vespa-workshop

The same tools can be used for follow up activities in the forthcoming weeks. If you have any issue, please reach out to Angelo Pio Rossi or Carlos Henrique Brandt

• Please also register on Confluence and voparis-gitlab if not already done (see below)

Software requirements

The workshop will use DaCHS on Docker container as it is meant to be simpler and to have it setup. For that, we need all the participants to have Docker (and, optionally, docker-compose) pre-installed.
Please, follow the instructions for your operating system as per Docker official documentation:

- Docker install: https://docs.docker.com/get-docker/
- Docker-compose (optional): https://docs.docker.com/compose/install/

Since the workshop will be hosted on Zoom + asynchronous chat on Discord, we highly recommend using the Desktop app (instead of the web-app).
Please refer to Discord official documentation for install instructions:

- https://discord.com/download

We will use VOParis Gitlab instance to exercise in hosting DaCHS/data resources, it is recommended to have Git installed on your system:

- https://git-scm.com/downloads

See also VESPA Data provider on-boarding process

The workflow with Gitlab for VESPA is outlined below:

See Intro slides. Please fill in, if not already there server_name and service_name metadata on this 2021-workshop-service-info

- STEP 1: Data provider team sends request for VESPA support (this is done with the call)
- STEP 2:VESPA teams invites an external user to EduTEAMS
- STEP 3: External user to accept the invitation
- STEP 4: VESPA to approve the new user and to setup groups memberships on EduTEAMS
- STEP 5:External user connects to https://voparis-gitlab.obspm.fr/ (using the EduTEAMS connection method — use your ORCID if your institute is not registered). This action creates the gitlab account
- STEP 6: VESPA to setup repositories, membership and groups on voparis-gitlab: External users can now access to their repositories

Documents & templates

Participant presentation template. Please feel free to use your own slides/templates, this is just to loosely guide the structure/content.

Links

- Dachs-on-Docker images definition and documentation (https://github.com/gavodachs)
  - On publication workflow: https://github.com/gavodachs/docker-dachs/blob/master/docs/data_publication.md
  - On persisting data (mounting data volumes to container): https://github.com/gavodachs/docker-dachs/blob/master/docs/data_persistence.md
  - Basics of running dachs-on-docker: https://github.com/gavodachs/docker-dachs/blob/master/docs/getting_started.md
- VESPA/EPN documentation pages
  - general-purpose link page to docs here: http://www.europlanet-vespa.eu/standards.shtml
- Useful (VO+EPN) tutorials pages: http://www.europlanet-vespa.eu/tutos.shtml
- List of VESPA EPN-TAP services EPN-TAP Services
  - On portal - http://vespa.obspm.fr/planetary/data
  - On Gitlab - https://voparis-gitlab.obspm.fr/vespa/dachs/services
- Excel sheet template for service parameters: parameter template