

# ***Ocean Data View Developments for SDN***

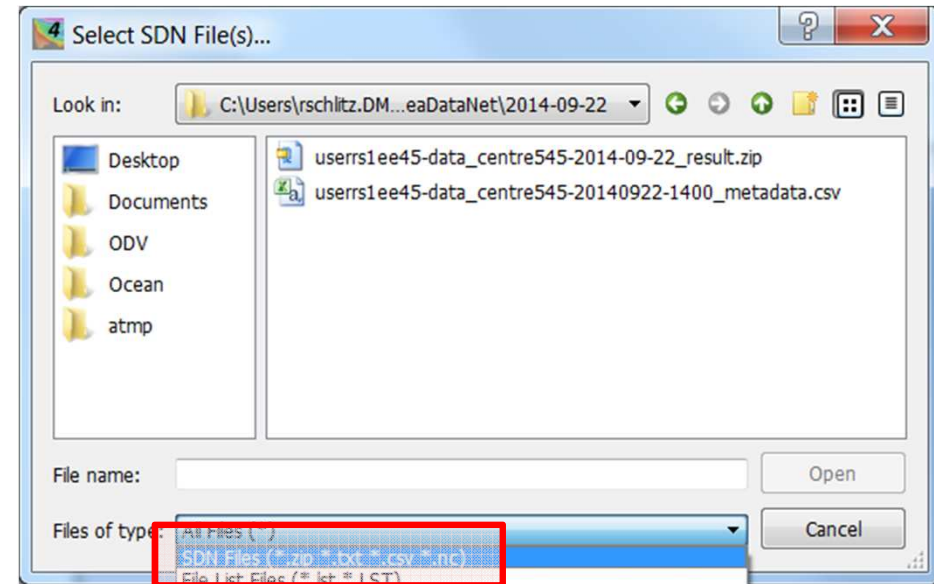
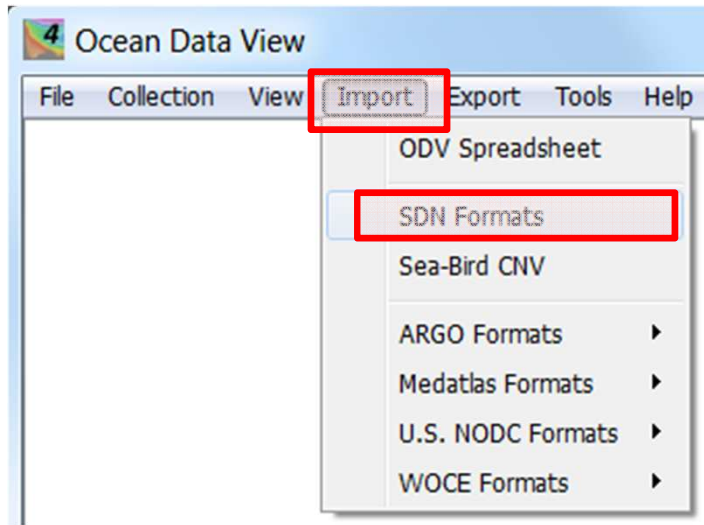


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- 1. Automatic/Manual QC*
- 2. SDN File Aggregation**
- 3. P35 Parameter Aggregation**
- 4. ODV API**

# SDN File Aggregation




- Metadata enrichment (imports **all** CDI fields provided via csv files)
- Imports *instrument code* and *fall-rate* information from data files
- Supports SDN netCDF files in addition to SDN/ODV txt files
- New 64-bit ODV allows import of all SDN data files in one go

vocab.nerc.ac.uk/col x Seadatanet search x


seadatanet.maris2.nl/v\_edmo/print.asp?n\_code=540

Apps AWI ODV Data Documents eJournals Media Shops Software Travel Weather Other bookmarks

 **SeaDataNet**

**PAN-EUROPEAN INFRASTRUCTURE  
FOR OCEAN & MARINE DATA  
MANAGEMENT**


**European Directory of Marine Organisations (EDMO)**

**Organisation details** Show (2821 of 3937) 

**DETAILS**

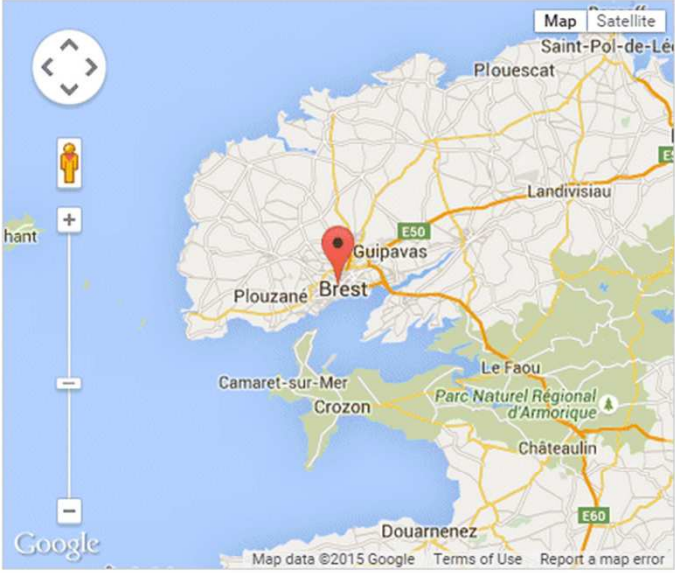
Name	SHOM (SERVICE HYDROGRAPHIQUE ET OcéANOGRAPHIQUE DE LA MARINE)
Address	13, rue du Chatellier CS92803
Zipcode	29228
City	BREST CEDEX 2
Country	France
Phone	+33 (0)2 98.22.05.73
Fax	+33 (0)2 98.22.05.91
Email	<a href="mailto:webmaster@shom.fr">webmaster@shom.fr</a>
Centre Website	<a href="http://www.shom.fr/">http://www.shom.fr/</a>

**ORGANISATION PROFILE**



SHOM's vocation is to guarantee the quality and availability of information describing the physical maritime, coastal and ocean environment, by coordinating its collection, filing and dissemination in order to meet public, military and civilian requirements at the lowest cost.

- SHOM is the national service designated by the government to carry out general hydrography for the benefit of all seafarers. Navigational safety, the priority field, is one of France's international obligations as a signatory of the United Nations convention on the law of the sea (UNCLOS) and of the international convention for the safety of life at sea (SOLAS). Geographical coverage: the French maritime space (EEZ, 2nd in area in the world); areas placed under France's maritime charting responsibility within the IHO or in accordance with bilateral agreements with coastal states.
- Within its areas of competence, SHOM supports the defence expertise and operational requirements in maritime environment.
  - o Collection, recording, processing and dissemination of the HOM (Hydrographic, Oceanographic and Meteorological) information relevant for naval operations.
  - o Production of environmental regional studies.
  - o Research and development.
  - o Ability to conduct a rapid environmental assessment operations.
  - o Involvement in interoperability and information management in liaison with its traditional information-



**GET DIRECTIONS**

OL0263 SDN:  
v3/print\_xml...

sical oceanogr...  
er column te...  
Vertical spati...

1

1

9

-125.417

18.667

2001.016

6

21.72

ODV4: PNetcdfCollec x vocab.nerc.ac.uk/coll x

vocab.nerc.ac.uk/collection/L33/current/041/

Apps AWI ODV Data Documents eJournals Media Shops Software Travel Weather Other bookmarks

## ↑ -- Sippican T-7 --

URI	<a href="http://vocab.nerc.ac.uk/collection/L33/current/041/">http://vocab.nerc.ac.uk/collection/L33/current/041/</a>
Identifier ()	SDN:L33::041
Preferred label (en)	<b>Sippican T-7</b>
Alternative label (en)	WMO:C-3:41
Definition (en)	<pre>{ "@context": { "wmoc_No": "http://codes.wmo.int/common/schema/core/No", "wmoc_Status": { "@id": "http://codes.wmo.int/common/schema/core/Status", "@type": "@id" }, "ssn_equation_a": { "@id": "http://purl.oclc.org/NET/ssnx/ssn/measurementProperty", "@type": "http://vocab.nerc.ac.uk/datatypes/datatypes.xml#eqCoeffA" }, "ssn_equation_b": { "@id": "http://purl.oclc.org/NET/ssnx/ssn/measurementProperty", "@type": "http://vocab.nerc.ac.uk/datatypes/datatypes.xml#eqCoeffB" } }, "@id": "http://vocab.nerc.ac.uk/collection/L33/current/041/", "wmoc_No": 41, "wmoc_Status": "http://codes.wmo.int/common/schema/core/statusOperational", "ssn_equation_a": 6.472, "ssn_equation_b": -2.16}</pre>
Version Info ()	1
Deprecated()	false
Date ()	2014-06-19 11:05:19.0



## ↑ -- Concentration of total phosphorus {P CAS 7723-14-0} per unit volume of the water body [dissolved plus reactive particulate phase] --

URI	<a href="http://vocab.nerc.ac.uk/collection/P01/current/TPHSZZXX/">http://vocab.nerc.ac.uk/collection/P01/current/TPHSZZXX/</a>
Identifier ()	SDN:P01::TPHSZZXX
Preferred label (en)	<b>Concentration of total phosphorus {P CAS 7723-14-0} per unit volume of the water body [dissolved plus reactive particulate phase]</b>
Alternative label (en)	Total_P
Definition (en)	Concentration of phosphorus in all species per unit volume of the water column held both in solution and in particles of any size. Phosphorous may be expressed in terms of mass or quantity of substance.
Version Info ()	2
Deprecated()	false
Broader	<a href="http://vocab.nerc.ac.uk/collection/P02/current/TDPX/">http://vocab.nerc.ac.uk/collection/P02/current/TDPX/</a>
Broader	<a href="http://vocab.nerc.ac.uk/collection/P35/current/EPC00135/">http://vocab.nerc.ac.uk/collection/P35/current/EPC00135/</a>
Broader	<a href="http://vocab.nerc.ac.uk/collection/S26/current/MAT00633/">http://vocab.nerc.ac.uk/collection/S26/current/MAT00633/</a>
Narrower	<a href="http://vocab.nerc.ac.uk/collection/P09/current/TPHS/">http://vocab.nerc.ac.uk/collection/P09/current/TPHS/</a>
Related	<a href="http://vocab.nerc.ac.uk/collection/P06/current/UPOX/">http://vocab.nerc.ac.uk/collection/P06/current/UPOX/</a>
Related	<a href="http://vocab.nerc.ac.uk/collection/S02/current/S053/">http://vocab.nerc.ac.uk/collection/S02/current/S053/</a>
Date ()	2015-08-27 14:32:34.0

# Per-Station Data History

The screenshot displays a software interface with a menu bar (File, Collection, View, Import, Tools, Help) and a main workspace. A red oval highlights a table of station history and a plot area. The table lists actions performed on station 4437, including imports and edits to temperature and depth data. The plot shows a series of data points with a red trend line. A text box in the foreground explains that history information remains with the station data during exports.

**Station ID: 4437**

Date	Time	Depth Range [m]	Bot. Depth [m]	Originator's Cruise	Originator's Station	Investigator
2013-08-28T09:21:10	rschlitz@GSYSM234-1	IMPORT (ADD)	from D:/rschlitz/data/importFormats/NODC/WOD09/OSDO5605.gz (2013-07-12T11:54:46)			
2013-08-28T11:47:56	rschlitz@GSYSM234-1	EDITFLAGS	Temperature [°C] @ Depth [m] = {0:1 5:1 10:1 25:1 50:1 75:0 100:0 150:0 200:0 250:0} -> 1			
2013-08-28T11:57:03	rschlitz@GSYSM234-1	EDITHEADER	Originator's Cruise ->Xaver's Cruise Investigator ->NN, Xaver			
2013-08-28T11:58:07	rschlitz@GSYSM234-1	EDITDATA	Temperature [°C] @ Depth [m] = {75:14.02} -> 14.02007			
2013-08-28T11:58:34	rschlitz@GSYSM234-1	EDITFLAGS	Temperature [°C] @ Depth [m] = {75:0} -> 1			

**Sample: 6 / 10**

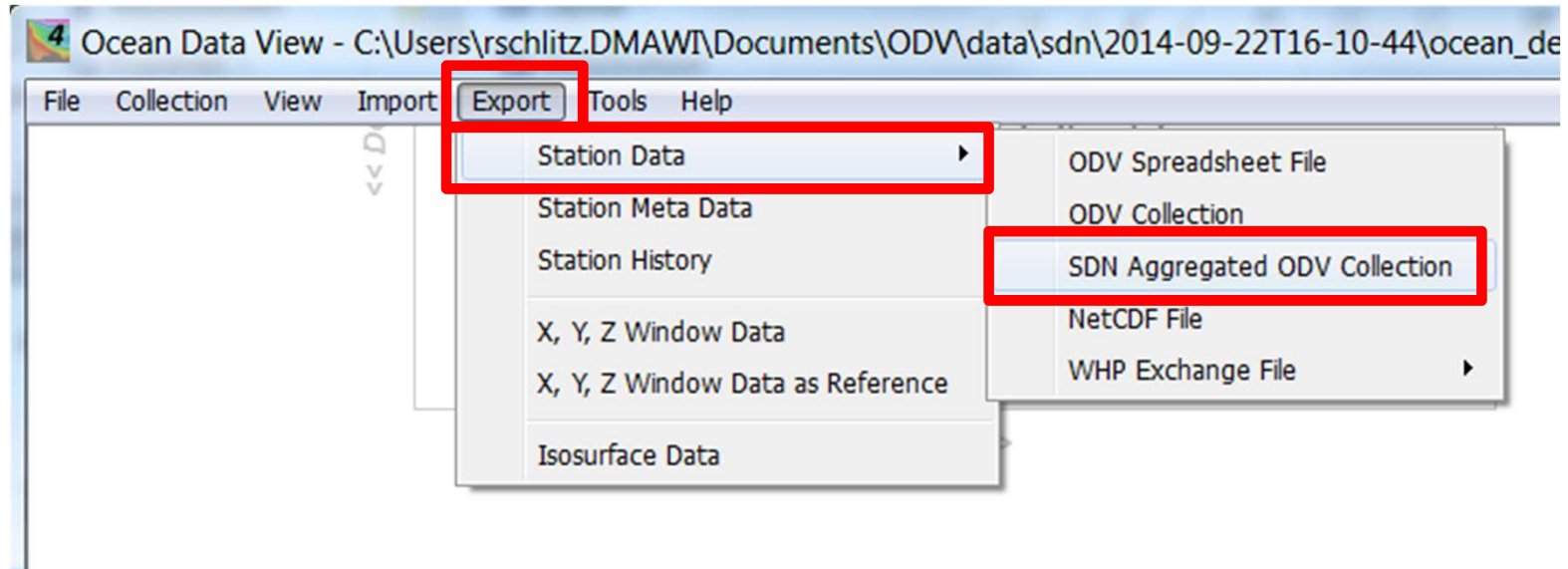
Sample	Depth [m]	Temperature [°C]	Salinity [psu]	Oxygen [ml/l]	Phosphate [μmol/l]	Silicate [μmol/l]	Nitrate [μmol/l]	Nitrite [μmol/l]	pH	Chlorophyll [μg/l]	Plankton/Biomass	Alkalinity [meq/l]	NO2+NO3 [μmol/l]	pCO2 [μatm]	tCO2 [mmol/l]	Tritium [TU]	Helium [nM]	δ3He [‰]
1	75	14.02	35.080															
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17																		
18																		

**Isosurface Values**

Longitude	Latitude	Time [yr]	Day of Year
-52.000	-65.030	1964.208	77

**History information stays with station data when exporting to ODV spreadsheet or ODV collection.**

# ***P35 Parameter Aggregation***

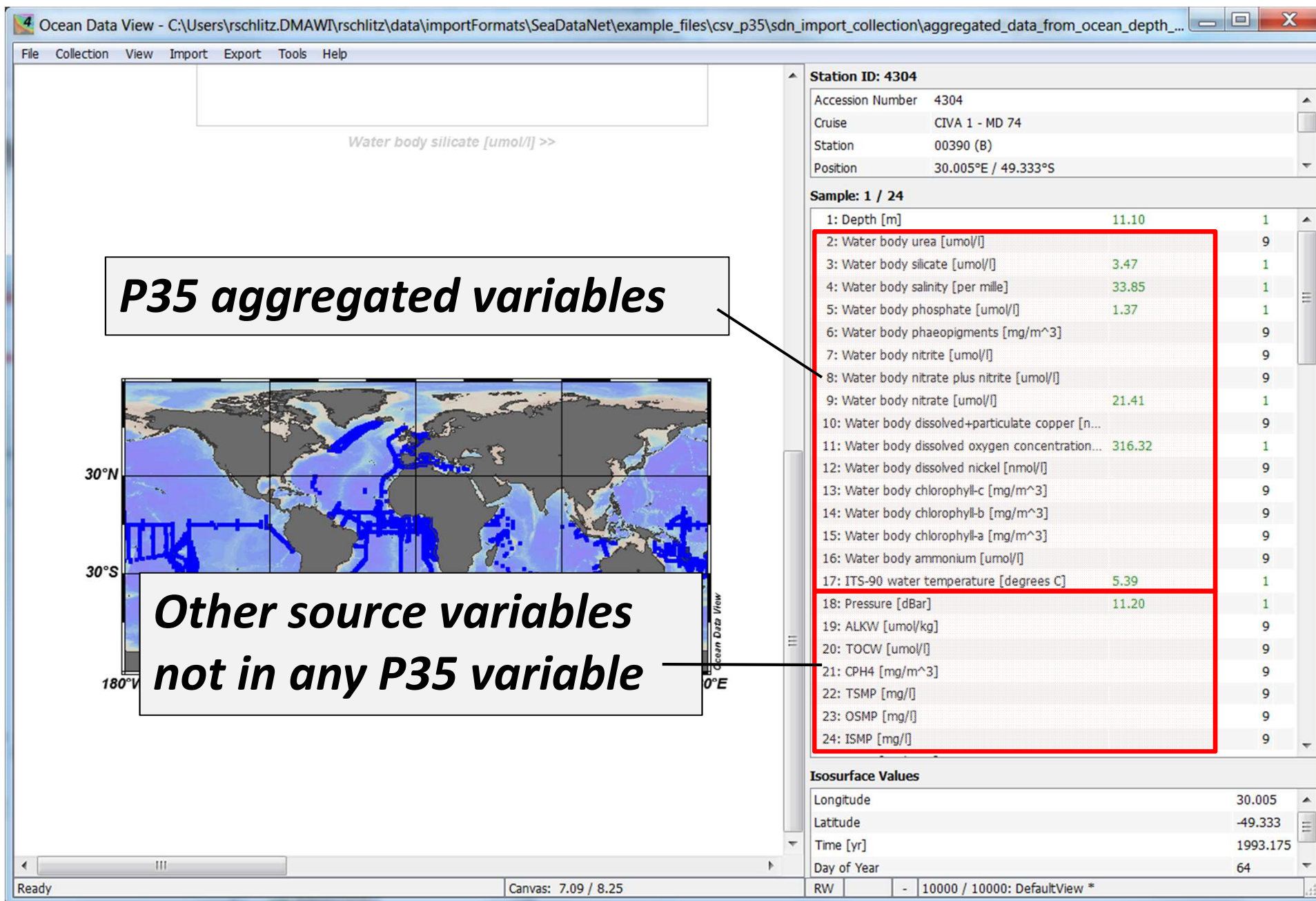


***Source ODV collection must have been produced via***

- ***option Import > SDN Formats***
- ***using ODV 4.6.3 or later***

**Up-to-date P35 vocabulary and unit conversion list automatically downloaded when aggregation is started .**





# ***P35 Aggregation Rules***

- P35 aggregated variables use SDN quality flags

If a given file only contains data for one contributing variable (e.g., DOXYZZ01):

- data value and quality flag are used as given (covers >95% of cases)

If a given file contains data for more than one contributing variable:

- median of contributing data values is used
- quality flag inheritance (poorest quality contributor rule)

# ***ODV API***

- released Sep 2013
- used by IFREMER OCEANOTRON to serve data in ODV collections over the Internet
- addition of **create/write/update** functionality underway