Layperson Ontology 2.1

SOP: Incorporating Layperson Annotations

Note:

This SOP is specifically for when the input ontology file does NOT have language tags for labels and descriptions of ontology terms. Use ***Layperson Ontology 2.2 SOP*** *if the ontology input file already contains language tags for labels and descriptions of ontology terms.*

PURPOSE

To describe the procedure for incorporating layperson annotations (labels and descriptions) of ontology terms into the ontology file, using the *creating_layperson_ontology_files_NO_existing_lang_tags.py* python program.

SCOPE

This procedure is used by curators when producing ontology files that include layperson annotations.

GLOSSARY/DEFINITIONS

Python The programming language in which the program used in this SOP was written.

SOP Standard Operating Procedure: Detailed written instructions to achieve uniformity of the performance of a specific function.

SYSTEM REQUIREMENTS TO RUN PROGRAM

Instructions below are for Windows 10.

For the python program to run successfully, the following need to be installed:

1. Python.
   Ensure that Python is setup correctly on your PC (Use ***Program Running 1 SOP***)

REQUIRED INPUT FOR PROGRAM

1. Input files:
   a. A .txt file containing the layperson annotations (for labels and descriptions of terms) of the ontology.
   b. The owl file of the version of the ontology to which layperson annotations must be added. (Note: for this SOP, this file will NOT contain language tags for labels and descriptions of ontology terms)
2. These additional variables are required in the python program code before it is run:

a. **layperson_annotations_file_cell1** The content of the first cell in the input file containing layperson annotations.
b. **lang_tag** Specifies the language tag to be added to labels and descriptions.
c. **iri_path** The specific IRI generic path that is used for terms in the ontology being translated.
d. **layperson_tag** The tag to be added to layperson annotations.
e. **outputfile1_name** name of rdf file created with all ontology terms and layperson annotations included where necessary.
f. **outputfile2_name** name of rdf file created with only terms with layperson annotations

PREPARING INPUT FOR PROGRAM

1. Preparing input files and/or specifying them with relevant variables in the *creating_layperson_ontology_files_NO_existing_lang_tags.py* program code:
   a. To prepare the .txt file with the layperson annotations of the ontology:
      a) Open the shared Google spreadsheet containing layperson annotations (product of ***Layperson Ontology 1 SOP***).
      b) Download the file as a Microsoft Excel file (.xlsx).
      c) Open the downloaded file and save it as a .txt (tab delimited) file.
      d) Move the .txt file to the same location as the python program.
      e) Ensure that the **layperson_annotations_file** variable in the python program code (row 135) points to the name (including file extension) of this text file.

   b. Ensure that the **owl_file_path** variable in the python program code (row 136) points to the name (including file extension) of the file of the version of the ontology to which layperson annotations must be added.

2. Specifying additional required variables in the *creating_layperson_ontology_files_NO_existing_lang_tags.py* program code:
   a. For the **layperson_annotations_file_cell1** variable in row 139, supply the content of the first cell in the input file containing layperson annotations.
   b. For the **lang_tag** variable in row 140, supply the language tag to be added to labels and descriptions of all ontology terms (e.g. "en" for English)
   c. For the **iri_path** variable in row 141, supply the specific IRI generic path that is used for terms in the ontology being translated.
   d. For the **layperson_tag** variable in row 142, supply the tag to be added to layperson annotations (e.g. "layperson").

e. For the **outputfile1_name** variable in row 143, supply the name of the rdf file that will be generated by the program and will contain all ontology terms, with layperson annotations included where necessary.
f. For the **outputfile2_name** variable in row 144, supply the name of the rdf file that will be generated by the program and will contain only terms with layperson annotations.

RUNNING THE PROGRAM

Run the *creating_layperson_ontology_files_NO_existing_lang_tags.py* python program by following the procedure in the ***Program Running 2 SOP***.

PROGRAM OUTPUT

Two files are generated:

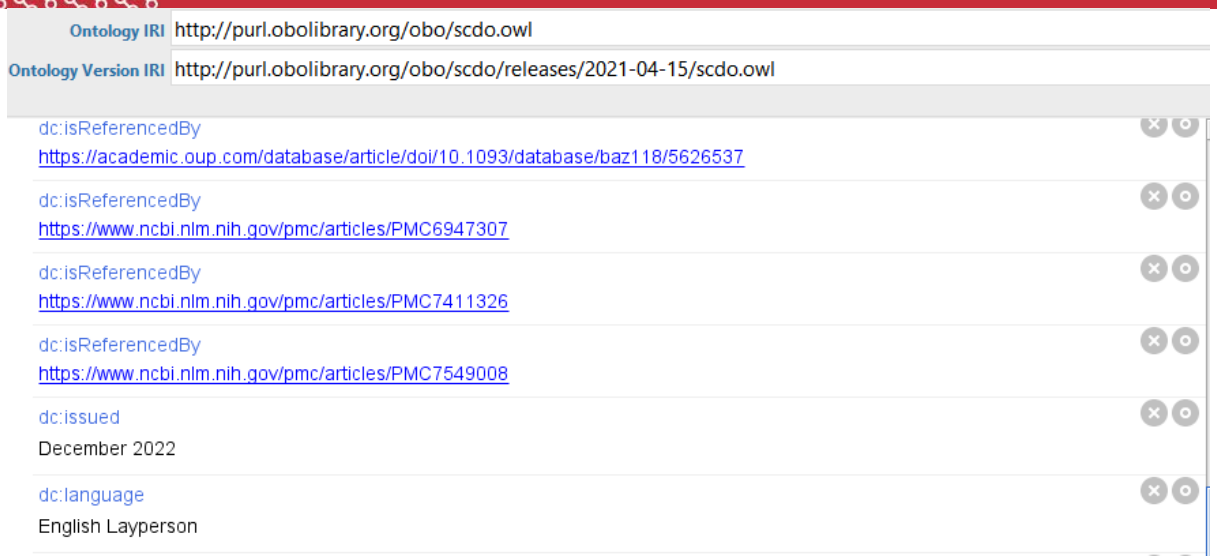
1. An rdfxml file containing all terms in the ontology, including layperson annotations where necessary.
2. An rdfxml file containing only terms in the ontology that have layperson annotations.

USING THE OUTPUT FILES

The output files will appear in the same location as the python program file and can now be used as necessary, e.g. used to create a new project in Web Protégé or uploaded to a relevant repository.

Open the rdf file in Protégé and edit the ontology annotations:

- If the first layperson version, update the "dc:issued" annotation and add another dc:language annotation (see image below).
- If not first version, update the "dc:issued" annotation.



Version No.	Date	Authorizer	External Reviewer	Internal Reviewer	Author	Details of changes
2.0	**11 Dec 2022**				Jade Hotchkiss	Added info about updating ontology annotations in Protege
1.0					Jade Hotchkiss	n/a (first version)