Circular Economy Ontology Network (CEON) - Process ODP

Metadata

IRI

http://w3id.org/CEON/ontology/processODP/

Title

Circular Economy Ontology Network (CEON) - Process ODP

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License

https://github.com/LiUSemWeb/CEON/blob/master/LICENSE

Version Iri

http://w3id.org/CEON/ontology/processODP/0.1/

Version Info

0.1

Preferred Namespace Prefix

processODP

Preferred Namespace Uri

http://w3id.org/CEON/ontology/processODP/

Description

A core ODP of the CEON ontology network, defining aspects of the process concept.

Covers Requirements

Covers the following requirements from Onto-DESIDE D3.1: CVN-Process-3,4,5, CVN-Input/Output-1,3,4, C3-1, C4-2, C4-5, C4-7, C4-9, C13-2, E2-6

Classes

Process Participation ^c

IRI	http://w3id.org/CEON/ontology/actor/ProcessParticipation
Restriction	actorODP:participationIn ^{op} some actor:ProcessParticipation ^c

Process ^C

IRI   http://w3id.org/CEON/ontology/processODP/Process

Description   An activity in the context of a circular value network, handling resources.

In Domain Of
has part ^{op}
hasProcessExecution ^{op}
hasProcessType ^{op}
next process ^{op}

In Range Of
has part ^{op}
next process ^{op}

Super Class Of   Transformation ^c

ProcessExecution ^C

IRI   http://w3id.org/CEON/ontology/processODP/ProcessExecution

Description   An execution of a specific process.

In Range Of   hasProcessExecution ^{op}

ProcessType ^C

IRI   http://w3id.org/CEON/ontology/processODP/ProcessType

Description   The type of a process.

In Range Of   hasProcessType ^{op}

Situation ^C

IRI   http://w3id.org/CEON/ontology/processODP/Situation

Description   A situation that may involve some resources and actors, i.e. a state of affairs at a certain point in time.

In Domain Of   is the setting for ^{op}

In Range Of
initial situation ^{op}
resulting situation ^{op}

Transformation ^c

IRI	http://w3id.org/CEON/ontology/processODP/Transformation
Description	A process that transforms some situation into another situation, i.e. changes the state of affairs of some actor, resource etc.
Sub Class Of	Process ^c
In Domain Of	has input ^{op} has output ^{op} initial situation ^{op} occurs in location ^{op} resulting situation ^{op}

Resource ^c

IRI	http://w3id.org/CEON/ontology/resourceODP/Resource

Object Properties

participation in ^{op}

IRI	http://w3id.org/CEON/ontology/actorODP/participationIn

has input ^{op}

IRI	http://w3id.org/CEON/ontology/processODP/hasInput
Description	The situation before the transformation takes place, i.e. the state of affairs before the process takes places, such as the set of components before they are assembled into a product.
Domain	Transformation ^c

has output ^{op}

IRI	http://w3id.org/CEON/ontology/processODP/hasOutput
Description	The output situation of a transformation, i.e. the state of affairs after the transformation took place.
Domain	Transformation ^c

has part ^{op}

IRI	http://w3id.org/CEON/ontology/processODP/hasPart
Description	A process can consists of several part, which are sub-processes.
Domain	Process^c
Range	Process^c

hasProcessExecution ^{op}

IRI	http://w3id.org/CEON/ontology/processODP/hasProcessExecution
Description	A process can have specific executions.
Domain	Process^c
Range	ProcessExecution^c

hasProcessType ^{op}

IRI	http://w3id.org/CEON/ontology/processODP/hasProcessType
Description	The type of the process.
Domain	Process^c
Range	ProcessType^c

initial situation ^{op}

IRI	http://w3id.org/CEON/ontology/processODP/intialSituation
Description	The situation before executing a process.
Domain	Transformation^c
Range	Situation^c

is the setting for ^{op}

IRI	http://w3id.org/CEON/ontology/processODP/isSettingFor
Description	The thing(s) that this situation is the setting for, e.g. a resource that is in a certain state.
Domain	Situation ^c

next process ^{op}

IRI	http://w3id.org/CEON/ontology/processODP/nextProcess
Description	A relation between one process and the next one following it in some sequence of processes, e.g. a sequence of transformations in a material flow.
Domain	Process ^c
Range	Process ^c

occurs in location ^{op}

IRI	http://w3id.org/CEON/ontology/processODP/occursInLocation
Description	The location in which a transformation takes place, e.g. the factory location where something is manufactured.
Domain	Transformation ^c

resulting situation ^{op}

IRI	http://w3id.org/CEON/ontology/processODP/resultingSituation
Description	The situation after the execution of a process.
Domain	Transformation ^c
Range	Situation ^c

Annotation Properties

contributor ap

IRI   http://purl.org/dc/terms/contributor

created ap

IRI   http://purl.org/dc/terms/created

creator ap

IRI   http://purl.org/dc/terms/creator

description ap

IRI   http://purl.org/dc/terms/description

license ap

IRI   http://purl.org/dc/terms/license

title ap

IRI   http://purl.org/dc/terms/title

preferred namespace prefix ap

IRI   http://purl.org/vocab/vann/preferredNamespacePrefix

preferred namespace uri ap

IRI   http://purl.org/vocab/vann/preferredNamespaceUri

covers requirements ap

IRI   http://www.ontologydesignpatterns.org/schemas/cpannotationschema.owl#coversRequirements

Namespaces

:

http://w3id.org/CEON/ontology/processODP/

actor

http://w3id.org/CEON/ontology/actor/

actorODP

http://w3id.org/CEON/ontology/actorODP/

dcterms

http://purl.org/dc/terms/

odp

http://www.ontologydesignpatterns.org/schemas/cpannotationschema.owl#

owl

http://www.w3.org/2002/07/owl#

prov

http://www.w3.org/ns/prov#

rdf

http://www.w3.org/1999/02/22-rdf-syntax-ns#

rdfs

http://www.w3.org/2000/01/rdf-schema#

resourceODP

http://w3id.org/CEON/ontology/resourceODP/

vann

http://purl.org/vocab/vann/

Legend

c	Classes
op	Object Properties
ap	Annotation Properties