Circular Economy Ontology Network (CEON) - Actor Module

Metadata

IRI

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

Title

Circular Economy Ontology Network (CEON) - Actor Module

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Version Iri

http://w3id.org/CEON/ontology/actor/0.3/

Version Info

0.3

Preferred Namespace Prefix

actor

Preferred Namespace Uri

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

Description

The Actor module of CEON (Circular Economy Ontology Network).

Covers Requirements

In addition to requirements covered by imported ODPs, covers the following requirements from Onto-DESIDE D3.1: C0-1, C0-2, C3-4, T3-4

In addition to requirements covered by imported ODPs, covers the following requirements from Onto-DESIDE D3.2: C0-1, C0-2, C3-4, T3-4

Classes

Actor Cvn Role^C

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

Sub Class Of ActorCollaborationRole^C

Named Individuals

collectorⁿⁱ
dismantlerⁿⁱ
manufacturerⁿⁱ
recyclerⁿⁱ
resellerⁿⁱ
sellerⁿⁱ
supplierⁿⁱ
userⁿⁱ

Actor Collaboration Role C

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

Sub Class Of actorODP:Role^C

Super Class Of ActorCVNRole^C

ActorProcessRole C

Actor Process Role C

Sub Class Of ActorCollaborationRole^C

Actor Resource Role C

Sub Class Of actorODP:Role^C

Named Individuals

buyerⁿⁱ
consumerⁿⁱ
issuerⁿⁱ
ownerⁿⁱ
producerⁿⁱ
providerⁿⁱ
resellerⁿⁱ
supplierⁿⁱ

<u>updaterⁿⁱ</u> <u>userⁿⁱ</u> <u>viewerⁿⁱ</u>

Buying Resource^C

Sub Class Of actorODP:ResourceRelation^C

<u>Equivalentclass</u> <u>actorODP:ResourceRelation^C and actorODP:participantRole^{op} value buyer^C</u>

Cvn Participation ^c

Sub Class Of

actorODP:CollaborationParticipation^C

actorODP:participatingActor op some actorODP:Actor and

actorODP:CollaborationParticipation^c and actorODP:participantRole^{op} some

ActorCVNRole^c and actorODP:participationIn^{op} some

http://w3id.org/CEON/ontology/cvn/CVNC

Consuming Resource c

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

Sub Class Of actorODP:ResourceRelation^c

Equivalent class actorODP:ResourceRelation^c and actorODP:participantRole^{op} value consumer

Issuing Resource C

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

Sub Class Of actorODP:ResourceRelation^C

Equivalentclass actorODP:participantRole op value issuer and actorODP:ResourceRelation actorODP:ResourceRelation

Manufacturing Resource^C

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

Sub Class Of actorODP:ResourceRelation^C

Equivalent class actorODP:ResourceRelation^C and actorODP:participantRole^{op} value

manufacturer^c

Organisation ^c

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

Is Defined By ISO 59004:2024 - 3.4.1 organization

Description Person or group of people that has its own functions with responsibilities.

authorities, and relationships to achieve its objectives. The concept of organization includes, but is not limited to sole-trader, company, corporation, firm, enterprise, authority, partnership, charity or institution, or part or combination thereof, whether incorporated or not, public or private (e.g. foundation, union, association, agency, municipality, region, country, intergovernmental agencies). A group of organizations can also be considered

as an organization that has, alone or collectively, their own objectives.

Sub Class Of actorODP:Actor^C

> hasOrganisationLocation op some OrganisationLocation and hasOrganisationLocation op only OrganisationLocation c

In Domain Of hasOrganisationLocation op

hasOrganisationName dp

Restriction hasOrganisationName dp some Organisation c Organisation Location ^c

Sub Class Of http://w3id.org/CEON/ontology/location/Location

In Range Of hasOrganisationLocation op

Restriction

http://w3id.org/CEON/ontology/location/hasCity_max 1 OrganisationLocation http://w3id.org/CEON/ontology/location/hasCountry_max 1 OrganisationLocation

ttp://wsid.org/ceory/ortology/location/riascounitry/max 1 <u>organisat</u>

C

http://w3id.org/CEON/ontology/location/hasPostalCode_max 1

OrganisationLocation^C

http://w3id.org/CEON/ontology/location/hasStreetAddress_max_1

OrganisationLocation^c

Owning Resource ^C

Sub Class Of actorODP:ResourceRelation^C

Equivalentclass actorODP:participantRole op value owner and actorODP:ResourceRelation actorODP:R

Person^c

Sub Class Of actorODP:Actor^C

Process Participation ^C

Sub Class Of

actorODP:CollaborationParticipationC

actorODP:CollaborationParticipation and actorODP:participationIn op some

http://w3id.org/CEON/ontology/processODP/Process^C and actorODP:participatingActor^{op} some actorODP:Actor^c and actorODP:participantRole^{op} some ActorProcessRole^c

Producing Resource^C

Sub Class Of actorODP:ResourceRelation^C

<u>Equivalentclass</u> <u>actorODP:participantRole</u> op value <u>producer</u> and <u>actorODP:ResourceRelation</u> of value <u>producer</u> and actorODP:ResourceRelation of value and actorODP:ResourceRelation of value and actor

Providing Resource^C

Sub Class Of actorODP:ResourceRelation^C

Equivalentclass actorODP:ResourceRelation and actorODP:participantRole op value provider and actorODP:participantRole op value provider and actorODP:

Repairing Resource^C

Sub Class Of actorODP:ResourceRelation^C

Reselling Resource^C

Sub Class Of actorODP:ResourceRelation^C

Equivalentclass actorODP:ResourceRelation and actorODP:participantRole populate reseller actorODP: and actorODP:participantRole populate reseller actorODP: and actorODP: participantRole populate reseller populate research r

Selling Resource C

Sub Class Of actorODP:ResourceRelation^C

Equivalentclass actorODP:ResourceRelation and actorODP:participantRole op value seller actorODP:

Stakeholder ^c

Description

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

Is Defined By ISO 59004:2024 - 3.4.2 interested party, stakeholder

Person or organization that can affect, be affected by, or perceive itself to be affected by a decision or activity. To "perceive itself to be affected" means the

perception has been made known to the organization.

Sub Class Of Organisation or Person

Supplying Resource^C

Sub Class Of actorODP:ResourceRelation^C

Equivalentclass actorODP:participantRole op value supplier and actorODP:ResourceRelation actorOD

Updating Resource ^C

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

Sub Class Of actorODP:ResourceRelation^C

<u>Equivalentclass</u> <u>actorODP:participantRole^{op} value <u>updater^c</u> and <u>actorODP:ResourceRelation^c</u></u>

Using Resource ^C

Sub Class Of actorODP:ResourceRelation C

Equivalentclass actorODP:ResourceRelation and actorODP:participantRole op value user

Viewing Resource c

Sub Class Of actorODP:ResourceRelation^C

Equivalentclass actorODP:ResourceRelation and actorODP:participantRole op value viewer viewer

Actor ^C

Super Class Of

Organisation^c Person^c

Capability ^C

In Domain Of

<u>capabilityExtent</u>^{op}

neededResourceRelation op

Collaboration Participation ^C

ipation

Super Class Of

CVNParticipation^C
ProcessParticipation^C

Participation ^c

 Resource Relation ^c IRI http://w3id.org/CEON/ontology/actorODP/ResourceRelation **Sub Class Of** actorODP:participantRole op some ActorResourceRole and actorODP:participatingActor^{op} some actorODP:Actor^c and actorODP:Participation^C and actorODP:participatingResource^{op} some http://w3id.org/CEON/ontology/resourceODP/Resource^C **Super Class Of** <u>BuyingResource</u>^C ConsumingResource^C <u>IssuingResource</u>^c ManufacturingResource^C OwningResource C ProducingResource^C ProvidingResource C RepairingResource^C ResellingResource^C SellingResource^C <u>SupplyingResource</u>^C <u>UpdatingResource</u>^C <u>UsingResource</u>^C <u>ViewingResource</u>^C Role C IRI http://w3id.org/CEON/ontology/actorODP/Role **Super Class Of** ActorCollaborationRole C ActorResourceRole^C Cvn^c IRI http://w3id.org/CEON/ontology/cvn/CVN **Sub Class Of** http://w3id.org/CEON/ontology/cvn/Collaboration^C Collaboration ^C http://w3id.org/CEON/ontology/cvn/Collaboration IRI **Super Class Of** http://w3id.org/CEON/ontology/cvn/CVN^C Process ^c IRI http://w3id.org/CEON/ontology/processODP/Process Resource ^C IRI http://w3id.org/CEON/ontology/resourceODP/Resource

Object Properties

capability extent op

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

Sub Property Of actorODP:capabilityProperty op

Domain actorODP:Capability^C

has organisation location op

n

Sub Property Of http://w3id.org/CEON/ontology/location/hasLocation

Domain Organisation^C

Range OrganisationLocation^C

needed resource relation op

Sub Property Of actorODP:capabilityProperty op

Domain actorODP:Capability^c

capability property op

Super Property Of

• capabilityExtentop

neededResourceRelation^{op}

participant role op

participating actor op

participating resource op

ce

participation in ^{op})
IRI	http://w3id.org/CEON/ontology/actorODP/participationIn

Datatype Properties

has organisation name dp

IRI http://w3id.org/CEON/ontology/actor/has0rganisationName

Domain Organisation C

Range xsd:string

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/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#
vann
    http://purl.org/vocab/vann/
xsd
    http://www.w3.org/2001/XMLSchema#
```

Legend

С	Classes
ор	Object Properties
dp	Datatype Properties
ap	Annotation Properties