

Circular Economy Ontology Network (CEON) - Actor Module

Metadata

IRI

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

Title

Circular Economy Ontology Network (CEON) - Actor Module

Publisher

Onto-DESIDE

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Version Iri

<http://w3id.org/CEON/ontology/actor/0.4/>

Version Info

0.4

Prior Version

0.3

Preferred Namespace Prefix

ceon-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/CE0N/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/CE0N/ontology/actor/ActorCollaborationRole>

Sub Class Of [actorODP:Role^C](#)

Super Class Of

- [ActorCVNRole^C](#)
- [ActorProcessRole^C](#)

Actor Process Role^C

IRI <http://w3id.org/CE0N/ontology/actor/ActorProcessRole>

Sub Class Of [ActorCollaborationRole^C](#)

Actor Resource Role^C

IRI <http://w3id.org/CE0N/ontology/actor/ActorResourceRole>

Sub Class Of [actorODP:Role^C](#)

Named Individuals

- [buyerⁿⁱ](#)
- [consumerⁿⁱ](#)
- [issuerⁿⁱ](#)
- [ownerⁿⁱ](#)
- [producerⁿⁱ](#)
- [providerⁿⁱ](#)
- [repairerⁿⁱ](#)
- [resellerⁿⁱ](#)
- [sellerⁿⁱ](#)
- [supplierⁿⁱ](#)
- [updaterⁿⁱ](#)
- [userⁿⁱ](#)
- [viewerⁿⁱ](#)

Buying Resource^C

IRI	http://w3id.org/CEON/ontology/actor/BuyingResource
Sub Class Of	actorODP:ResourceRelation^C
Equivalentclass	actorODP:participantRole^{OP} value buyer^C and actorODP:ResourceRelation^C

Cvn Participation^C

IRI	http://w3id.org/CEON/ontology/actor/CVNParticipation
Sub Class Of	actorODP:CollaborationParticipation^C actorODP:participantRole^{OP} some ActorCVNRole^C and actorODP:CollaborationParticipation^C and actorODP:participatingActor^{OP} some actorODP:Actor^C and actorODP:participationIn^{OP} some http://w3id.org/CEON/ontology/cvn/CVN^C

Consuming Resource^C

IRI	http://w3id.org/CEON/ontology/actor/ConsumingResource
Sub Class Of	actorODP:ResourceRelation^C
Equivalentclass	actorODP:participantRole^{OP} value consumer^C and actorODP:ResourceRelation^C

Dismantling Resource^C

IRI	http://w3id.org/CEON/ontology/actor/DismantlingResource
Sub Class Of	actorODP:ResourceRelation^C
Equivalentclass	actorODP:participantRole^{OP} value dismantler^C and actorODP:ResourceRelation^C

Issuing Resource^C

IRI	http://w3id.org/CEON/ontology/actor/IssuingResource
Sub Class Of	actorODP:ResourceRelation^C
Equivalentclass	actorODP:ResourceRelation^C and actorODP:participantRole^{OP} value issuer^C

Manufacturing Resource^C

IRI	http://w3id.org/CEON/ontology/actor/ManufacturingResource
Sub Class Of	actorODP:ResourceRelation^C
Equivalentclass	actorODP:participantRole^{OP} value manufacturer^C and actorODP:ResourceRelation^C

Organisation^C

IRI	http://w3id.org/CEON/ontology/actor/Organisation
<u>Is Defined By</u>	ISO 59004:2024 - 3.4.1 organization
<u>Description</u>	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.
<u>Sub Class Of</u>	actorODP:Actor ^C hasOrganisationLocation ^{op} some OrganisationLocation ^C <i>and</i> hasOrganisationLocation ^{op} only OrganisationLocation ^C
<u>In Domain Of</u>	hasOrganisationLocation ^{op} hasOrganisationName ^{dp}
<u>Restriction</u>	hasOrganisationName ^{dp} some Organisation ^C

Organisation Location^C

IRI	http://w3id.org/CEON/ontology/actor/OrganisationLocation
<u>Sub Class Of</u>	http://w3id.org/CEON/ontology/location/Location ^C
<u>In Range Of</u>	hasOrganisationLocation ^{op}

Owning Resource^C

IRI	http://w3id.org/CEON/ontology/actor/OwningResource
<u>Sub Class Of</u>	actorODP:ResourceRelation ^C
<u>Equivalentclass</u>	actorODP:ResourceRelation ^C <i>and</i> actorODP:participantRole ^{op} value owner ^C

Person^C

IRI	http://w3id.org/CEON/ontology/actor/Person
<u>Sub Class Of</u>	actorODP:Actor ^C

Process Participation^C

IRI <http://w3id.org/CEON/ontology/actor/ProcessParticipation>

Sub Class Of [actorODP:CollaborationParticipation^C](#)
[actorODP:participatingActor^{op}](#) some [actorODP:Actor^C](#) *and*
[actorODP:participantRole^{op}](#) some [ActorProcessRole^C](#) *and*
[actorODP:participationIn^{op}](#) some
[http://w3id.org/CEON/ontology/processODP/Process^C](http://w3id.org/CEON/ontology/processODP/Process) *and*
[actorODP:CollaborationParticipation^C](#)

Producing Resource^C

IRI <http://w3id.org/CEON/ontology/actor/ProducingResource>

Sub Class Of [actorODP:ResourceRelation^C](#)

Equivalentclass [actorODP:ResourceRelation^C](#) *and* [actorODP:participantRole^{op}](#) value [producer^C](#)

Providing Resource^C

IRI <http://w3id.org/CEON/ontology/actor/ProvidingResource>

Sub Class Of [actorODP:ResourceRelation^C](#)

Equivalentclass [actorODP:ResourceRelation^C](#) *and* [actorODP:participantRole^{op}](#) value [provider^C](#)

Recycling Resource^C

IRI <http://w3id.org/CEON/ontology/actor/RecyclingResource>

Sub Class Of [actorODP:ResourceRelation^C](#)

Equivalentclass [actorODP:ResourceRelation^C](#) *and* [actorODP:participantRole^{op}](#) value [recycler^C](#)

Repairing Resource^C

IRI <http://w3id.org/CEON/ontology/actor/RepairingResource>

Sub Class Of [actorODP:ResourceRelation^C](#)

Equivalentclass [actorODP:participantRole^{op}](#) value [repairer^C](#) *and* [actorODP:ResourceRelation^C](#)

Reselling Resource^C

IRI <http://w3id.org/CEON/ontology/actor/ResellingResource>

Sub Class Of [actorODP:ResourceRelation^C](#)

Equivalentclass [actorODP:participantRole^{op}](#) value [reseller^C](#) *and* [actorODP:ResourceRelation^C](#)

Selling Resource^C

IRI	http://w3id.org/CE0N/ontology/actor/SellingResource
Sub Class Of	actorODP:ResourceRelation^C
Equivalentclass	actorODP:ResourceRelation^C and actorODP:participantRole^{OP} value seller^C

Stakeholder^C

IRI	http://w3id.org/CE0N/ontology/actor/Stakeholder
Is Defined By	ISO 59004:2024 - 3.4.2 interested party, stakeholder
Description	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	Person^C or Organisation^C

Supplying Resource^C

IRI	http://w3id.org/CE0N/ontology/actor/SupplyingResource
Sub Class Of	actorODP:ResourceRelation^C
Equivalentclass	actorODP:participantRole^{OP} value supplier^C and actorODP:ResourceRelation^C

Taking Back Resource^C

IRI	http://w3id.org/CE0N/ontology/actor/TakingBackResource
Sub Class Of	actorODP:ResourceRelation^C
Equivalentclass	actorODP:ResourceRelation^C and actorODP:participantRole^{OP} value collector^C

Updating Resource^C

IRI	http://w3id.org/CE0N/ontology/actor/UpdatingResource
Sub Class Of	actorODP:ResourceRelation^C
Equivalentclass	actorODP:participantRole^{OP} value updater^C and actorODP:ResourceRelation^C

Using Resource^C

IRI	http://w3id.org/CE0N/ontology/actor/UsingResource
Sub Class Of	actorODP:ResourceRelation^C
Equivalentclass	actorODP:ResourceRelation^C and actorODP:participantRole^{OP} value user^C

Viewing Resource^C

IRI	http://w3id.org/CE0N/ontology/actor/ViewingResource
Sub Class Of	actorODP:ResourceRelation^C
Equivalentclass	actorODP:ResourceRelation^C and actorODP:participantRole^{op} value viewer^C

Actor^C

IRI	http://w3id.org/CE0N/ontology/actorODP/Actor
Super Class Of	Organisation^C Person^C

Capability^C

IRI	http://w3id.org/CE0N/ontology/actorODP/Capability
In Domain Of	capabilityExtent^{op} neededResourceRelation^{op}

Collaboration Participation^C

IRI	http://w3id.org/CE0N/ontology/actorODP/CollaborationParticipation
Super Class Of	CVNParticipation^C ProcessParticipation^C

Participation^C

IRI	http://w3id.org/CE0N/ontology/actorODP/Participation
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Resource Relation^c

IRI	http://w3id.org/CEON/ontology/actorODP/ResourceRelation
Sub Class Of	actorODP:Participation^c and actorODP:participatingActor^{op} some actorODP:Actor^c and actorODP:participantRole^{op} some ActorResourceRole^c and actorODP:participatingResource^{op} some http://w3id.org/CEON/ontology/resourceODP/Resource^c
Super Class Of	BuyingResource^c ConsumingResource^c DismantlingResource^c IssuingResource^c ManufacturingResource^c OwningResource^c ProducingResource^c ProvidingResource^c RecyclingResource^c RepairingResource^c ResellingResource^c SellingResource^c SupplyingResource^c TakingBackResource^c UpdatingResource^c UsingResource^c ViewingResource^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
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Location^c

IRI	http://w3id.org/CEON/ontology/location/Location
Super Class Of	OrganisationLocation^c

Process^c

IRI	http://w3id.org/CEON/ontology/processODP/Process
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Resource^c

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

capability extent^{op}

IRI <http://w3id.org/CE0N/ontology/actor/capabilityExtent>

Sub Property Of [actorODP:capabilityProperty^{op}](#)

Domain [actorODP:Capability^c](#)

has organisation location^{op}

IRI <http://w3id.org/CE0N/ontology/actor/hasOrganisationLocation>

Sub Property Of [http://w3id.org/CE0N/ontology/location/hasLocation^{op}](http://w3id.org/CE0N/ontology/location/hasLocation)

Domain [Organisation^c](#)

Range [OrganisationLocation^c](#)

needed resource relation^{op}

IRI <http://w3id.org/CE0N/ontology/actor/neededResourceRelation>

Sub Property Of [actorODP:capabilityProperty^{op}](#)

Domain [actorODP:Capability^c](#)

capability property^{op}

IRI <http://w3id.org/CE0N/ontology/actor0DP/capabilityProperty>

Super Property Of

- [capabilityExtent^{op}](#)
- [neededResourceRelation^{op}](#)

participant role^{op}

IRI <http://w3id.org/CE0N/ontology/actor0DP/participantRole>

participating actor^{op}

IRI <http://w3id.org/CE0N/ontology/actor0DP/participatingActor>

participating resource^{op}

IRI <http://w3id.org/CE0N/ontology/actor0DP/participatingResource>

participation in^{op}

IRI <http://w3id.org/CE0N/ontology/actor0DP/participationIn>

has location^{op}

IRI <http://w3id.org/CE0N/ontology/location/hasLocation>

Super Property Of [hasOrganisationLocation^{op}](#)

Datatype Properties

has organisation name^{dp}

IRI <http://w3id.org/CE0N/ontology/actor/hasOrganisationName>

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>

issued^{ap}

IRI <http://purl.org/dc/terms/issued>

license^{ap}

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

publisher ^{ap}	
IRI	http://purl.org/dc/terms/publisher
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/cannotation-schema.owl#coversRequirements

Namespaces

```

:
    http://w3id.org/CE0N/ontology/actor/
actorODP
    http://w3id.org/CE0N/ontology/actorODP/
dcterms
    http://purl.org/dc/terms/
odp
    http://www.ontologydesignpatterns.org/schemas/cannotationschema.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#

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Legend

c	Classes
op	Object Properties
dp	Datatype Properties
ap	Annotation Properties