

# 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

**Creator**

Huanyu Li

**Contributor**

Eva Blomqvist  
Mikael Lindecrantz  
Robin Keskisärkkä

**Date Created**

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**License**

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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<sup>C</sup>

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

**Sub Class Of** [ActorCollaborationRole<sup>C</sup>](#)

**Named Individuals**

- [collector<sup>ni</sup>](#)
- [dismantler<sup>ni</sup>](#)
- [manufacturer<sup>ni</sup>](#)
- [recycler<sup>ni</sup>](#)
- [reseller<sup>ni</sup>](#)
- [seller<sup>ni</sup>](#)
- [supplier<sup>ni</sup>](#)
- [user<sup>ni</sup>](#)

## Actor Collaboration Role<sup>C</sup>

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

**Sub Class Of** [actorODP:Role<sup>C</sup>](#)

**Super Class Of**

- [ActorCVNRole<sup>C</sup>](#)
- [ActorProcessRole<sup>C</sup>](#)

## Actor Process Role<sup>C</sup>

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

**Sub Class Of** [ActorCollaborationRole<sup>C</sup>](#)

## Actor Resource Role<sup>C</sup>

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

**Sub Class Of** [actorODP:Role<sup>C</sup>](#)

**Named Individuals**

- [buyer<sup>ni</sup>](#)
- [consumer<sup>ni</sup>](#)
- [issuer<sup>ni</sup>](#)
- [owner<sup>ni</sup>](#)
- [producer<sup>ni</sup>](#)
- [provider<sup>ni</sup>](#)
- [repairer<sup>ni</sup>](#)
- [reseller<sup>ni</sup>](#)
- [seller<sup>ni</sup>](#)
- [supplier<sup>ni</sup>](#)
- [updater<sup>ni</sup>](#)
- [user<sup>ni</sup>](#)
- [viewer<sup>ni</sup>](#)

## Buying Resource<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actor/BuyingResource">http://w3id.org/CE0N/ontology/actor/BuyingResource</a>
<b>Sub Class Of</b>	<a href="#">actorODP:ResourceRelation<sup>C</sup></a>
<b>Equivalentclass</b>	<a href="#">actorODP:participantRole<sup>OP</sup></a> value <a href="#">buyer<sup>C</sup></a> and <a href="#">actorODP:ResourceRelation<sup>C</sup></a>

## Cvn Participation<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actor/CVNParticipation">http://w3id.org/CE0N/ontology/actor/CVNParticipation</a>
<b>Sub Class Of</b>	<a href="#">actorODP:CollaborationParticipation<sup>C</sup></a> <a href="#">actorODP:participantRole<sup>OP</sup></a> some <a href="#">ActorCVNRole<sup>C</sup></a> and <a href="#">actorODP:participationIn<sup>OP</sup></a> some <a href="#">http://w3id.org/CE0N/ontology/cvn/CVN<sup>C</sup></a> and <a href="#">actorODP:participatingActor<sup>OP</sup></a> some <a href="#">actorODP:Actor<sup>C</sup></a> and <a href="#">actorODP:CollaborationParticipation<sup>C</sup></a>

## Consuming Resource<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actor/ConsumingResource">http://w3id.org/CE0N/ontology/actor/ConsumingResource</a>
<b>Sub Class Of</b>	<a href="#">actorODP:ResourceRelation<sup>C</sup></a>
<b>Equivalentclass</b>	<a href="#">actorODP:participantRole<sup>OP</sup></a> value <a href="#">consumer<sup>C</sup></a> and <a href="#">actorODP:ResourceRelation<sup>C</sup></a>

## Dismantling Resource<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actor/DismantlingResource">http://w3id.org/CE0N/ontology/actor/DismantlingResource</a>
<b>Sub Class Of</b>	<a href="#">actorODP:ResourceRelation<sup>C</sup></a>
<b>Equivalentclass</b>	<a href="#">actorODP:participantRole<sup>OP</sup></a> value <a href="#">dismantler<sup>C</sup></a> and <a href="#">actorODP:ResourceRelation<sup>C</sup></a>

## Issuing Resource<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actor/IssuingResource">http://w3id.org/CE0N/ontology/actor/IssuingResource</a>
<b>Sub Class Of</b>	<a href="#">actorODP:ResourceRelation<sup>C</sup></a>
<b>Equivalentclass</b>	<a href="#">actorODP:participantRole<sup>OP</sup></a> value <a href="#">issuer<sup>C</sup></a> and <a href="#">actorODP:ResourceRelation<sup>C</sup></a>

## Manufacturing Resource<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actor/ManufacturingResource">http://w3id.org/CE0N/ontology/actor/ManufacturingResource</a>
<b>Sub Class Of</b>	<a href="#">actorODP:ResourceRelation<sup>C</sup></a>
<b>Equivalentclass</b>	<a href="#">actorODP:participantRole<sup>OP</sup></a> value <a href="#">manufacturer<sup>C</sup></a> and <a href="#">actorODP:ResourceRelation<sup>C</sup></a>

## Organisation<sup>C</sup>

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

## Organisation Location<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CEON/ontology/actor/OrganisationLocation">http://w3id.org/CEON/ontology/actor/OrganisationLocation</a>
<b><u>Sub Class Of</u></b>	<a href="http://w3id.org/CEON/ontology/location/Location">http://w3id.org/CEON/ontology/location/Location</a> <sup>C</sup>
<b><u>In Range Of</u></b>	<a href="#">hasOrganisationLocation</a> <sup>op</sup>

## Owning Resource<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CEON/ontology/actor/OwningResource">http://w3id.org/CEON/ontology/actor/OwningResource</a>
<b><u>Sub Class Of</u></b>	<a href="#">actorODP:ResourceRelation</a> <sup>C</sup>
<b><u>Equivalentclass</u></b>	<a href="#">actorODP:ResourceRelation</a> <sup>C</sup> <i>and</i> <a href="#">actorODP:participantRole</a> <sup>op</sup> value <a href="#">owner</a> <sup>C</sup>

## Person<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CEON/ontology/actor/Person">http://w3id.org/CEON/ontology/actor/Person</a>
<b><u>Sub Class Of</u></b>	<a href="#">actorODP:Actor</a> <sup>C</sup>

## Process Participation<sup>C</sup>

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

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

## Producing Resource<sup>C</sup>

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

**Sub Class Of** [actorODP:ResourceRelation<sup>C</sup>](#)

**Equivalentclass** [actorODP:ResourceRelation<sup>C</sup>](#) *and* [actorODP:participantRole<sup>op</sup>](#) value [producer<sup>C</sup>](#)

## Providing Resource<sup>C</sup>

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

**Sub Class Of** [actorODP:ResourceRelation<sup>C</sup>](#)

**Equivalentclass** [actorODP:ResourceRelation<sup>C</sup>](#) *and* [actorODP:participantRole<sup>op</sup>](#) value [provider<sup>C</sup>](#)

## Recycling Resource<sup>C</sup>

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

**Sub Class Of** [actorODP:ResourceRelation<sup>C</sup>](#)

**Equivalentclass** [actorODP:ResourceRelation<sup>C</sup>](#) *and* [actorODP:participantRole<sup>op</sup>](#) value [recycler<sup>C</sup>](#)

## Repairing Resource<sup>C</sup>

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

**Sub Class Of** [actorODP:ResourceRelation<sup>C</sup>](#)

**Equivalentclass** [actorODP:ResourceRelation<sup>C</sup>](#) *and* [actorODP:participantRole<sup>op</sup>](#) value [repairer<sup>C</sup>](#)

## Reselling Resource<sup>C</sup>

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

**Sub Class Of** [actorODP:ResourceRelation<sup>C</sup>](#)

**Equivalentclass** [actorODP:ResourceRelation<sup>C</sup>](#) *and* [actorODP:participantRole<sup>op</sup>](#) value [reseller<sup>C</sup>](#)

## Selling Resource<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actor/SellingResource">http://w3id.org/CE0N/ontology/actor/SellingResource</a>
<b>Sub Class Of</b>	<a href="#">actorODP:ResourceRelation<sup>C</sup></a>
<b>Equivalentclass</b>	<a href="#">actorODP:ResourceRelation<sup>C</sup></a> and <a href="#">actorODP:participantRole<sup>OP</sup></a> value <a href="#">seller<sup>C</sup></a>

## Stakeholder<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actor/Stakeholder">http://w3id.org/CE0N/ontology/actor/Stakeholder</a>
<b>Is Defined By</b>	ISO 59004:2024 - 3.4.2 interested party, stakeholder
<b>Description</b>	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.
<b>Sub Class Of</b>	<a href="#">Person<sup>C</sup></a> or <a href="#">Organisation<sup>C</sup></a>

## Supplying Resource<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actor/SupplyingResource">http://w3id.org/CE0N/ontology/actor/SupplyingResource</a>
<b>Sub Class Of</b>	<a href="#">actorODP:ResourceRelation<sup>C</sup></a>
<b>Equivalentclass</b>	<a href="#">actorODP:ResourceRelation<sup>C</sup></a> and <a href="#">actorODP:participantRole<sup>OP</sup></a> value <a href="#">supplier<sup>C</sup></a>

## Taking Back Resource<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actor/TakingBackResource">http://w3id.org/CE0N/ontology/actor/TakingBackResource</a>
<b>Sub Class Of</b>	<a href="#">actorODP:ResourceRelation<sup>C</sup></a>
<b>Equivalentclass</b>	<a href="#">actorODP:participantRole<sup>OP</sup></a> value <a href="#">collector<sup>C</sup></a> and <a href="#">actorODP:ResourceRelation<sup>C</sup></a>

## Updating Resource<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actor/UpdatingResource">http://w3id.org/CE0N/ontology/actor/UpdatingResource</a>
<b>Sub Class Of</b>	<a href="#">actorODP:ResourceRelation<sup>C</sup></a>
<b>Equivalentclass</b>	<a href="#">actorODP:participantRole<sup>OP</sup></a> value <a href="#">updater<sup>C</sup></a> and <a href="#">actorODP:ResourceRelation<sup>C</sup></a>

## Using Resource<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actor/UsingResource">http://w3id.org/CE0N/ontology/actor/UsingResource</a>
<b>Sub Class Of</b>	<a href="#">actorODP:ResourceRelation<sup>C</sup></a>
<b>Equivalentclass</b>	<a href="#">actorODP:participantRole<sup>OP</sup></a> value <a href="#">user<sup>C</sup></a> and <a href="#">actorODP:ResourceRelation<sup>C</sup></a>

## Viewing Resource<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actor/ViewingResource">http://w3id.org/CE0N/ontology/actor/ViewingResource</a>
<b>Sub Class Of</b>	<a href="#">actorODP:ResourceRelation<sup>C</sup></a>
<b>Equivalentclass</b>	<a href="#">actorODP:participantRole<sup>OP</sup></a> value <a href="#">viewer<sup>C</sup></a> and <a href="#">actorODP:ResourceRelation<sup>C</sup></a>

## Actor<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actorODP/Actor">http://w3id.org/CE0N/ontology/actorODP/Actor</a>
<b>Super Class Of</b>	<a href="#">Organisation<sup>C</sup></a> <a href="#">Person<sup>C</sup></a>

## Capability<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actorODP/Capability">http://w3id.org/CE0N/ontology/actorODP/Capability</a>
<b>In Domain Of</b>	<a href="#">capabilityExtent<sup>OP</sup></a> <a href="#">neededResourceRelation<sup>OP</sup></a>

## Collaboration Participation<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actorODP/CollaborationParticipation">http://w3id.org/CE0N/ontology/actorODP/CollaborationParticipation</a>
<b>Super Class Of</b>	<a href="#">CVNParticipation<sup>C</sup></a> <a href="#">ProcessParticipation<sup>C</sup></a>

## Participation<sup>C</sup>

<b>IRI</b>	<a href="http://w3id.org/CE0N/ontology/actorODP/Participation">http://w3id.org/CE0N/ontology/actorODP/Participation</a>
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## Resource Relation<sup>C</sup>

**IRI** <http://w3id.org/CEON/ontology/actorODP/ResourceRelation>

**Sub Class Of** [actorODP:Participation<sup>C</sup>](#) *and* [actorODP:participatingResource<sup>op</sup>](#) some [http://w3id.org/CEON/ontology/resourceODP/Resource<sup>C</sup>](#) *and* [actorODP:participatingActor<sup>op</sup>](#) some [actorODP:Actor<sup>C</sup>](#) *and* [actorODP:participantRole<sup>op</sup>](#) some [ActorResourceRole<sup>C</sup>](#)

**Super Class Of** [BuyingResource<sup>C</sup>](#)  
[ConsumingResource<sup>C</sup>](#)  
[DismantlingResource<sup>C</sup>](#)  
[IssuingResource<sup>C</sup>](#)  
[ManufacturingResource<sup>C</sup>](#)  
[OwningResource<sup>C</sup>](#)  
[ProducingResource<sup>C</sup>](#)  
[ProvidingResource<sup>C</sup>](#)  
[RecyclingResource<sup>C</sup>](#)  
[RepairingResource<sup>C</sup>](#)  
[ResellingResource<sup>C</sup>](#)  
[SellingResource<sup>C</sup>](#)  
[SupplyingResource<sup>C</sup>](#)  
[TakingBackResource<sup>C</sup>](#)  
[UpdatingResource<sup>C</sup>](#)  
[UsingResource<sup>C</sup>](#)  
[ViewingResource<sup>C</sup>](#)

## Role<sup>C</sup>

**IRI** <http://w3id.org/CEON/ontology/actorODP/Role>

**Super Class Of** [ActorCollaborationRole<sup>C</sup>](#)  
[ActorResourceRole<sup>C</sup>](#)

## Cvn<sup>C</sup>

**IRI** <http://w3id.org/CEON/ontology/cvn/CVN>

## Location<sup>C</sup>

**IRI** <http://w3id.org/CEON/ontology/location/Location>

**Super Class Of** [OrganisationLocation<sup>C</sup>](#)

## Process<sup>C</sup>

**IRI** <http://w3id.org/CEON/ontology/processODP/Process>

## Resource<sup>C</sup>

**IRI** <http://w3id.org/CEON/ontology/resourceODP/Resource>



## Object Properties

### capability extent<sup>op</sup>

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

**Sub Property Of** [actorODP:capabilityProperty<sup>op</sup>](#)

**Domain** [actorODP:Capability<sup>c</sup>](#)

### has organisation location<sup>op</sup>

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

**Sub Property Of** [http://w3id.org/CE0N/ontology/location/hasLocation<sup>op</sup>](http://w3id.org/CE0N/ontology/location/hasLocation)

**Domain** [Organisation<sup>c</sup>](#)

**Range** [OrganisationLocation<sup>c</sup>](#)

### needed resource relation<sup>op</sup>

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

**Sub Property Of** [actorODP:capabilityProperty<sup>op</sup>](#)

**Domain** [actorODP:Capability<sup>c</sup>](#)

### capability property<sup>op</sup>

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

**Super Property Of**

- [capabilityExtent<sup>op</sup>](#)
- [neededResourceRelation<sup>op</sup>](#)

### participant role<sup>op</sup>

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

### participating actor<sup>op</sup>

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

### participating resource<sup>op</sup>

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

participation in<sup>op</sup>

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

has location<sup>op</sup>

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

**Super Property Of** [hasOrganisationLocation<sup>op</sup>](#)

## Datatype Properties

has organisation name<sup>dp</sup>

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

**Domain** [Organisation<sup>c</sup>](#)

**Range** [xsd:string](#)

## Annotation Properties

contributor<sup>ap</sup>

**IRI** <http://purl.org/dc/terms/contributor>

created<sup>ap</sup>

**IRI** <http://purl.org/dc/terms/created>

creator<sup>ap</sup>

**IRI** <http://purl.org/dc/terms/creator>

description<sup>ap</sup>

**IRI** <http://purl.org/dc/terms/description>

issued<sup>ap</sup>

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

license<sup>ap</sup>

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

<b>publisher</b> <sup>ap</sup>	
<b>IRI</b>	<a href="http://purl.org/dc/terms/publisher">http://purl.org/dc/terms/publisher</a>
<b>title</b> <sup>ap</sup>	
<b>IRI</b>	<a href="http://purl.org/dc/terms/title">http://purl.org/dc/terms/title</a>
<b>preferred namespace prefix</b> <sup>ap</sup>	
<b>IRI</b>	<a href="http://purl.org/vocab/vann/preferredNamespacePrefix">http://purl.org/vocab/vann/preferredNamespacePrefix</a>
<b>preferred namespace uri</b> <sup>ap</sup>	
<b>IRI</b>	<a href="http://purl.org/vocab/vann/preferredNamespaceUri">http://purl.org/vocab/vann/preferredNamespaceUri</a>
<b>covers requirements</b> <sup>ap</sup>	
<b>IRI</b>	<a href="http://www.ontologydesignpatterns.org/schemas/cannotation-schema.owl#coversRequirements">http://www.ontologydesignpatterns.org/schemas/cannotation-schema.owl#coversRequirements</a>

## 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#

```

## Legend

c	Classes
op	Object Properties
dp	Datatype Properties
ap	Annotation Properties