Circular Economy Ontology Network (CEON) - Product Module

Metadata

IRI

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

Title

Circular Economy Ontology Network (CEON) - Product Module

Creator

Huanyu Li

Contributor

Eva Blomqvist

Mikael Lindecrantz

Robin Keskisärkkä

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Version Iri

http://w3id.org/CEON/ontology/product/0.2/

Version Info

0.2

Preferred Namespace Prefix

product

Preferred Namespace Uri

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

Description

The Product 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: CVN-Resource-2, CVN-ResrouceType-4, C11-2, C12-1, C13-3, E2-1, T8-3.

Classes

Matter composition [c]

IRI	http://w3id.org/CEON/ontology/product/MatterComposition
Description	A product composition is the composed information of a product in terms of a specific component, in which such a component is also a matter.
Sub Class Of	resourceODP:Composition
In Domain Of	associated with matter [op]
Restriction	associated with matter [op] *exactly* 1 Matter composition [c]

Product model^C

IRI	`http://w3id.org/CEON/ontology/product/Product`
Description	Represents the common sense notion of a product, i.e. the abstract notion of a product type or product model, which is a model that is used for manufacturing products.
In Range Of	associated with product model^{op} batch of products^{op} modelled by^{op}
Restriction	hasComposition^{op} some Product model^c hasComposition^{op} some Product model^c

Product composition^C

IRI	`http://w3id.org/CEON/ontology/product/ProductComposition`
Description	A product composition is the composed information of a product in terms of a specific component, in which such a component is also a product.
Sub Class Of	resourceODP:Composition
In Domain Of	associated with product model^{op}
Restriction	associated with product model^{op} *exactly* 1 Product composition^c

Product object^C

IRI	`http://w3id.org/CEON/ontology/product/ProductObject`
Description	A product object is a physical object put into a market for sale, i.e. corresponding to the notion of an item, which conforms to the abstract idea of a product model. The product can be a thing that grows naturally or produced through some chemical or manufacturing processes.
Sub Class Of	resourceODP:PhysicalObject
In Domain Of	has product component^{op} modelled by^{op}
In Range Of	has product component^{op}
Restriction	modelled by^{op} *exactly* 1 Product object^c

Object Properties

associated with matter ^{op}

IRI	http://w3id.org/CEON/ontology/product/associatedWithMatter
Description	associatedWithMatter intends to represent the matter to which a matter compopsition information regards to.
Domain	Matter composition ^c
Range	resourceODP:Matter

associated with product model ^{op}

IRI	http://w3id.org/CEON/ontology/product/associatedWithProductModel
Description	associatedWithProductModel intends to represent the matter to which a product compopsition information regards to.
Domain	Product composition ^c
Range	Product model ^c

batch of products ^{op}

IRI	http://w3id.org/CEON/ontology/product/batchOfProduct
Description	batchOfProduct intends to represent what is the model product of a batch of objects.
Domain	resourceODP:BatchOfObjects
Range	Product model ^c

has composition ^{op}

IRI	http://w3id.org/CEON/ontology/product/hasComposition
Description	hasComposition intends to represent that a product model or physical object can have compostition information.
Domain	resourceODP:PhysicalObject ^c *or* Product model ^c
Range	resourceODP:Composition

has product component ^{op}

IRI	http://w3id.org/CEON/ontology/product/hasProductComponent
Description	hasProductComponent intends to represent that a product can have other product components.
Domain	Product object ^c
Range	Product object ^c

modelled by ^{op}

IRI	http://w3id.org/CEON/ontology/product/modelledBy
Description	modelledBy intends to represent that product objects follow particular product models.
Domain	Product object ^c
Range	Product model ^c

Datatype Properties

Composition quantity ^{dp}

IRI	http://w3id.org/CEON/ontology/product/compositionQuantity
Description	compositionQuantity intends to represent the quantity value of composed elements of a composition. The quantity value can be the number of a element or the percentage of a element.
Domain	resourceODP:Composition
Range	xsd:double ^c *or* xsd:positiveInteger ^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/cpannotation schema.owl#coversRequirements

Namespaces

:

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

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/

xsd

    http://www.w3.org/2001/XMLSchema#

Legend

c	Classes
op	Object Properties
dp	Datatype Properties
ap	Annotation Properties