

PyCSDF Documentation

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Namespace `pycsdl`

Sub-modules

- [pycsdl.aws](#)
- [pycsdl.azure](#)
- [pycsdl.csdI](#)
- [pycsdl.estimator](#)
- [pycsdl.examples](#)
- [pycsdl.main](#)
- [pycsdl.misc](#)

Namespace `pycsdl.aws`

Sub-modules

- [pycsdl.aws.EBS](#)
- [pycsdl.aws.ec2](#)
- [pycsdl.aws.rdsPostgres](#)
- [pycsdl.aws.regions](#)
- [pycsdl.aws.s3](#)

Module `pycsdl.aws.EBS`

Classes

Class `EBS`

```
class EBS
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.CCS](#)
- [csdl.Attribute](#)

Namespace `pycsdl.aws.ec2`

Sub-modules

- [pycsdl.aws.ec2.A1Large](#)
- [pycsdl.aws.ec2.EC2](#)
- [pycsdl.aws.ec2.ElasticIpAmount](#)
- [pycsdl.aws.ec2.MachineType](#)

Module `pycsdl.aws.ec2.A1Large`

Classes

Class `A1Large`

```
class A1Large
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.aws.ec2.EC2`

Classes

Class `EC2`

```
class EC2
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.CCS](#)
- [csdl.Attribute](#)

Module `pycsdl.aws.ec2.ElasticIpAmount`

Classes

Class `ElasticIpAmount`

```
class ElasticIpAmount
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.aws.ec2.MachineType`

Classes

Class `MachineType`

```
class MachineType
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Namespace `pycsdl.aws.rdsPostgres`

Sub-modules

- [pycsdl.aws.rdsPostgres.AvailabilityZone](#)
- [pycsdl.aws.rdsPostgres.DbT4gMicro](#)
- [pycsdl.aws.rdsPostgres.MultiAZ](#)
- [pycsdl.aws.rdsPostgres.Postgresql](#)
- [pycsdl.aws.rdsPostgres.SingleAZ](#)
- [pycsdl.aws.rdsPostgres.StorageType](#)

Module `pycsdl.aws.rdsPostgres.AvailabilityZone`

Classes

Class `AvailabilityZone`

```
class AvailabilityZone
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.aws.rdsPostgres.DbT4gMicro`

Classes

Class `DbT4gMicro`

```
class DbT4gMicro
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.aws.rdsPostgres.MultiAZ`

Classes

Class MultiAZ

```
class MultiAZ
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.aws.rdsPostgres.Postgresql`

Classes

Class Postgresql

```
class Postgresql
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.CCS](#)
- [csdl.Attribute](#)

Module `pycsdl.aws.rdsPostgres.SingleAZ`

Classes

Class SingleAZ

```
class SingleAZ
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.aws.rdsPostgres.StorageType`

Classes

Class `StorageType`

```
class StorageType
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Namespace `pycsdl.aws.regions`

Sub-modules

- [pycsdl.aws.regions.California](#)
- [pycsdl.aws.regions.NewYork](#)
- [pycsdl.aws.regions.NorthernVirginia](#)
- [pycsdl.aws.regions.Region](#)

Module `pycsdl.aws.regions.California`

Classes

Class `California`

```
class California
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.aws.regions.NewYork`

Classes

Class `NewYork`

```
class NewYork
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.aws.regions.NorthernVirginia`

Classes

Class `NorthernVirginia`

```
class NorthernVirginia
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.aws.regions.Region`

Classes

Class `Region`

```
class Region
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Namespace `pycsdl.aws.s3`

Sub-modules

- [pycsdl.aws.s3.S3](#)
- [pycsdl.aws.s3.S3Type](#)
- [pycsdl.aws.s3.Standard](#)
- [pycsdl.aws.s3.StandardInfreqAccess](#)

Module `pycsdl.aws.s3.S3`

Classes

Class `S3`

```
class S3
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.CCS](#)
- [csdl.Attribute](#)

Module `pycsdl.aws.s3.S3Type`

Classes

Class `S3Type`

```
class S3Type
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.aws.s3.Standard`

Classes

Class `Standard`

```
class Standard
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.aws.s3.StandardInfreqAccess`

Classes

Class `StandardInfreqAccess`

```
class StandardInfreqAccess
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Namespace `pycsdl.azure`

Sub-modules

- [pycsdl.azure.postgres](#)

Namespace `pycsdl.azure.postgres`

Sub-modules

- [pycsdl.azure.postgres.Basic1](#)
- [pycsdl.azure.postgres.GeneralPurpose1](#)
- [pycsdl.azure.postgres.MachineType](#)
- [pycsdl.azure.postgres.Postgresql](#)
- [pycsdl.azure.postgres.SingleServer](#)
- [pycsdl.azure.postgres.WorkloadType](#)

Module `pycsdl.azure.postgres.Basic1`

Classes

Class `Basic1`

```
class Basic1
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.azure.postgres.GeneralPurpose1`

Classes

Class `GeneralPurpose1`

```
class GeneralPurpose1
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.azure.postgres.MachineType`

Classes

Class `MachineType`

```
class MachineType
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.azure.postgres.Postgresql`

Classes

Class `Postgresql`

```
class Postgresql
```


Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.CCS](#)
- [csdl.Attribute](#)

Module `pycsdl.azure.postgres.SingleServer`

Classes

Class `SingleServer`

```
class SingleServer
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.azure.postgres.WorkloadType`

Classes

Class `WorkloadType`

```
class WorkloadType
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.csdl`

Variables

Variable `ccsGitCache`

Caches all cloned git repositories

Variable importedClasses

Attributelds that have already been imported mapped to their class names and extendslds. Whenever a new Attribute is added (not imported) to the framework, it needs to be included in here.

Functions

Function cleanGitCache

```
def cleanGitCache()
```

Delete all temporary directories that were created to clone git repositories into

Function estimatePrice

```
def estimatePrice(  
    req,  
    ccs,  
    currency='EUR'  
)
```

returns a dict containing the total price and a dict of configurations that it resulted from

Function extractAttributes

```
def extractAttributes(  
    attribute  
)
```

Recursively get all fields and subfields of an [Attribute](#) instance that are also of type [Attribute](#). Also scans the options field of ChoiceAttributes

Args ---= **attribute** : [Attribute](#) : The CCS of which all fields of type Attribute are to be extracted

Returns ---= list(Attribute): A list of Attribute instances

Note ---= CCS also inherits from Attribute

Function extractConfigurationTree

```
def extractConfigurationTree(  
    ccs  
)
```

extract the configuration of all CCS and their sub CCS

Function extractPrices

```
def extractPrices(  
    attribute  
)
```

Recursively get all fields and subfields of an [Attribute](#) instance that are of type [Price](#). Also scans the options field of ChoiceAttributes

Args ---= **attribute** : [Attribute](#) : The CCS of which all fields of type Attribute are to be extracted

Returns ---= list(Attribute): A list of Attribute instances

Note ---= CCS also inherits from Attribute

Function getExtendsId

```
def getExtendsId(  
    attributeId  
)
```

get the extendsId field of a class instance that matches with the given attributeId

Args ---= **attributeId** : str : id of the Attribute whose extendsId field is sought

Returns ---= str : extendsId field of the Attribute that matches with the given attributeId

Note ---= - This function can only be called on Attributes that have already been imported. - CCS also inherits from Attribute

Function isAncestorOf

```
def isAncestorOf(  
    rid,  
    cid  
)
```

checks if an Attribute is related to another Attribute

Args ---= **rid** : str : id of the first Attribute

cid : **str** id for the second Attribute

Returns ---= bool : True if the Attributes are related, else False

Note ---= - two Attributes are related if either their ids match or an extendsId of the second attribute in any depth matches with the first attribute - CCS also inherits from Attribute

Function matchAttribute

```
def matchAttribute(  
    ccs,  
    *attributeIds  
)
```

Recursively get the first field of type [Attribute](#) of - either the given [CCS](#) or one of its subfields of type [Attribute](#) - that are related to the given attributeIds in the given order. Options of Attributes of type ChoiceAttribute will also be scanned for matches

Args: ccs (CCS): The CCS whose fields will be searched attributeIds (tuple(str)): The id that a field of type Attribute should match with

Returns: Attribute: The field that matched with attributeId

Note: CCS also inherits from Attribute

Example: >>> # returns the storage field of the VMAsAService instance >>> matchAttribute(VMAsAService, "Storage")

```
>>> # returns the <code>storage</code> field of the StorageAsAService instance inside the VMAsAService i  
>>> matchAttribute(VMAsAService(), "StorageAsAService", "Storage")
```

```
>>> # returns the VMAsAService instance  
>>> matchAttribute(VMAsAService(), "VMAsAService")
```

Function matchCCS

```
def matchCCS(  
    req,  
    ccs  
)
```

check if a requirement matches with a CCS and return a satisfying configuration.

Args ---= **req** : [CCS](#) : The requirements

ccs : [CCS](#) The CCS to check for a match

Returns ---= bool : True if they match, else False

dict configuration, None if unsatisfied

Note ---= - A requirement matches with a CCS if and only if every single Attribute field of the requirement is satisfied through a related Attribute field in the CCS - Attribute fields must be unique. Each instance of CCS may not have multiple Attribute fields with the same id - If a requirement or a CCS has an Attribute field whose subfields have an Attribute with a duplicate id, then only the first matching Attribute with that id will be considered.

Function randName

```
def randName()
```

Returns a cryptographically secure 16 digit random string starting with the letter C

Function renderHierarchy

```
def renderHierarchy()
```

render the class hierarchy of all imported attributes

Classes

Class Africa

```
class Africa
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten.

Ancestors (in MRO)

- [pycsdl.cSDL.OptionAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class Antarctica

```
class Antarctica
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten.

Ancestors (in MRO)

- [pycsdl.cSDL.OptionAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class Attribute

```
class Attribute
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Descendants

- [pycsdl.cSDL.BoolAttribute](#)
- [pycsdl.cSDL.CCS](#)
- [pycsdl.cSDL.ChoiceAttribute](#)
- [pycsdl.cSDL.NumericAttribute](#)
- [pycsdl.cSDL.OptionAttribute](#)
- [pycsdl.cSDL.Price](#)

Methods

Method inject

```
def inject(
    self,
    gitRepo,
    filePath,
    branch=None,
    commit=None,
    onlyFetchDependency=False
)
```

Updates self with the fields of the Attribute that are attained from the given filePath.

Args --- **gitRepo** : str : The URI to a git repository where the file is stored. Defaults to "local", indicating that it is stored on the local machine.

filePath : str The path to the file inside the git repository.

branch : str The git branch name, defaults to None (indicates that master should be fetched).

commit : str The commit id of the git branch, defaults to None (indicates that the latest commit should be fetched)

onlyFetchDependency : bool Does not inject any fields to self if set to True, defaults to False.

Method setId

```
def setId(
    self,
    gitRepo,
    filePath,
    branch=None,
    commit=None
)
```

Set the id of an Attribute type instance. This id has to be unique and specify from where the Attribute can be loaded.

Args --- **gitRepo** : str : The URI to a git repository where the file is stored. Defaults to "local", indicating that it is stored on the local machine.

filePath : str The path to the file inside the git repository.

branch : str The git branch name, defaults to None (indicates that master should be fetched).

commit : str The commit id of the git branch, defaults to None (indicates that the latest commit should be fetched)

Class Australia

```
class Australia
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.OptionAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class BoolAttribute

```
class BoolAttribute
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.Attribute](#)

Class CCS

```
class CCS
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.Attribute](#)

Descendants

- [pycsdl.cSDL.IaaS](#)
- [pycsdl.cSDL.SaaS](#)

Class ChoiceAttribute

```
class ChoiceAttribute
```

ChoiceAttribute

Attributes **options** : list : A dictionary of OptionAttributes

value : **Attribute** The dictionary key of the chosen OptionAttribute from self.options

Ancestors (in MRO)

- [pycsdl.cSDL.Attribute](#)

Descendants

- [pycsdl.cSDL.OperatingSystem](#)
- [pycsdl.cSDL.PricingModel](#)
- [pycsdl.cSDL.Region](#)

Class CpuClockSpeed

```
class CpuClockSpeed
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.NumericAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class CpuCores

```
class CpuCores
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.NumericAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class DatabaseAsAService

```
class DatabaseAsAService
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.SaaS](#)
- [pycsdl.cSDL.CCS](#)
- [pycsdl.cSDL.Attribute](#)

Descendants

- [pycsdl.cSDL.NoSQLDatabaseAsAService](#)
- [pycsdl.cSDL.SQLDatabaseAsAService](#)

Class EastAsia

```
class EastAsia
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.OptionAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class Europe

```
class Europe
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.OptionAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class IaaS

```
class IaaS
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.CCS](#)
- [pycsdl.cSDL.Attribute](#)

Descendants

- [pycsdl.cSDL.ServerAsAService](#)
- [pycsdl.cSDL.StorageAsAService](#)

Class Linux

```
class Linux
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.OptionAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class Mac

```
class Mac
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.OptionAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class NetworkCapacity

```
class NetworkCapacity
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.NumericAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class NetworkDownloadSpeed

```
class NetworkDownloadSpeed
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.NumericAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class NetworkUploadSpeed

```
class NetworkUploadSpeed
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.NumericAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class NoSQLDatabaseAsAService

```
class NoSQLDatabaseAsAService
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.DatabaseAsAService](#)
- [pycsdl.cSDL.SaaS](#)
- [pycsdl.cSDL.CCS](#)
- [pycsdl.cSDL.Attribute](#)

Class NorthAmerica

```
class NorthAmerica
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.OptionAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class NumericAttribute

```
class NumericAttribute
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.Attribute](#)

Descendants

- [pycsdl.cSDL.CpuClockSpeed](#)
- [pycsdl.cSDL.CpuCores](#)
- [pycsdl.cSDL.NetworkCapacity](#)
- [pycsdl.cSDL.NetworkDownloadSpeed](#)
- [pycsdl.cSDL.NetworkUploadSpeed](#)
- [pycsdl.cSDL.Ram](#)
- [pycsdl.cSDL.RamClockSpeed](#)

- [pycsdl.cSDL.RamReadSpeed](#)
- [pycsdl.cSDL.RamWriteSpeed](#)
- [pycsdl.cSDL.Storage](#)
- [pycsdl.cSDL.StorageReadSpeed](#)
- [pycsdl.cSDL.StorageWriteSpeed](#)

Class OperatingSystem

```
class OperatingSystem
```

ChoiceAttribute

Attributes `== options : list` : A dictionary of OptionAttributes

value : **Attribute** The dictionary key of the chosen OptionAttribute from self.options

Ancestors (in MRO)

- [pycsdl.cSDL.ChoiceAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class OptionAttribute

```
class OptionAttribute
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.Attribute](#)

Descendants

- [pycsdl.cSDL.Africa](#)
- [pycsdl.cSDL.Antarctica](#)
- [pycsdl.cSDL.Australia](#)
- [pycsdl.cSDL.EastAsia](#)
- [pycsdl.cSDL.Europe](#)
- [pycsdl.cSDL.Linux](#)
- [pycsdl.cSDL.Mac](#)
- [pycsdl.cSDL.NorthAmerica](#)
- [pycsdl.cSDL.PricingModelInterface](#)
- [pycsdl.cSDL.SouthAmerica](#)
- [pycsdl.cSDL.Windows](#)

Class PayAndGo

```
class PayAndGo
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.PricingModelInterface](#)
- [pycsdl.cSDL.OptionAttribute](#)
- [pycsdl.cSDL.Attribute](#)
- [abc.ABC](#)

Methods

Method getPrice

```
def getPrice(  
    self,  
    req,  
    priceFuncs,  
    currencyConversion=1  
)
```

Class Price

```
class Price
```

everything to evaluate the final price based on CCS configuration and the pricing model enforced by the CCS

Ancestors (in MRO)

- [pycsdl.cSDL.Attribute](#)

Class PriceFunc

```
class PriceFunc
```

Helper class that provides a standard way to create an ABC using inheritance.

Ancestors (in MRO)

- [abc.ABC](#)

Methods

Method run

```
def run(  
    self,  
    req  
)
```

returns the value of this price function

Class PricingModel

```
class PricingModel
```

ChoiceAttribute

Attributes ---= `options` : list : A dictionary of OptionAttributes

value : **Attribute** The dictionary key of the chosen OptionAttribute from self.options

Ancestors (in MRO)

- [pycsdl.cSDL.ChoiceAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class PricingModelInterface

```
class PricingModelInterface
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.OptionAttribute](#)
- [pycsdl.cSDL.Attribute](#)
- [abc.ABC](#)

Descendants

- [pycsdl.cSDL.PayAndGo](#)
- [pycsdl.cSDL.Subscription](#)

Methods

Method getPrice

```
def getPrice(  
    self,  
    req,  
    priceFuncs,  
    currencyConversion=1  
)
```

Class Ram

```
class Ram
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.NumericAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class RamClockSpeed

```
class RamClockSpeed
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.NumericAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class RamReadSpeed

```
class RamReadSpeed
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.NumericAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class RamWriteSpeed

```
class RamWriteSpeed
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.NumericAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class Region

```
class Region
```

ChoiceAttribute

Attributes `options` : list : A dictionary of OptionAttributes

value : **Attribute** The dictionary key of the chosen OptionAttribute from self.options

Ancestors (in MRO)

- [pycsdl.cSDL.ChoiceAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class SQLiteDatabaseAsAService

```
class SQLiteDatabaseAsAService
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.csdl.DatabaseAsAService](#)
- [pycsdl.csdl.SaaS](#)
- [pycsdl.csdl.CCS](#)
- [pycsdl.csdl.Attribute](#)

Class SaaS

```
class SaaS
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.csdl.CCS](#)
- [pycsdl.csdl.Attribute](#)

Descendants

- [pycsdl.csdl.DatabaseAsAService](#)

Class ServerAsAService

```
class ServerAsAService
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.csdl.IaaS](#)
- [pycsdl.csdl.CCS](#)
- [pycsdl.csdl.Attribute](#)

Descendants

- [pycsdl.csdl.VMAsAService](#)

Class SouthAmerica

```
class SouthAmerica
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.OptionAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class Storage

```
class Storage
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.NumericAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class StorageAsAService

```
class StorageAsAService
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.IaaS](#)
- [pycsdl.cSDL.CCS](#)
- [pycsdl.cSDL.Attribute](#)

Class StorageReadSpeed

```
class StorageReadSpeed
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.NumericAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class StorageWriteSpeed

```
class StorageWriteSpeed
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.NumericAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Class Subscription

```
class Subscription
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.PricingModelInterface](#)
- [pycsdl.cSDL.OptionAttribute](#)
- [pycsdl.cSDL.Attribute](#)
- [abc.ABC](#)

Methods

Method getPrice

```
def getPrice(  
    self,  
    req,  
    priceFuncs,  
    currencyConversion=1  
)
```

Class VMAsAService

```
class VMAsAService
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.ServerAsAService](#)
- [pycsdl.cSDL.IaaS](#)
- [pycsdl.cSDL.CCS](#)
- [pycsdl.cSDL.Attribute](#)

Class Windows

```
class Windows
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [pycsdl.cSDL.OptionAttribute](#)
- [pycsdl.cSDL.Attribute](#)

Module `pycsdl.estimator`

Functions

Function `estimate`

```
def estimate(  
    req,  
    currency='EUR',  
    usageHours=1  
)
```

given some requirements

Namespace `pycsdl.examples`

Sub-modules

- [pycsdl.examples.DatabaseRequirement](#)
- [pycsdl.examples.Requirement1](#)
- [pycsdl.examples.StorageRequirement](#)

Module `pycsdl.examples.DatabaseRequirement`

Classes

Class `DatabaseRequirement`

```
class DatabaseRequirement
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [cSDL.Attribute](#)

Module `pycsdl.examples.Requirement1`

Classes

Class `Requirement1`

```
class Requirement1
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.examples.StorageRequirement`

Classes

Class `StorageRequirement`

```
class StorageRequirement
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.main`

Functions

Function `main`

```
def main()
```

Namespace `pycsdl.misc`

Sub-modules

- [pycsdl.misc.StaticIp](#)
- [pycsdl.misc.countries](#)
- [pycsdl.misc.dataTransfer](#)
- [pycsdl.misc.requests](#)
- [pycsdl.misc.storage](#)

Module `pycsdl.misc.StaticIp`

Classes

Class `StaticIp`

```
class StaticIp
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Namespace `pycsdl.misc.countries`

Sub-modules

- [pycsdl.misc.countries.EastUS](#)
- [pycsdl.misc.countries.Germany](#)
- [pycsdl.misc.countries.Japan](#)
- [pycsdl.misc.countries.USA](#)

Module `pycsdl.misc.countries.EastUS`

Classes

Class `EastUS`

```
class EastUS
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.misc.countries.Germany`

Classes

Class `Germany`

```
class Germany
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.misc.countries.Japan`

Classes

Class Japan

```
class Japan
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.misc.countries.USA`

Classes

Class USA

```
class USA
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Namespace `pycsdl.misc.dataTransfer`

Sub-modules

- [pycsdl.misc.dataTransfer.IOPS](#)
- [pycsdl.misc.dataTransfer.In](#)
- [pycsdl.misc.dataTransfer.Out](#)

Module `pycsdl.misc.dataTransfer.IOPS`

Classes

Class `IOPS`

```
class IOPS
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.misc.dataTransfer.In`

Classes

Class `In`

```
class In
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.misc.dataTransfer.Out`

Classes

Class `Out`

```
class Out
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Namespace `pycsdl.misc.requests`

Sub-modules

- [pycsdl.misc.requests.COPYAmount](#)
- [pycsdl.misc.requests.GETAmount](#)
- [pycsdl.misc.requests.LISTAmount](#)
- [pycsdl.misc.requests.POSTAmount](#)
- [pycsdl.misc.requests.PUTAmount](#)
- [pycsdl.misc.requests.SELECTAmount](#)

Module `pycsdl.misc.requests.COPYAmount`

Classes

Class `COPYAmount`

```
class COPYAmount
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.misc.requests.GETAmount`

Classes

Class `GETAmount`

```
class GETAmount
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.misc.requests.LISTAmount`

Classes

Class `LISTAmount`

```
class LISTAmount
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.misc.requests.POSTAmount`

Classes

Class `POSTAmount`

```
class POSTAmount
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.misc.requests.PUTAmount`

Classes

Class `PUTAmount`

```
class PUTAmount
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.misc.requests.SELECTAmount`

Classes

Class `SELECTAmount`

```
class SELECTAmount
```


Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Namespace `pycsdl.misc.storage`

Sub-modules

- [pycsdl.misc.storage.BackupRetentionPeriod](#)
- [pycsdl.misc.storage.BackupSnapshotAmount](#)
- [pycsdl.misc.storage.BackupStorage](#)
- [pycsdl.misc.storage.IOPSMagneticStorage](#)
- [pycsdl.misc.storage.IOPSSSDStorage](#)
- [pycsdl.misc.storage.MagneticStorage](#)
- [pycsdl.misc.storage.SSDStorage](#)

Module `pycsdl.misc.storage.BackupRetentionPeriod`

Classes

Class `BackupRetentionPeriod`

```
class BackupRetentionPeriod
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.misc.storage.BackupSnapshotAmount`

Classes

Class `BackupSnapshotAmount`

```
class BackupSnapshotAmount
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.misc.storage.BackupStorage`

Classes

Class `BackupStorage`

```
class BackupStorage
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.misc.storage.IOPSMagneticStorage`

Classes

Class `IOPSMagneticStorage`

```
class IOPSMagneticStorage
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.misc.storage.IOPSSSDStorage`

Classes

Class `IOPSSSDStorage`

```
class IOPSSSDStorage
```

Instances of the Attribute class have a unique id that encodes from where they can be loaded. Classes that extend the Attribute class can be matched with other Attributes if they are related, which helps with user requirement matching and price calculation. Also, classes that have an Attribute type ancestor can be extended arbitrarily by other Attribute type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.misc.storage.MagneticStorage`

Classes

Class `MagneticStorage`

```
class MagneticStorage
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)

Module `pycsdl.misc.storage.SSDStorage`

Classes

Class `SSDStorage`

```
class SSDStorage
```

Instances of the `Attribute` class have a unique id that encodes from where they can be loaded. Classes that extend the `Attribute` class can be matched with other `Attributes` if they are related, which helps with user requirement matching and price calculation. Also, classes that have an `Attribute` type ancestor can be extended arbitrarily by other `Attribute` type instances (however, note that existing duplicate fields will be overwritten).

Ancestors (in MRO)

- [csdl.Attribute](#)
-