Verification Continuum[™] Verdi[®] Python-Based NPI Coverage Model

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Preface

The Python-Based NPI Coverage Model User Guide provides information to let you access coverage database generated by verification tools such as VCS simulator.

Customer Support

For any online access to the self-help resources, you can refer to the documentation and searchable knowledge base available in SolvNetPlus.

To obtain support for your Verdi product, choose one of the following:

Open a case through SolvNetPlus.

Go to https://solvnetplus.synopsys.com/s/contactsupport and provide the requested information, including:

- Product L1 as Verdi
- Case Type

Fill in the remaining fields according to your environment and issue.

Send an e-mail message to verdi support@synopsys.com.

Include product name (L1), sub-product name/technology (L2), and product version in your e-mail, so it can be routed correctly.

Your e-mail will be acknowledged by automatic reply and assigned a Case number along with Case reference ID in the subject (ref: ...:ref).

For any further communication on this Case via e-mail, send e-mail to verdi_support@synopsys.com and ensure to have the same Case ref ID in the subject header or else it will open duplicate cases.

You can call for support at:

https://www.synopsys.com/support/global-support-centers.html

Note:

In general, we need to be able to reproduce the problem in order to fix it, so a simple model demonstrating the error is the most effective way for us to identify the bug. If that is not possible, then provide a detailed explanation of the problem along with complete error and corresponding code, if any/permissible.

Synopsys Statement on Inclusivity and Diversity

Synopsys is committed to creating an inclusive environment where every employee, customer, and partner feels welcomed. We are reviewing and removing exclusionary language from our products and supporting customer-facing collateral. Our effort also includes internal initiatives to remove biased language from our engineering and working environment, including terms that are embedded in our software and IPs. At the same time, we are working to ensure that our web content and software applications are usable to people of varying abilities. You may still find examples of non-inclusive language in our software or documentation as our IPs implement industry-standard specifications that are currently under review to remove exclusionary language.

1

Introduction to Python Based NPI

Python-Based NPI APIs support six models:

- Coverage
- Language
- Netlist
- Text
- Waveform
- · Waveform Writer

Each model have their own APIs to let you be able to traverse data objects and obtain objects' properties like the existing C-Based or Tcl-Based NPI APIs.

In this guide, the environment setting for using **Python-Based NPI APIs for Coverage** is demonstrated.

Package and Modules

Packages

The Python-based NPI package name is "pynpi", and it is placed at \$VERDI_HOME/share/NPI/python.

Modules

There are seven modules inside the "pynpi" package: npisys, lang, netlist, text, cov waveform and waveformw. The first module, npisys, is the system model for initialization, loading design and exit. The other modules represent language model, netlist model, text model, coverage model, wave model and waveform writer model respectively

Module Functions and Class Objects

L0 Module Functions

Every module provides some L0 (level 0) functions to let you get the class objects. These functions return a class object or a list of class objects, and they follow the specification of the existing L0 APIs provided in C or Tcl.

L1 Module Functions

Similar to L0 module functions, every module also provides some L1 (level 1) functions to let you get advanced information based on the results obtained by L0 module functions. These functions follows the specification of the existing L1 APIs provided in C or Tcl.

Class Objects

The class object is similar to the so-called handle in NPI C APIs. The most difference is that some basic L0 APIs in C and Tcl will become class method function. These L0 APIs are usually to get integer value, string value, 1-to-1 method to get a handle, and 1-to-many method to get handle iterator.

User Interface and Use Flow

Environment and Library Setting

The python library setting flow of using Python-Based NPI APIs contains four parts:

- 1. Check your Python's version:
 - Python-Based NPI APIs need the Python version greater than 3.6.0.
- 2. Environment setting for "VERDI_HOME" is required for Python-based NPI. Ensure that you set it up before running program.
- 3. Add python library path into your python code before loading Python-Based NPI by the following commands:

```
rel_lib_path = os.environ['VERDI_HOME'] + '/share/NPI/python'
sys.path.append(os.path.abspath(rel_lib_path))
```

4. Import module "npisys" for using the function of NPI initialization and exit from pynpi package.

```
from pynpi import npisys
```

5. Import the module you need from pynpi package. For example, if you want to use Coverage model, you can import module like the following:

```
from pynpi import cov
```

6. Note that initialization function <code>npisys.init()</code> must be called before writing your code by using any other modules. Also, you must call <code>npisys.end()</code> after finishing your code. Following is a simple example to demonstrate how to use coverage model by Python-Based NPI APIs.

Python program to use NPI models: (demo.py)

```
#!/global/freeware/Linux/2.X/python-3.6.0/bin/python
import sys, os
rel lib path = os.environ["VERDI HOME"] + "/share/NPI/python"
sys.path.append(os.path.abspath(rel lib path))
from pynpi import npisys
from pynpi import cov
# Initialize NPI
if not npisys.init(sys.argv):
print("Error: Fail to initialize NPI")
assert 0
# Load design (if needed, depends on models)
if not npisys.load design(sys.argv):
print("Error: Fail to load design")
assert 0
# Beginning of your code here -----
# Example code can be found in later chapters
# End of your code -----
# End NPI
npisys.end()
```

C shell script example to setup environment and execute Python program: (run_demo)

```
#!/bin/csh -f
# Setup your $VERDI_HOME here
setenv VERDI_HOME [YOUR_VERDI_HOME_PATH]
# run the python program
# - Input arguments depend on your program design
# - If loading design is required, you can pass the options like
./demo.py -sv demo.v
```

To run the files, put the above files in the same directory and execute the run_demo C shell script.

./run_demo

2

Module npisys

This chapter includes the following topics:

- Overview
- L0 APIs

Overview

Module npisys is for setting Python-based NPI. You must call npisys.init() before using any other NPI modules and call npisys.end() after using any other NPI modules.

L₀ APIs

Following are the public L0 APIs for system module:

npisys.init(pyArgvList)

System initialization for Python-Based NPI.

Parameters: pyArgList (str list) – input argument list, for example, sys.argv

Returns: Return 1 if successful. Otherwise, return 0.

Return type: int

Example

>>>npisys.init(sys.argv)

npisys.load_design(pyArgvList)

Load design for Python-Based NPI.

Parameters: pyArgList (str list) – input argument list. For example, sys.argv

Returns: Return 1 if successful. Otherwise, return 0.

Return type: int

Example

>>>npisys.load_design(sys.argv)

npisys.end()

Clean NPI-related settings and data.

Parameters: none

Returns: Return 1 if successful. Otherwise, return 0.

Return type: int

Example

>>>npisys.end()

3

Python-Based NPI Coverage Model

This chapter includes the following topics:

- Overview
- Quick Start
- Class Objects

Overview

The NPI coverage model lets you to access coverage database generated by verification tools such as VCS simulator. With coverage model, you can create custom reports and tools for displaying and analyzing coverage data.

Quick Start

Example Code:

```
import sys
rel lib path = os.environ['VERDI HOME'] + '/share/NPI/python'
sys.path.append(os.path.abspath(rel lib path))
from pynpi import npisys
from pynpi import cov
# -- traverse coverage toggle info ------
def trv toggle(hdl, indentCnt, test, fp w):
   childList = hdl.child handles()
   for child in childList:
       for i in range(indentCnt):
          fp w.write(' ')
      fp w.write('# '+child.type()+': '+child.name()+'
cov:'+str(child.covered(test)))
       fp w.write('/'+str(child.coverable(test))+'\n')
       trv toggle(child, indentCnt+1, test, fp w)
       cov.release_handle(child)
def trv_cov_inst(hdl, indentCnt, test, fp_w):
```

```
instList = hdl.instance handles()
   for inst in instList:
       for i in range(indentCnt):
          fp w.write(' ')
       hdlType = inst.type()
       fp w.write(hdlType+': ')
       if hdlType == 'npiCovDatabase':
          fp w.write(inst.name()+'\n')
          fp w.write(inst.full name()+'\n')
       tm = inst.toggle metric handle()
       if (tm):
          trv toggle(tm, indentCnt, test, fp w)
       trv cov inst(inst, indentCnt+1, test, fp w)
       cov.release_handle(inst)
res = npisys.init(sys.argv)
if res != 1:
   print('[Error] Failed to do npi init')
   sys.exit(1)
# -- open log to write -------
fp w = open('test.log', 'w')
vdbName = 'merged.vdb'
# -- traverse all the toggle bins and write thier coverage info ------
covDb = cov.open(vdbName)
if (covDb):
   fp w.write('load vdb: '+covDb.name()+'\n')
   # -- merge tests -------
   mergedTest = None
   testList = covDb.test handles()
   for test in testList:
       fp w.write(test.name()+'\n')
       if (mergedTest == None):
          mergedTest = test
          mergedTest = cov.merge test(mergedTest, test)
   fp w.write('mergedTest: '+mergedTest.name()+'\n')
   trv_cov_inst(covDb, 1, mergedTest, fp_w)
   covDb.close()
# -- close log and end -------
fp w.close()
npisys.end()
Execution Result
open vdb: merged.vdb
mergedTest: merged.vdb/test
npiCovInstance: test jukebox
```

```
npiCovInstance: test_jukebox.st0
# npiCovSignal: trki cov:4/4
# npiCovSignalBit: trki[0] cov:2/2
# npiCovToggleBin: 0 -> 1 cov:1/1
# npiCovToggleBin: 1 -> 0 cov:1/1
# npiCovSignalBit: trki[1] cov:2/2
# npiCovToggleBin: 0 -> 1 cov:1/1
# npiCovToggleBin: 1 -> 0 cov:1/1
# npiCovToggleBin: 1 -> 0 cov:1/1
# npiCovSignal: dski cov:2/4
# npiCovSignalBit: dski[0] cov:1/2
# npiCovToggleBin: 0 -> 1 cov:0/1
# npiCovToggleBin: 1 -> 0 cov:1/1
# npiCovToggleBin: 0 -> 1 cov:0/1
```

Class Objects

In coverage module, you can use the object diagrams in the existing C/C++-Based NPI object diagrams to see the usage of Python-Based NPI class objects by the following rules:

1. Every int or string property can be called as a class function whose function name is that int or string property after removing prefix "npiCov" and making the rest part become snake case style. Here is the table to show the mapping:

C/C++-based NPI Usage	Python-based NPI Usage
npi_cov_get_str(npiCovName, hdl)	hdl.name()
npi_cov_get(npiCovLineNo, hdl)	hdl.line_no()

2. Every 1-to-1 method can be called as a class function whose function name is that method plus "_method" after removing prefix "npiCov" and making the rest part become snake case style. Similar to 1-to-1 method mapping, 1-to-many method mapping only needs to change from "_method" to "_methods". Note that the return object of 1-to-many method is an iterator in C/C++, but a list in Python. Here is the table to show the mapping:

C/C++-based NPI Usage	Python-based NPI Usage
npi_cov_handle(npiCovLineMetric, hdl)	hdl.line_metric_handle()
npi_cov_handles(npiCovChild, hdl)	hdl.child_handles()

Following are all the class object diagrams, relationships and properties:

Object Category	Class Objects
Coverage Database	Database, Test, TestInfo
Instance	Instance
Line Coverage	LineCoverage, Block, StmtBin
Toggle Coverage	Toggle Coverage, Signal, SignalBit, Toggle Bin
Finite State Machine Coverage	Fsm Coverage, Fsm, States, Transitions, Sequences, StateBin, TransBin, SeqBin
Condition Coverage	ConditionMetric, Condition, ConditionBin, ConditionTerm
Branch Coverage	Branch Metric, Branch, BranchBin, BranchTerm
Assert Coverage	AssertMetric, AssertAssertCoverProperty, CoverSequence, SuccessBin, AttemptBin, FailureBin, VacuousBin, IncompleteBin, FirstmatchBin
Testbench Coverage	TestbenchMetric, Covergroup, CoverInstance, Cross, Coverpoint, CoverBin
Power Coverage	PowerDomain, PowerMeasure, PowerMetric, Covergroup
Covered Test	Covered Test

For more information about Coverage Object Category, see the "NPI Coverage Model" chapter in the *VC Apps Native Programming Interface (NPI) Guide*.

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Class Objects

This chapter includes the following topics:

- Database
- Test
- Instance
- LineCoverage
- Block
- StmtBin
- Toggle Coverage
- Signal
- SignalBit
- Toggle Bin
- Fsm Coverage
- Fsm
- States
- Transitions
- Sequences
- StateBin
- TransBin
- SeqBin
- ConditionMetric
- Condition
- ConditionBin

- ConditionTerm
- Branch Metric
- Branch
- BranchBin
- BranchTerm
- AssertMetric
- Assert
- CoverProperty
- CoverSequence
- SuccessBin
- AttemptBin
- FailureBin
- VacuousBin
- IncompleteBin
- FirstmatchBin
- TestbenchMetric
- Covergroup
- CoverInstance
- Cross
- Coverpoint
- CoverBin
- PowerDomain
- PowerMeasure
- PowerMetric
- Covered Test

Database

class cov.Database

test_handles()

Get test handle list.

Returns: Return the handle list obtained by 1-many method: test

Return type: list of Test

Example

```
>>> hdlList = ref.test_handles()
>>> hdlList[0].type()
'npiCovTest'
```

instance_handles()

Get instance handle list.

Returns: Return the handle list obtained by 1-many method: instance

Return type: list of cov.Instance

Example

```
>>> hdlList = ref.instance_handles()
>>> hdlList[0].type()
'npiCovInstance'
```

close()

close database handle.

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> dbHdl.close()
1
```

handle_by_name(name)

Get instance handle by fullname.

Parameters: name (str) – The fullname of instance handle

Returns: Return the handle according to the fullname

Return type: Instance

Example

```
>>> instHdl = dbHdl.handle_by_name('top.a.b')
>>> instHdl.type()
'npiCovInstance'
```

test by name(name)

Get test handle by name.

Parameters: name (str) – The name of test handle

Returns: Return the handle according to the name

Return type: Test

Example

```
>>> testHdl = dbHdl.test_by_name('test03')
>>> testHdl.type()
'npiCovTest'
```

type(test=None, is get enum=False)

Get type.

Parameters:

- **test** (Test) The test handle.
- **is_get_enum** (bool) Flag for the data type of return value.

Returns:

Return the string property if is get_enum is False; Otherwise, return the int property if is get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovDatabase'
>>> hdl.type(test, True)
0
```

name()

Get name

Returns: Return the name string by property:name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

class cov.Test

database handle()

Get database handle

Returns: Return the handle obtained by 1-1 method: database

Return type: cov.Database

Example

```
>>> hdl = ref.database_handle()
>>> hdl.type()
'npiCovDatabase'
```

assert_metric_handle()

Get assert metric handle.

Returns: Return the handle obtained by 1-1 method: assert metric

Return type: cov.AssertMetric

Example

```
>>> hdl = ref.assert_metric_handle()
>>> hdl.type()
'npiCovAssertMetric'
```

testbench_metric_handle()

Get testbench_metric handle.

Returns: Return the handle obtained by 1-1 method: testbench_metric

Return type: TestbenchMetric

```
>>> hdl = ref.testbench_metric_handle()
>>> hdl.type()
'npiCovTestbenchMetric'
```

test_info_handles()

Get test info handle list

Returns: Return the handle obtained by 1-many method: test info

Return type: list of cov. TestInfo

Example

```
>>> hdlList = ref.test_info_handles()
>>> hdlList[0].type()
'npiCovTestInfo'
```

program_handles()

Get program handle list

Returns: Return the handle list obtained by 1-many method: program

Return type: list of cov.Program

Example

```
>>> hdlList = ref.program_handles()
>>> hdlList[0].type()
'npiCovProgram'
```

power_data_handles()

Get power data handle list.

Returns: Return the handle list obtained by 1-many method: power data

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.power_data_handles() >>> hdlList[0].line_no()
'45'
```

unload_test()

Unload test handle.

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> testHdl.unload_test()
1
```

save_test(name)

Save test handle.

Parameters: name (str) – The test name to save

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> saveTest = testHdl.save_test('save_test')
>>> saveTest.type()
'npiCovTest'
```

load_exclude_file(name)

Load exclude file.

Parameters: name (str) – The exclude file name to load

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> testHdl.load_exclude_file('fifo.el')
1
```

save_exclude_file(name, mode)

Save exclude file.

Parameters:

- name (str) The exclude file name to load
- mode (str)

'w' - Write: The file will be overwritten.

'a' - Append: The excluded objects will be appended to the end of the

file if the file already exists

'ws' - Write with strict mode: Similar to 'w', but covered objects will not

be saved to exclude file even if they have been set excluded

'as' - Append with strict mode. Similar to 'a', but covered objects will not be saved to exclude file even if they have been set excluded

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> testHdl.save_exclude_file('fifo.el', 'ws')
1
```

unload_exclusion()

Unload exclusion.

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> testHdl.unload_exclusion()
1
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- **test**(Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovTest'
>>> hdl.type(test, True)
1
```

name()

Get name

Returns: Return the name string by property:name

Return type: str

```
>>> hdl.name()
'obj'
```

class cov.TestInfo

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovTestInfo'
>>> hdl.type(test, True)
48
```

name()

Get name

Returns: Return the name string by property:name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

Test

class cov. Test

database_handle()

Get database handle.

Returns: Return the handle obtained by 1-1 method: database

Return type: Database

Example

```
>>> hdl = ref.database_handle()
>>> hdl.type()
'npiCovDatabase'
```

testbench_metric_handle()

Get testbench_metric handle.

Returns: Return the handle obtained by 1-1 method: testbench_metric

Return type: TestbenchMetric

Example

```
>>> hdl = ref.testbench_metric_handle()
>>> hdl.type()
'npiCovTestbenchMetric'
```

power_data_handles()

Get power data handle list.

Returns: Return the handle list obtained by 1-many method: power_data

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.power_data_handles() >>> hdlList[0].line_no()
'/15'
```

unload_test()

Unload test handle.

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> testHdl.unload_test()
1
```

save_test(name)

Save test handle.

Parameters: name (str) – The test name to save

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> saveTest = testHdl.save_test('save_test')
>>> saveTest.type()
'npiCovTest'
```

load_exclude_file(name)

Load exclude file.

Parameters: name (str) – The exclude file name to load

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> testHdl.load_exclude_file('fifo.el')
1
```

save_exclude_file(name, mode)

Save exclude file.

Parameters:

- name (str) The exclude file name to load
- mode (str)

'w' - Write: The file will be overwritten.

'a' - Append: The excluded objects will be appended to the end of the file if the file already exists

'ws' - Write with strict mode: Similar to 'w', but covered objects will not be saved to exclude file even if they have been set excluded

'as' - Append with strict mode. Similar to 'a', but covered objects will not be saved to exclude file even if they have been set excluded

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> testHdl.save_exclude_file('fifo.el', 'ws')
1
```

unload_exclusion()

Unload exclusion.

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> testHdl.unload_exclusion()
1
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is _get_enum is False; Otherwise, return the int property if is _get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
11
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

```
>>> hdl.line_no(test)
1
```

size(test=None)

Get size.

Parameters: test (Test) - The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.size(test)
1
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.covered(test)
1
```

set_covered(test, value)

Set covered to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_covered(test, 0)
1
```

count(test=None)

Get count.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.count(test)
1
```

count_goal(test=None)

Get count goal.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.count_goal(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has status excluded at compile time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) - The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object

Parameters:: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type int

Example

```
>>> hdl.set_status(test, 0)
```

per_instance(test=None)

Get per instance.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.per_instance(test)
1
```

is_mda(test=None)

Get is mda.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.is_mda(test)
1
```

is_port(test=None)

Get is port.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.is_port(test)
1
```

is_event_condition(test=None)

Get is event condition.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

```
>>> hdl.is_event_condition(test)
1
```

severity(test=None)

Get severity.

Parameters: test (Test) - The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.severity(test)
1
```

category(test=None)

Get category.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.category(test)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

Instance

class cov.Instance

database_handle()

Get database handle.

Returns: Return the handle obtained by 1-1 method: database

Return type: Database

Example

```
>>> hdl = ref.database_handle()
>>> hdl.type()
'npiCovDatabase'
```

instance_handles()

Get instance handle list.

Returns: Return the handle list obtained by 1-many method: instance

Return type: list of cov.Instance

Example

```
>>> hdlList = ref.instance_handles()
>>> hdlList[0].type()
'npiCovInstance'
```

line_metric_handle()

Get line_metric handle.

Returns: Return the handle obtained by 1-1 method: line metric

Return type: cov.LineMetric

Example

```
>>> hdl = ref.line_metric_handle()
>>> hdl.type()
'npiCovLineMetric'
```

toggle_metric_handle()

Get toggle metric handle.

Returns: Return the handle obtained by 1-1 method: toggle metric

Return type: cov.ToggleMetric

```
>>> hdl = ref.toggle_metric_handle()
>>> hdl.type()
'npiCovToggleMetric'
```

fsm_metric_handle()

Get fsm metric handle.

Returns: Return the handle obtained by 1-1 method: fsm metric

Return type: cov.FsmMetric

Example

```
>>> hdl = ref.fsm_metric_handle()
>>> hdl.type()
'npiCovFsmMetric'
```

condition_metric_handle()

Get condition metric handle.

Returns: Return the handle obtained by 1-1 method: condition metric

Return type: cov.ConditionMetric

Example

```
>>> hdl = ref.condition_metric_handle()
>>> hdl.type()
'npiCovConditionMetric'
```

branch_metric_handle()

Get branch metric handle.

Returns: Return the handle obtained by 1-1 method: branch metric

Return type: cov.BranchMetric

Example

```
>>> hdl = ref.branch_metric_handle()
>>> hdl.type()
'npiCovBranchMetric'
```

assert_metric_handle()

Get assert metric handle.

Returns: Return the handle obtained by 1-1 method: assert_metric

Return type: cov.AssertMetric

```
>>> hdl = ref.assert_metric_handle()
>>> hdl.type()
'npiCovAssertMetric'
```

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
?
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

```
>>> hdl.line_no(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set status excluded(test, value)

Set status excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_status(test, 0)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

def_name()

Get def name.

Returns: Return the name string by property: def_name

Return type: str

Example

```
>>> hdl.def_name()
'mm'
```

def_info()

Get def info.

Returns: Return the name string by property: def_info

Return type: str

Example

```
>>> hdl.def_info()
'mm ( parameter mp=1 )'
```

full_name()

Get full name.

Returns: Return the name string by property: full name.

Return type: str

Example

```
>>> hdl.full_name()
'top.a.b.c'
```

file_name()

Get file name.

Returns: Return the name string by property: file name.

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

LineCoverage

class cov.LineMetric

instance_handle()

Get instance handle.

Returns: Return the handle obtained by 1-1 method: instance.

Return type: cov.Instance

Example

```
>>> hdl = ref.instance_handle()
>>> hdl.type()
'npiCovInstance'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov. Handle.

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle.
- is_get_enum (bool) Flag for the data type of return value.

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
4
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

full_name()

Get full name.

Returns: Return the name string by property: full name.

Return type: str

```
>>> hdl.full_name()
'top.a.b.c'
```

Block

class cov.Block

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

child handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov. Handle.

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

```
>>> hdl.type(test)
'npiCovBlock'
```

```
>>> hdl.type(test, True)
11
```

line_no(test=None)

Get line no.

Parameters: **test** (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.line_no(test)
1
```

coverable(test=None)

Get coverable.

Parameters: **test** (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set status unreachable(test, value)

Set status unreachable to object.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set status partially attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> hdl.set_status(test, 0)
1
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name.

Returns: Return the name string by property: file name.

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

StmtBin

class cov.StmtBin

covered_test_handles(test)

Get covered_test handle list.

Parameters: **test** (Test) – The test handle.

Returns: Return the handle list obtained by 1-many method: covered_test.

Return type: list of cov.CoveredTest

```
>>> hdlList = ref.covered_test_handles(test)
>>> hdlList[0].type()
'npiCovCoveredTest'
```

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is _get_enum is False; Otherwise, return the int property if is _get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
12
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.line_no(test)
1
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: **test** (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

set_covered(test, value)

Set covered to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set covered(test, 0)
```

1

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: **test** (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: **test** (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set status partially attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- **test** (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> hdl.set_status(test, 0)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name

Returns: Return the name string by property: file name

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

Toggle Coverage

class cov.ToggleMetric

instance_handle()

Get instance handle.

Returns: Return the handle obtained by 1-1 method: instance.

Return type: cov.Instance

Example

```
>>> hdl = ref.instance_handle()
>>> hdl.type()
'npiCovInstance'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov. Handle.

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
5
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

full_name()

Get full name

Returns: Return the name string by property: full_name.

Return type: str

```
>>> hdl.full_name()
'top.a.b.c'
```

Signal

class cov.Signal

scope_handle()

Get scope handle

Returns: Return the handle obtained by 1-1 method: scope

Return type: cov.Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

child handles()

Get child handle list

Returns: Return the handle list obtained by 1-many method: child

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns:Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
13
```

line_no(test=None)

Get line no.

Parameters: **test** (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.line_no(test)
1
```

size(test=None)

Get size.

Parameters: **test** (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.size(test)
```

coverable(test=None)

Get coverable.

Parameters: **test** (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set status covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set status attempted(test, value)

Set status attempted to object.

Parameters: **test** (Test)) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object.

Parameters: test (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_status(test, 0)
1
```

is_mda(test=None)

Get is mda.

Parameters: test (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.is_mda(test)
1
```

is_port(test=None)

Get is port.

Parameters: **test** (Test) – The test handle.

Returns: Return the int property.

Return type: int

```
>>> hdl.is_port(test)
1
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name

Returns: Return the name string by property: file_name

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

SignalBit

class cov.SignalBit

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov.Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns:Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
14
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.line_no(test)
1
```

size(test=None)

Get size.

Parameters: **test** (Test) – The test handle.

Returns: Return the int property.

Return type: int

```
>>> hdl.size(test)
1
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: **test** (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has status illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) - The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object.

Parameters: test (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: **test** (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_status(test, 0)
```

is_mda(test=None)

Get is mda.

Parameters: **test** (Test) – The test handle.

Returns: Return the int property.

Return type: int

```
>>> hdl.is_mda(test)
1
```

is_port(test=None)

Get is port.

Parameters: test (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.is_port(test)
1
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name

Returns: Return the name string by property: file name

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

Toggle Bin

class cov.ToggleBin

covered_test_handles(test)

Get covered_test handle list.

Parameters: **test** (Test) – The test handle.

Returns: Return the handle list obtained by 1-many method: covered test.

Return type: list of cov.CoveredTest.

Example

```
>>> hdlList = ref.covered_test_handles(test)
>>> hdlList[0].type()
'npiCovCoveredTest'
```

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value.

Returns:Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
15
```

toggle_type(test=None, is_get_enum=False)

Get toggle type

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value.

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True.

Return type: str or int

Example

```
>>> hdl.toggle_type(test)
'npiCovToggle10'
>>> hdl.toggle_type(test, True)
1
```

coverable(test=None)

Get coverable.

Parameters: **test** (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
```

set_covered(test, value)

Set covered to object.

Parameters:

- **test** (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_covered(test, 0)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: **test** (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has status excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_status(test, 0)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

Fsm Coverage

class cov.FsmMetric

instance_handle()

Get instance handle

Returns: Return the handle obtained by 1-1 method: instance

Return type: cov.Instance

```
>>> hdl = ref.instance_handle()
>>> hdl.type()
'npiCovInstance'
```

child_handles()

Get child handle list

Returns: Return the handle list obtained by 1-many method: child

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns:Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
6
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

```
>>> hdl.name()
'obj'
```

full_name()

Get full name.

Returns: Return the name string by property: full name.

Return type: str

Example

```
>>> hdl.full_name()
'top.a.b.c'
```

Fsm

class cov.Fsm

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov.Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test(Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
16
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.line_no(test)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name

Returns: Return the name string by property: file_name

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

States

class cov.States

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

child_handles()

Get child handle list

Returns: Return the handle list obtained by 1-many method: child

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- **test** (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns:Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
17
```

coverable(test=None)

Get coverable.

Parameters: **test** (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle.

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

status(test=None)

Get status.

Parameters: **test** (Test) – The test handle.

Returns: Return the int property

Return type: int

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle.

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) - The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object

Parameters: **test** (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has status partially excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_status(test, 0)
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

Transitions

class cov. Transitions

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov.Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- **test** (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
18
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_status(test, 0)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

Sequences

class cov. Sequences

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov.Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

child_handles()

Get child handle list

Returns: Return the handle list obtained by 1-many method: child

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'/65'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
10
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set status excluded at compile time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: **test** (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> hdl.set_status(test, 0)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

StateBin

class cov.StateBin

covered_test_handles(test)

Get covered test handle list.

Parameters: test (Test) – The test handle

Returns: Return the handle list obtained by 1-many method: covered_test.

Return type: list of cov.CoveredTest

Example

```
>>> hdlList = ref.covered_test_handles(test)
>>> hdlList[0].type()
'npiCovCoveredTest'
```

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov.Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is _get_enum is False; Otherwise, return the int property if is _get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
20
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.line_no(test)
1
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

set_covered(test, value)

Set covered to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_covered(test, 0)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.status(test)
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) - The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has status covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) - The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_status(test, 0)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name

Returns: Return the name string by property: file name

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

TransBin

class cov.TransBin

state_bin_handles()

Get state_bin handle list.

Returns: Return the handle list obtained by 1-many method: state_bin.

Return type: list of cov.StateBin

Example

```
>>> hdlList = ref.state_bin_handles()
>>> hdlList[0].type()
'npiCovStateBin'
```

covered_test_handles(test)

Get covered test handle list.

Parameters: test (Test) – The test handle

Returns: Return the handle list obtained by 1-many method: covered test.

Return type: list of cov.CoveredTest

Example

```
>>> hdlList = ref.covered_test_handles(test)
>>> hdlList[0].type()
'npiCovCoveredTest
```

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov.Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
21
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.line_no(test)
1
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

set_covered(test, value)

Set covered to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_covered(test, 0)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Return type: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) - The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_status(test, 0)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name

Returns: Return the name string by property: file name

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

SeqBin

class cov.SeqBin

state_bin_handles()

Get state_bin handle list

Returns: Return the handle list obtained by 1-many method: state_bin

Return type: list of cov.StateBin

Example

```
>>> hdlList = ref.state_bin_handles()
>>> hdlList[0].type()
'npiCovStateBin'
```

scope_handle()

Get scope handle

Returns: Return the handle obtained by 1-1 method: scope

Return type: cov. Handle

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
22
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

```
>>> hdl.covered(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: **test** (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) - The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set status excluded(test, value)

Set status excluded to object

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: **test** (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_status(test, 0)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name

Returns: Return the name string by property: file_name

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

ConditionMetric

class cov.ConditionMetric

instance_handle()

Get instance handle.

Returns: Return the handle obtained by 1-1 method: instance.

Return type: cov.Instance

```
>>> hdl = ref.instance_handle()
>>> hdl.type()
'npiCovInstance'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov.Handle.

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value.

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovLineMetric'
>>> hdl.type(test, True)
7
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

```
>>> hdl.name()
'obj'
```

full_name()

Get full name.

Returns: Return the name string by property: full name.

Return type: str

Example

```
>>> hdl.full_name()
'top.a.b.c'
```

Condition

class cov.Condition

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov.Handle.

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov. Handle.

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value.

Returns: Return the string property if is _get_enum is False; Otherwise, return the int property if is _get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
23
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.line_no(test)
1
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.status(test)
1
```

has status unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: **test** (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) - The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has status partially attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> hdl.set_status(test, 0)
1
```

is_event_condition(test=None)

Get is event condition

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.is_event_condition(test)
1
```

name()

Get name

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name.

Returns: Return the name string by property: file_name.

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

ConditionBin

class cov. ConditionBin

condition_term_handles()

Get condition_term handle list.

Returns: Return the handle list obtained by 1-many method: condition_term.

Return type: list of cov.ConditionTerm.

Example

```
>>> hdlList = ref.condition_term_handles()
>>> hdlList[0].type()
'npiCovConditionTerm'
```

covered_test_handles(test)

Get covered_test handle list.

Parameters: test (Test) – The test handle

Returns: Return the handle list obtained by 1-many method: covered test.

Return type: list of cov.CoveredTest.

Example

```
>>> hdlList = ref.covered_test_handles(test)
>>> hdlList[0].type()
'npiCovCoveredTest'
```

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov.Handle.

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

type(test=None, is get enum=False)

Get type.

Parameters:

- test (Test) The test handle
- **is_get_enum** (bool) Flag for the data type of return value.

Returns:

Return the string property if is get_enum is False; Otherwise, return the int property if is get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovStmtBin'
>>> hdl.type(test, True)
24
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

```
>>> hdl.covered(test)
1
```

set_covered(test, value)

Set covered to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> hdl.set_covered(test, 0)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has status excluded at compile time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: **test** (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object.

Parameters: **test** (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set.

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_status(test, 0)
1
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

ConditionTerm

class cov.ConditionTerm

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is get_enum (bool) Flag for the data type of return value.

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovStmtBin'
>>> hdl.type(test, True)
25
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

Branch Metric

class cov.BranchMetric

instance_handle()

Get instance handle.

Returns: Return the handle obtained by 1-1 method: instance.

Return type: cov.Instance

Example

```
>>> hdl = ref.instance_handle()
>>> hdl.type()
'npiCovInstance'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov.Handle.

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value.

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
8
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

full_name()

Get full name.

Returns: Return the name string by property: full name.

Return type: str

```
>>> hdl.full_name()
'top.a.b.c'
```

Branch

class cov.Branch

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

```
>>> hdl.type(test)
'npiCovBlock'
```

```
>>> hdl.type(test, True)
26
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.line_no(test)
1
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set status unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) - The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set status partially attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- **test** (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> hdl.set_status(test, 0)
1
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name

Returns: Return the name string by property: file name.

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

BranchBin

class cov.BranchBin

branch_term_handles()

Get branch_term handle list.

Returns: Return the handle list obtained by 1-many method: branch_term.

Return type: list of cov.BranchTerm

Example

```
>>> hdlList = ref.branch_term_handles()
>>> hdlList[0].type()
'npiCovBranchTerm'
```

covered_test_handles(test)

Get covered test handle list.

Parameters: test (Test) – The test handle

Returns: Return the handle list obtained by 1-many method: covered_test.

Return type: list of cov.CoveredTest.

Example

```
>>> hdlList = ref.covered_test_handles(test)
>>> hdlList[0].type()
'npiCovCoveredTest'
```

scope_handle()

Get scope handle

Returns: Return the handle obtained by 1-1 method: scope

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- **is_get_enum** (bool) Flag for the data type of return value.

Returns: Return the string property if is _get_enum is False; Otherwise, return the int property if is _get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
27
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.line_no(test)
1
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

set_covered(test, value)

Set covered to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> hdl.set_covered(test, 0)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has status excluded at compile time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has status excluded at report time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_status(test, 0)
1
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name

Returns: Return the name string by property: file_name

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

BranchTerm

class cov.BranchTerm

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- **is_get_enum** (bool) Flag for the data type of return value.

Returns: Return the string property if is _get_enum is False; Otherwise, return the int property if is _get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
28
```

value(test=None, is_get_enum=False)

Get value

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value.

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True.

Return type: str or int

Example

```
>>> hdl.value(test)
'1'
>>> hdl.value(test, True)
1
```

line_no(test=None)

Get line no.

Parameters: **test** (Test) – The test handle

Returns: Return the int property.

Return type: int

```
>>> hdl.line_no(test)
1
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name.

Returns: Return the name string by property: file_name

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

AssertMetric

class cov.AssertMetric

instance_handle()

Get instance handle.

Returns: Return the handle obtained by 1-1 method: instance.

Return type: cov.Instance

Example

```
>>> hdl = ref.instance_handle()
>>> hdl.type()
'npiCovInstance'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
9
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

full_name()

Get full name.

Returns: Return the name string by property: full name

Return type: str

```
>>> hdl.full_name()
'top.a.b.c'
```

Assert

class cov .Assert

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

child handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value.

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True.

Return type: str or int

```
>>> hdl.type(test)
'npiCovBlock'
```

```
>>> hdl.type(test, True)
29
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.line_no(test)
```

coverable(test=None)

Get coverable

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.covered(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set status unreachable(test, value)

Set status unreachable to object.

Parameters: **test** (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) - The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to objec

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set status partially attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- **test** (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> hdl.set_status(test, 0)
1
```

severity(test=None)

Get severity.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.severity(test)
1
```

category(test=None)

Get category.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.category(test)
1
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name.

Returns: Return the name string by property: full_name.

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

CoverProperty

class cov.CoverProperty

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- **test** (Test) The test handle
- **is_get_enum** (bool) Flag for the data type of return value.

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
44
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.line_no(test)
1
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

```
>>> hdl.covered(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: **test** (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) - The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set status excluded(test, value)

Set status excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_status(test, 0)
1
```

severity(test=None)

Get severity.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.severity(test)
1
```

category(test=None)

Get category

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.category(test)
1
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

```
>>> hdl.name()
'obj'
```

file_name()

Get file name.

Returns: Return the name string by property: file_name.

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

CoverSequence

class cov.CoverSequence

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov.Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value.

Returns: Return the string property if is _get_enum is False; Otherwise, return the int property if is _get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
45
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.line_no(test)
1
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.status(test)
1
```

has status unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: **test** (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: **test** (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) - The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has status partially attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0.

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set.

Returns: Return 1 if success; Otherwise, return 0.

Return type: int

Example

```
>>> hdl.set_status(test, 0)
1
```

severity(test=None)

Get severity.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.severity(test)
1
```

category(test=None)

Get category.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.category(test)
1
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name.

Returns: Return the name string by property: file_name.

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

SuccessBin

class cov. SuccessBin

covered_test_handles(test)

Get covered_test handle list.

Parameters: test (Test) – The test handle

Returns: Return the handle list obtained by 1-many method: covered test.

Return type: list of cov.CoveredTest

Example

```
>>> hdlList = ref.covered_test_handles(test)
>>> hdlList[0].type()
'npiCovCoveredTest'
```

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov. Handle

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value.

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
30
```

count(test=None)

Get count.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.count(test)
1
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

```
>>> hdl.name()
'obj'
```

AttemptBin

class cov. AttemptBin

covered_test_handles(test)

Get covered_test handle list.

Parameters: test (Test) – The test handle

Returns: Return the handle list obtained by 1-many method: covered test.

Return type: list of cov.CoveredTest.

Example

```
>>> hdlList = ref.covered_test_handles(test)
>>> hdlList[0].type()
'npiCovCoveredTest'
```

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
31
```

count(test=None)

Get count.

Parameters: test (Test) - The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.count(test)
1
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

FailureBin

class cov. FailureBin

covered_test_handles(test)

Get covered test handle list.

Parameters: **test** (Test) – The test handle

Returns: Return the handle list obtained by 1-many method: covered test.

Return type: list of cov.CoveredTest.

```
>>> hdlList = ref.covered_test_handles(test)
>>> hdlList[0].type()
'npiCovCoveredTest'
```

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value.

Returns: Return the string property if is _get_enum is False; Otherwise, return the int property if is _get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
32
```

count(test=None)

Get count.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

```
>>> hdl.count(test)
1
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

VacuousBin

class cov. Vacuous Bin

covered_test_handles(test)

Get covered test handle list.

Parameters: test (Test) – The test handle

Returns: Return the handle list obtained by 1-many method: covered_test.

Return type: list of cov.CoveredTest

Example

```
>>> hdlList = ref.covered_test_handles(test)
>>> hdlList[0].type()
'npiCovCoveredTest'
```

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov.Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is _get_enum is False; Otherwise, return the int property if is _get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
33
```

count(test=None)

Get count.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.count(test)
1
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

```
>>> hdl.name()
'obj'
```

IncompleteBin

class cov.IncompleteBin

covered_test_handles(test)

Get covered_test handle list.

Parameters: test (Test) – The test handle

Returns: Return the handle list obtained by 1-many method: covered test.

Return type: list of cov.CoveredTest

Example

```
>>> hdlList = ref.covered_test_handles(test)
>>> hdlList[0].type()
'npiCovCoveredTest'
```

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
34
```

count(test=None)

Get count.

Parameters: test (Test) - The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.count(test)
1
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

FirstmatchBin

class cov.FirstmatchBin

covered_test_handles(test)

Get covered test handle list.

Parameters: **test** (Test) – The test handle

Returns: Return the handle list obtained by 1-many method: covered test.

Return type: list of cov.CoveredTest.

```
>>> hdlList = ref.covered_test_handles(test)
>>> hdlList[0].type()
'npiCovCoveredTest'
```

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value.

Returns: Return the string property if is _get_enum is False; Otherwise, return the int property if is _get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
46
```

count(test=None)

Get count.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

```
>>> hdl.count(test)
1
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

TestbenchMetric

class cov.TestbenchMetric

test_handle()

Get test handle.

Returns: Return the handle obtained by 1-1 method: test

Return type: Test

Example

```
>>> hdl = ref.test_handle()
>>> hdl.type()
'npiCovTest'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value.

Returns: Return the string property if is _get_enum is False; Otherwise, return the int property if is _get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
10
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

Covergroup

class cov.Covergroup

cover_instance_handles()

Get cover instance handle list.

Returns: Return the handle list obtained by 1-many method: cover_instance.

Return type: list of cov.CoverInstance.

```
>>> hdlList = ref.cover_instance_handles()
>>> hdlList[0].type()
'npiCovCoverInstance'
```

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov. Handle.

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov. Handle.

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is get enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value.

Returns: Return the string property if is _get_enum is False; Otherwise, return the int property if is _get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
35
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.line_no(test)
1
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has status partially excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_status(test, 0)
1
```

per_instance(test=None)

Get per instance.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.per_instance(test)
1
```

weight(test=None)

Get weight

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.weight(test)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name

Returns: Return the name string by property: file name

Return type: str

```
>>> hdl.file_name()
'/u/john_doe/test/test.v'
```

CoverInstance

class cov.CoverInstance

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

child handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

```
>>> hdl.type(test)
'npiCovBlock'
```

```
>>> hdl.type(test, True)
40
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.line_no(test)
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set status unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set status covered(test, value)

Set status covered to object.

Parameters: **test** (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set status partially attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- **test** (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> hdl.set_status(test, 0)
1
```

weight(test=None)

Get weight

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.weight(test)
1
```

goal(test=None)

Get goal

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.goal(test)
1
```

at_least(test=None)

Get at least

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.at_least(test)
1
```

auto_bin_max(test=None)

Get auto bin max

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.auto_bin_max(test)
1
```

cross_num_print_missing(test=None)

Get cross num print missing

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.cross_num_print_missing(test)
1
```

detect_overlap(test=None)

Get detect overlap

Parameters: test (Test) - The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.detect_overlap(test)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

```
>>> hdl.name()
'obj'
```

file_name()

Get file name.

Returns: Return the name string by property: file name

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

comment()

Get comment

Returns: Return the name string by property: comment

Return type: str

Example

```
>>> hdl.comment()
'obj'
```

Cross

class cov.Cross

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov.Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov. Handle.

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45''
```

component handles()

Get component handle list.

Returns: Return the handle list obtained by 1-many method: component.

Return type: list of cov.Handle.

Example

```
>>> hdlList = ref.component_handles() >>> hdlList[0].line_no()
'45''
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is _get_enum is False; Otherwise, return the int property if is _get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
37
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

```
>>> hdl.line_no(test)
1
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) - The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set status attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_status(test, 0)
1
```

weight(test=None)

Get weight

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

```
>>> hdl.weight(test)
1
```

goal(test=None)

Get goal

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.goal(test)
1
```

at_least(test=None)

Get at least

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.at_least(test)
1
```

cross_num_print_missing(test=None)

Get cross num print missing

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.cross_num_print_missing(test)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

```
>>> hdl.name()
'obj'
```

file_name()

Get file name

Returns: Return the name string by property: file name

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

comment()

Get comment

Returns: Return the name string by property: comment

Return type: str

Example

```
>>> hdl.comment()
'obj'
```

Coverpoint

class cov.Coverpoint

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov.Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child.

Return type: list of cov. Handle.

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is get_enum (bool) Flag for the data type of return value.

Returns: Return the string property if is _get_enum is False; Otherwise, return the int property if is _get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
36
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.line_no(test)
1
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

status(test=None)

Get status.

Parameters: **test** (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status excluded at compile time(testHdl)
```

1

has status covered(test)

Check if status covered is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has_status_proven(test)

Check if status proven is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) - The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set status partially excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- test (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_status(test, 0)
1
```

weight(test=None)

Get weight

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.weight(test)
1
```

goal(test=None)

Get goal

Parameters: test (Test) - The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.goal(test)
1
```

at_least(test=None)

Get at least

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.at_least(test)
1
```

auto_bin_max(test=None)

Get auto bin max

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.auto_bin_max(test)
1
```

detect_overlap(test=None)

Get detect overlap

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

```
>>> hdl.detect_overlap(test)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name

Returns: Return the name string by property: file_name

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

comment()

Get comment

Returns: Return the name string by property: comment

Return type: str

Example

```
>>> hdl.comment()
'obj'
```

CoverBin

class cov.CoverBin

covered_test_handles(test)

Get covered test handle list.

Parameters: test (Test) – The test handle

Returns: Return the handle list obtained by 1-many method: covered_test.

Return type: list of cov.CoveredTest.

Example

```
>>> hdlList = ref.covered_test_handles(test)
>>> hdlList[0].type()
'npiCovCoveredTest'
```

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope.

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
38
```

coverable(test=None)

Get coverable.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.coverable(test)
1
```

covered(test=None)

Get covered.

Parameters: test (Test) – The test handle

Returns: Return the int property.

Return type: int

Example

```
>>> hdl.covered(test)
1
```

count(test=None)

Get count.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.count(test)
1
```

count_goal(test=None)

Get count goal.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.count_goal(test)
1
```

status(test=None)

Get status.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.status(test)
1
```

has_status_unreachable(test)

Check if status unreachable is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

set_status_unreachable(test, value)

Set status unreachable to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_unreachable(testHdl)
1
```

has_status_illegal(test)

Check if status illegal is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

```
>>> binHdl.status_illegal(testHdl)
1
```

set_status_illegal(test, value)

Set status illegal to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_illegal(testHdl)
1
```

has_status_excluded_at_compile_time(test)

Check if status excluded at compile time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

set_status_excluded_at_compile_time(test, value)

Set status excluded at compile time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_compile_time(testHdl)
1
```

has_status_covered(test)

Check if status covered is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

set_status_covered(test, value)

Set status covered to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_covered(testHdl)
1
```

has status proven(test)

Check if status proven is set.

Parameters: **test** (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_proven(testHdl)
1
```

set_status_proven(test, value)

Set status proven to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

```
>>> binHdl.status_proven(testHdl)
1
```

has_status_excluded_at_report_time(test)

Check if status excluded at report time is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

set_status_excluded_at_report_time(test, value)

Set status excluded at report time to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded_at_report_time(testHdl)
1
```

has_status_attempted(test)

Check if status attempted is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

set_status_attempted(test, value)

Set status attempted to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_attempted(testHdl)
1
```

has_status_excluded(test)

Check if status excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

set_status_excluded(test, value)

Set status excluded to object

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_excluded(testHdl)
1
```

has_status_partially_excluded(test)

Check if status partially excluded is set.

Parameters: test (Test) – The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

set_status_partially_excluded(test, value)

Set status partially excluded to object.

Parameters: test (Test) – The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_excluded(testHdl)
1
```

has_status_partially_attempted(test)

Check if status partially attempted is set.

Parameters: test (Test) - The test handle

Returns: Return 1 if the object does not have the status; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status_partially_attempted(test, value)

Set status partially attempted to object.

Parameters: test (Test) - The test handle

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> binHdl.status_partially_attempted(testHdl)
1
```

set_status(test, value)

Set status to object.

Parameters:

- **test** (Test) The test handle
- value (int) The value to set

Returns: Return 1 if success; Otherwise, return 0

Return type: int

Example

```
>>> hdl.set_status(test, 0)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

PowerDomain

class cov.PowerDomain

test_handle()

Get test handle.

Returns: Return the handle obtained by 1-1 method: test

Return type: Test

Example

```
>>> hdl = ref.test_handle()
>>> hdl.type()
'npiCovTest'
```

power_domain_handles()

Get power domain handle list.

Returns: Return the handle list obtained by 1-many method: power domain

Return type: list of cov.PowerDomain

```
>>> hdlList = ref.power_domain_handles()
>>> hdlList[0].type()
'npiCovPowerDomain'
```

power_measure handle()

Get power measure handle list.

Returns: Return the handle list obtained by 1-many method: power measure.

Return type: list of cov.PowerMeasure

Example

```
>>> hdlList = ref.power_measure_handles()
>>> hdlList[0].type()
'npiCovPowerMeasure'
```

scope_handle()

Get scope handle.

Returns: Return the handle obtained by 1-1 method: scope

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is _get_enum is False; Otherwise, return the int property if is _get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
42
```

line_no(test=None)

Get line no.

Parameters: test (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.line_no(test)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

Example

```
>>> hdl.name()
'obj'
```

file_name()

Get file name.

Returns: Return the name string by property: file_name

Return type: str

Example

```
>>> hdl.file_name()
'/u/john doe/test/test.v'
```

PowerMeasure

class cov.PowerMeasure

power_metric_handle()

Get power_metric handle

Returns: Return the handle obtained by 1-1 method: power_metric

Return type: cov.PowerMetric

```
>>> hdl = ref.power_metric_handle()
>>> hdl.type()
'npiCovPowerMetric'
```

scope_handle()

Get scope handle

Returns: Return the handle obtained by 1-1 method: scope

Return type: cov. Handle

Example

```
>>> hdl = ref.scope_handle()
>>> hdl.line_no()
'35'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
43
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

```
>>> hdl.name()
'obj'
```

PowerMetric

class cov . PowerMetric

test_handle()

Get test handle.

Returns: Return the handle obtained by 1-1 method: test

Return type: Test

Example

```
>>> hdl = ref.test_handle()
>>> hdl.type()
'npiCovTest'
```

power_measure_handle()

Get power_measure handle.

Returns: Return the handle obtained by 1-1 method: power measure

Return type: cov.PowerMeasure

Example

```
>>> hdl = ref.power_measure_handle()
>>> hdl.type()
'npiCovPowerMeasure'
```

child_handles()

Get child handle list.

Returns: Return the handle list obtained by 1-many method: child

Return type: list of cov. Handle

Example

```
>>> hdlList = ref.child_handles() >>> hdlList[0].line_no()
'45'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value

Returns: Return the string property if is _get_enum is False; Otherwise, return the int property if is _get_enum is True

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovLineMetric'
>>> hdl.type(test, True)
41
```

name()

Get name.

Returns: Return the name string by property: name.

Return type: str

Example

```
>>> hdl.name()
'obj'
```

Covered Test

class cov.CoveredTest

test_handle()

Get test handle.

Returns: Return the handle obtained by 1-1 method: test

Return type: Test

```
>>> hdl = ref.test_handle()
>>> hdl.type()
'npiCovTest'
```

type(test=None, is_get_enum=False)

Get type.

Parameters:

- test (Test) The test handle
- is_get_enum (bool) Flag for the data type of return value.

Returns: Return the string property if is_get_enum is False; Otherwise, return the int property if is_get_enum is True.

Return type: str or int

Example

```
>>> hdl.type(test)
'npiCovBlock'
>>> hdl.type(test, True)
47
```

count(test=None)

Get count.

Parameters: **test** (Test) – The test handle

Returns: Return the int property

Return type: int

Example

```
>>> hdl.count(test)
1
```

name()

Get name.

Returns: Return the name string by property: name

Return type: str

```
>>> hdl.name()
'obj'
```

5

L₀ APIs

Following are the L0 APIs in Coverage module:

API	Description
cov.open(vdb_dir)	Open coverage vdb to get database handle.
cov.merge_test(dst_test, src_test, map_file=None)	Merge test handles.

cov.open(vdb_dir)

open coverage vdb to get database handle.

Parameters: **vbb_dir** (str) – the vdb name. For example, simv.vdb.

Returns: Return the database handle according to the vdb name.

Return type: Database

Example

```
>>> db = cov.open('simv.vdb')
>>> db.name()
'simv.vdb'
```

cov.merge_test(dst_test, src_test, map_file=None)

Merge test handles.

Parameters:

- dst_test(Test) the destination test.
- **src_test**(Test) the source test.
- map_file (str) the mapping file name for merging tests (optional).

Returns: Return the merged test.

Return type: Test

```
>>> merged_test = cov.merge_test(dst_test, src_test, 'mapping.file')
>>> merged_test.type()
'npiCovTest'
```