CISS450: Artificial Intelligence
Lecture 4: None

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Agenda

- The special `None` object

None

- There is a type called `NoneType`
- There is only one object called `None` of type `NoneType`
- `None` is used for representing non-existing value
- However NoneType is not available in Python3 other than by using

```
type(None)
```

Function

- On return from a function without explicitly returning a value, `None` is in fact returned:

```
def f():
    pass


x = f()
print(x)
```

- The output is:

```
None
```

Function

- You can use `None` to indicate an error:

```
def divide(a, b):
    if b != 0:
        return a / b
    else:
        return None
```

but it's probably best to use exceptions (see much later).

Operators and Bool

- You can use `==` and `!=` on `None` with other values
- `bool(None)` is `False`