eth-typing Documentation

Release 2.0.0

The eth-typing contributors

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Contents

Common type annotations for ethereum python packages.

CHAPTER 1

Contents

1.1 Types

The following types are available from the `eth_typing` module.

i.e.

```
from eth_typing import TypeStr
```

1.1.1 ABI

TypeStr

String representation of a data type.

```
TypeStr = str
```

Decodable

Binary data to be decoded.

```
Decodable = Union[bytes, bytearray]
```

1.1.2 Enumerables

ForkName

Class that contains the different names used to represent hard forks on the Ethereum network.

```
class ForkName:
    Frontier = 'Frontier'
    Homestead = 'Homestead'
    EIP150 = 'EIP150'
    EIP158 = 'EIP158'
    Byzantium = 'Byzantium'
    Constantinople = 'Constantinople'
    Metropolis = 'Metropolis'
```

1.1.3 EthPM

ContractName

Any string conforming to the regular expression `[a-zA-Z][a-zA-Z0-9_]{0,255}`.

```
ContractName = NewType('ContractName', str)
```

URI

Any string that represents a URI.

```
URI = NewType('URI', str)
```

1.1.4 EVM

Address

Any bytestring representing a canonical address.

```
Address = NewType('Address', bytes)
```

HexAddress

Any string representing a hex encoded address.

```
HexAddress = NewType('HexAddress', str)
```

ChecksumAddress

Any *HexAddress* that is formatted according to ERC55.

```
ChecksumAddress = NewType('ChecksumAddress', HexAddress)
```

AnyAddress

Any of *Address*, *HexAddress*, *ChecksumAddress*.

```
AnyAddress = TypeVar('AnyAddress', Address, HexAddress, ChecksumAddress)
```

Hash32

Any 32 byte hash.

```
Hash32 = NewType('Hash32', bytes)
```

BlockNumber

Any integer that represents a valid block number on a chain.

```
BlockNumber = NewType('BlockNumber', int)
```

BlockIdentifier

Either a 32 byte hash or an integer block number

```
BlockIdentifier = Union[Hash32, BlockNumber]
```

1.1.5 Encodings

HexStr

Any string that is hex encoded.

```
HexStr = NewType('HexStr', str)
```

Primitives

Any of *bytes*, *int*, or *bool* used as the *Primitive* arg for conversion utils in ETH-Utils.

```
Primitives = Union[bytes, int, bool]
```

1.2 Release Notes

1.2.1 v1.0.0

- Added annotations from `py-evm`.

1.2.2 v0.3.1

- Removed `eth-utils` requirement.

1.2.3 v0.3.0

- Updated `eth-utils` requirement.

1.2.4 v0.2.0

- Launched repository, claimed names for pip, RTD, github, etc.

CHAPTER 2

Indices and tables

- genindex
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