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Legende: Links and Buttons

ein Link	Gleicher Tab. Link innerhalb dieses Dokumentes
	Neuer Tab. Die offizielle Micropython Referenz des entsprechenden Modules wird geöffnet
	Neuer Tab. Die offizielle Micropython Referenz wird geöffnet und das entsprechende Module highlighted
	Neuer Tab. Die ESP32 Micropython Referenz wird geöffnet und das entsprechende Module highlighted
	Neuer Tab. Interessante Seite in Bezug zum entsprechenden Micropython Modul wird geöffnet
	Neuer Tab. Interessante Seite wird geöffnet und das entsprechende Module highlighted
	Neuer Tab. YouTube Clip, welche das Thema behandelt

Overview of all modules

_boot	ds18x20	network	ubinascii	uos	usys
_onewire	esp	ntptime	ucollections	upip	utime
_thread	esp32	onewire	ucryptolib	upip_utarfile	utimeq
_uasyncio	flashbdev	s2mini	uctypes	uplatform	uwebsocket
_webrepl	framebuf	uarray	uerrno	urandom	uzlib
apa106	gc	uasyncio/core	uhashlib	ure	webrepl
btree	inisetup	uasyncio/event	uheapq	uselect	webrepl_setup
builtins	math	uasyncio/funcs	uio	usocket	websocket_helper
cmath	micropython	uasyncio/lock	ujson	ussl	
dht	neopixel	uasyncio/stream	umachine	ustruct	

_boot

- `object <module '_boot' from '_boot.py'> is of type module`
- `uos -- <module 'uos'>`
- `__name__ -- _boot`
- `gc -- <module 'gc'>`
- `__file__ -- _boot.py`

- `bdev -- <Partition type=1, subtype=129, address=2097152, size=2097152, label=vfs, encrypted=0>`

--> [Overview](#)

`_onewire`

- object `<module 'onewire'>` is of type module
- `__name__ -- onewire`
- `reset -- <function>`
- `readbit -- <function>`
- `readbyte -- <function>`
- `writebit -- <function>`
- `writebyte -- <function>`
- `crc8 -- <function>`

--> [Overview](#)

`_thread`

MP Home

- object `<module '_thread'>` is of type module
- `__name__ -- _thread`
- `LockType -- <class 'lock'>`
- `get_ident -- <function>`
- `stack_size -- <function>`
- `start_new_thread -- <function>`
- `exit -- <function>`
- `allocate_lock -- <function>`

--> [Overview](#)

`_thread --> LockType`

- `__enter__ -- <function>`
- `__exit__ -- <function>`
- `acquire -- <function>`
- `locked -- <function>`
- object `<class 'lock'>` is of type type
- `release -- <function>`

--> [_thread](#)

--> [Overview](#)

`_uasyncio`

- object <module '_uasyncio'> is of type module
- `__name__` -- `_uasyncio`
- `TaskQueue` -- <class 'TaskQueue'>
- `Task` -- <class 'Task'>

--> [Overview](#)

`_uasyncio` --> `TaskQueue`

- object <class 'TaskQueue'> is of type type
- `peek` -- <function>
- `pop` -- <function>
- `push` -- <function>
- `remove` -- <function>

--> `_uasyncio`

--> [Overview](#)

`_uasyncio` --> `Task`

- object <class 'Task'> is of type type

--> `_uasyncio`

--> [Overview](#)

`_webrepl`

- object <module '_webrepl'> is of type module
- `__name__` -- `_webrepl`
- `_webrepl` -- <class '_webrepl'>
- `password` -- <function>

--> [Overview](#)

`_webrepl` --> `_webrepl`

- `close` -- <function>
- object <class '_webrepl'> is of type type
- `read` -- <function>
- `readinto` -- <function>
- `write` -- <function>

--> `_webrepl`

--> [Overview](#)

apa106

MP ESP32 highlight

- `object <module 'apa106' from 'apa106.py'> is of type module`
- `APA106 -- <class 'APA106'>`
- `NeoPixel -- <class 'NeoPixel'>`
- `__name__ -- apa106`
- `__file__ -- apa106.py`

--> [Overview](#)

apa106 --> APA106

MP ESP32 highlight

- `ORDER -- (0, 1, 2, 3)`
- `__module__ -- apa106`
- `__qualname__ -- APA106`
- `object <class 'APA106'> is of type type`

--> [apa106](#)

--> [Overview](#)

apa106 --> NeoPixel

MP ESP32 highlight

- `ORDER -- (1, 0, 2, 3)`
- `__getitem__ -- <function __getitem__ at 0x3fd8fffc0>`
- `__init__ -- <function __init__ at 0x3fd8ffd0>`
- `__len__ -- <function __len__ at 0x3fd8fff0>`
- `__module__ -- neopixel`
- `__qualname__ -- NeoPixel`
- `__setitem__ -- <function __setitem__ at 0x3fd8ffb0>`
- `fill -- <function fill at 0x3fd90000>`
- `object <class 'NeoPixel'> is of type type`
- `write -- <function write at 0x3fd90010>`

--> [apa106](#)

--> [Overview](#)

btrees

MP Home

- object <module 'btree'> is of type module
- __name__ -- btree
- open -- <function>
- INCL -- 1
- DESC -- 2

--> [Overview](#)

builtins

MP Home

- object <module 'builtins'> is of type module
- __name__ -- builtins
- __build_class__ -- <function>
- __import__ -- <function>
- __repl_print__ -- <function>
- bool -- <class 'bool'>
- bytes -- <class 'bytes'>
- bytearray -- <class 'bytearray'>
- complex -- <class 'complex'>
- dict -- <class 'dict'>
- enumerate -- <class 'enumerate'>
- filter -- <class 'filter'>
- float -- <class 'float'>
- frozenset -- <class 'frozenset'>
- int -- <class 'int'>
- list -- <class 'list'>
- map -- <class 'map'>
- memoryview -- <class 'memoryview'>
- object -- <class 'object'>
- property -- <class 'property'>
- range -- <class 'range'>
- reversed -- <class 'reversed'>
- set -- <class 'set'>
- slice -- <class 'slice'>
- str -- <class 'str'>
- super -- <class 'super'>
- tuple -- <class 'tuple'>
- type -- <class 'type'>
- zip -- <class 'zip'>
- classmethod -- <class 'classmethod'>
- staticmethod -- <class 'staticmethod'>
- Ellipsis -- Ellipsis
- NotImplemented -- NotImplemented
- abs -- <function>

- `all` -- <function>
- `any` -- <function>
- `bin` -- <function>
- `callable` -- <function>
- `compile` -- <function>
- `chr` -- <function>
- `delattr` -- <function>
- `dir` -- <function>
- `divmod` -- <function>
- `eval` -- <function>
- `exec` -- <function>
- `execfile` -- <function>
- `getattr` -- <function>
- `setattr` -- <function>
- `globals` -- <function>
- `hasattr` -- <function>
- `hash` -- <function>
- `help` -- <function>
- `hex` -- <function>
- `id` -- <function>
- `input` -- <function>
- `isinstance` -- <function>
- `issubclass` -- <function>
- `iter` -- <function>
- `len` -- <function>
- `locals` -- <function>
- `max` -- <function>
- `min` -- <function>
- `next` -- <function>
- `oct` -- <function>
- `open` -- <function>
- `ord` -- <function>
- `pow` -- <function>
- `print` -- <function>
- `repr` -- <function>
- `round` -- <function>
- `sorted` -- <function>
- `sum` -- <function>
- `BaseException` -- <class 'BaseException'>
- `ArithmeticError` -- <class 'ArithmeticError'>
- `AssertionError` -- <class 'AssertionError'>
- `AttributeError` -- <class 'AttributeError'>
- `EOFError` -- <class 'EOFError'>
- `Exception` -- <class 'Exception'>
- `GeneratorExit` -- <class 'GeneratorExit'>
- `ImportError` -- <class 'ImportError'>

- `IndentationError` -- `<class 'IndentationError'>`
- `IndexError` -- `<class 'IndexError'>`
- `KeyboardInterrupt` -- `<class 'KeyboardInterrupt'>`
- `KeyError` -- `<class 'KeyError'>`
- `LookupError` -- `<class 'LookupError'>`
- `MemoryError` -- `<class 'MemoryError'>`
- `NameError` -- `<class 'NameError'>`
- `NotImplementedError` -- `<class 'NotImplementedError'>`
- `OSError` -- `<class 'OSError'>`
- `OverflowError` -- `<class 'OverflowError'>`
- `RuntimeError` -- `<class 'RuntimeError'>`
- `StopAsyncIteration` -- `<class 'StopAsyncIteration'>`
- `StopIteration` -- `<class 'StopIteration'>`
- `SyntaxError` -- `<class 'SyntaxError'>`
- `SystemExit` -- `<class 'SystemExit'>`
- `TypeError` -- `<class 'TypeError'>`
- `UnicodeError` -- `<class 'UnicodeError'>`
- `ValueError` -- `<class 'ValueError'>`
- `ViperTypeError` -- `<class 'ViperTypeError'>`
- `ZeroDivisionError` -- `<class 'ZeroDivisionError'>`

--> [Overview](#)

builtins --> bool

MP Home highlight

- `object <class 'bool'>` is of type `type`

--> [builtins](#)

--> [Overview](#)

builtins --> bytes

MP Home highlight

- `center` -- `<function>`
- `count` -- `<function>`
- `decode` -- `<function>`
- `endswith` -- `<function>`
- `find` -- `<function>`
- `format` -- `<function>`
- `index` -- `<function>`
- `isalpha` -- `<function>`
- `isdigit` -- `<function>`
- `islower` -- `<function>`
- `isspace` -- `<function>`

- `isupper -- <function>`
- `join -- <function>`
- `lower -- <function>`
- `lstrip -- <function>`
- `object <class 'bytes'> is of type type`
- `partition -- <function>`
- `replace -- <function>`
- `rfind -- <function>`
- `rindex -- <function>`
- `rpartition -- <function>`
- `rsplit -- <function>`
- `rstrip -- <function>`
- `split -- <function>`
- `splitlines -- <function>`
- `startswith -- <function>`
- `strip -- <function>`
- `upper -- <function>`

--> [builtins](#)

--> [Overview](#)

builtins --> bytearray

MP Home highlight

- `append -- <function>`
- `decode -- <function>`
- `extend -- <function>`
- `object <class 'bytearray'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> complex

MP Home highlight

- `object <class 'complex'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> dict

MP Home highlight

- `__delitem__` -- <function>
- `__getitem__` -- <function>
- `__setitem__` -- <function>
- `clear` -- <function>
- `copy` -- <function>
- `fromkeys` -- <classmethod>
- `get` -- <function>
- `items` -- <function>
- `keys` -- <function>
- `object` <class 'dict'> is of type type
- `pop` -- <function>
- `popitem` -- <function>
- `setdefault` -- <function>
- `update` -- <function>
- `values` -- <function>

--> [builtins](#)

--> [Overview](#)

builtins --> enumerate

MP Home highlight

- `object` <class 'enumerate'> is of type type

--> [builtins](#)

--> [Overview](#)

builtins --> filter

MP Home highlight

- `object` <class 'filter'> is of type type

--> [builtins](#)

--> [Overview](#)

builtins --> float

MP Home highlight

- `object` <class 'float'> is of type type

--> [builtins](#)

--> [Overview](#)

builtins --> frozenset

MP Home highlight

- `__contains__` -- <function>
- `copy` -- <function>
- `difference` -- <function>
- `intersection` -- <function>
- `isdisjoint` -- <function>
- `issubset` -- <function>
- `issuperset` -- <function>
- `object` <class 'frozenset'> is of type type
- `symmetric_difference` -- <function>
- `union` -- <function>

[--> builtins](#)

[--> Overview](#)

builtins --> int

MP Home highlight

- `from_bytes` -- <classmethod>
- `object` <class 'int'> is of type type
- `to_bytes` -- <function>

[--> builtins](#)

[--> Overview](#)

builtins --> list

MP Home highlight

- `append` -- <function>
- `clear` -- <function>
- `copy` -- <function>
- `count` -- <function>
- `extend` -- <function>
- `index` -- <function>
- `insert` -- <function>
- `object` <class 'list'> is of type type
- `pop` -- <function>
- `remove` -- <function>
- `reverse` -- <function>
- `sort` -- <function>

[--> builtins](#)

[--> Overview](#)

builtins --> map

MP Home highlight

- `object <class 'map'> is of type type`

[--> builtins](#)

[--> Overview](#)

builtins --> memoryview

MP Home highlight

- `object <class 'memoryview'> is of type type`

[--> builtins](#)

[--> Overview](#)

builtins --> object

MP Home highlight

- `__delattr__ -- <function>`
- `__init__ -- <function>`
- `__new__ -- <staticmethod>`
- `__setattr__ -- <function>`
- `object <class 'object'> is of type type`

[--> builtins](#)

[--> Overview](#)

builtins --> property

MP Home highlight

- `deleter -- <function>`
- `getter -- <function>`
- `object <class 'property'> is of type type`
- `setter -- <function>`

[--> builtins](#)

[--> Overview](#)

builtins --> range

MP Home highlight

- `object <class 'range'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> reversed

MP Home highlight

- `object <class 'reversed'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> set

MP Home highlight

- `__contains__ -- <function>`
- `add -- <function>`
- `clear -- <function>`
- `copy -- <function>`
- `difference -- <function>`
- `difference_update -- <function>`
- `discard -- <function>`
- `intersection -- <function>`
- `intersection_update -- <function>`
- `isdisjoint -- <function>`
- `issubset -- <function>`
- `issuperset -- <function>`
- `object <class 'set'> is of type type`
- `pop -- <function>`
- `remove -- <function>`
- `symmetric_difference -- <function>`
- `symmetric_difference_update -- <function>`
- `union -- <function>`
- `update -- <function>`

--> [builtins](#)

--> [Overview](#)

builtins --> slice

MP Home highlight

- `object <class 'slice'> is of type type`

[--> builtins](#)

[--> Overview](#)

builtins --> str

MP Home highlight

Extern

- `center -- <function>`
- `count -- <function>`
- `encode -- <function>`
- `endswith -- <function>`
- `find -- <function>`
- `format -- <function>`
- `index -- <function>`
- `isalpha -- <function>`
- `isdigit -- <function>`
- `islower -- <function>`
- `isspace -- <function>`
- `isupper -- <function>`
- `join -- <function>`
- `lower -- <function>`
- `lstrip -- <function>`
- `object <class 'str'> is of type type`
- `partition -- <function>`
- `replace -- <function>`
- `rfind -- <function>`
- `rindex -- <function>`
- `rpartition -- <function>`
- `rsplit -- <function>`
- `rstrip -- <function>`
- `split -- <function>`
- `splitlines -- <function>`
- `startswith -- <function>`
- `strip -- <function>`
- `upper -- <function>`

[--> builtins](#)

[--> Overview](#)

builtins --> super

MP Home highlight

- `object <class 'super'> is of type type`

--> builtins

--> Overview

builtins --> tuple

MP Home highlight

- `count` -- `<function>`
- `index` -- `<function>`
- `object <class 'tuple'> is of type type`

--> builtins

--> Overview

builtins --> type

MP Home highlight

- `object <class 'type'> is of type type`

--> builtins

--> Overview

builtins --> zip

MP Home highlight

- `object <class 'zip'> is of type type`

--> builtins

--> Overview

builtins --> classmethod

MP Home highlight

- `object <class 'classmethod'> is of type type`

--> builtins

--> Overview

builtins --> staticmethod

MP Home highlight

- `object <class 'staticmethod'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> BaseException

- `object <class 'BaseException'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> ArithmeticError

Extern highlight

- `object <class 'ArithmeticError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> AssertionError

MP Home highlight

- `object <class 'AssertionError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> AttributeError

MP Home highlight

- `object <class 'AttributeError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> EOFError

Extern highlight

- `object <class 'EOFError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> Exception

MP Home highlight

- `object <class 'Exception'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> GeneratorExit

- `object <class 'GeneratorExit'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> ImportError

MP Home highlight

- `object <class 'ImportError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> IndentationError

Extern highlight

- `object <class 'IndentationError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> IndexError

MP Home highlight

- `object <class 'IndexError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> KeyboardInterrupt

MP Home highlight

- `object <class 'KeyboardInterrupt'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> KeyError

MP Home highlight

- `object <class 'KeyError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> LookupError

Extern highlight

- `object <class 'LookupError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> MemoryError

MP Home highlight

- `object <class 'MemoryError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> NameError

MP Home highlight

- `object <class 'NameError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> NotImplementedError

MP Home highlight

- `object <class 'NotImplementedError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> OSError

MP Home highlight

- `object <class 'OSError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> OverflowError

Extern highlight

- `object <class 'OverflowError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> RuntimeError

MP Home highlight

- `object <class 'RuntimeError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> StopAsyncIteration

- `object <class 'StopAsyncIteration'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> StopIteration

MP Home highlight

- `object <class 'StopIteration'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> SyntaxError

MP Home highlight

- `object <class 'SyntaxError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> SystemExit

MP Home highlight

- `object <class 'SystemExit'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> TypeError

MP Home highlight

- `object <class 'TypeError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> UnicodeError

Extern highlight

- `object <class 'UnicodeError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> ValueError

MP Home highlight

- `object <class 'ValueError'> is of type type`

--> [builtins](#)

--> [Overview](#)

builtins --> ViperTypeError

- `object <class 'ViperTypeError'> is of type type`

[--> builtins](#)

[--> Overview](#)

builtins --> ZeroDivisionError

MP Home highlight

- `object <class 'ZeroDivisionError'> is of type type`

[--> builtins](#)

[--> Overview](#)

cmath

MP Home

- `object <module 'cmath'> is of type module`
- `__name__ -- cmath`
- `e -- 2.718282`
- `pi -- 3.141593`
- `phase -- <function>`
- `polar -- <function>`
- `rect -- <function>`
- `exp -- <function>`
- `log -- <function>`
- `log10 -- <function>`
- `sqrt -- <function>`
- `cos -- <function>`
- `sin -- <function>`

[--> Overview](#)

dht

MP ESP32 highlight

- `object <module 'dht' from 'dht.py'> is of type module`
- `DHTBase -- <class 'DHTBase'>`
- `__name__ -- dht`
- `__file__ -- dht.py`
- `sys -- <module 'sys'>`
- `DHT11 -- <class 'DHT11'>`
- `dht_readinto -- <function>`

- `DHT22 -- <class 'DHT22'>`

--> [Overview](#)

dht --> DHTBase

- `__init__ -- <function __init__ at 0x3fda0fd0>`
- `__module__ -- dht`
- `__qualname__ -- DHTBase`
- `measure -- <function measure at 0x3fda0fc0>`
- `object <class 'DHTBase'> is of type type`

--> [dht](#)

--> [Overview](#)

dht --> DHT11

MP ESP32 highlight

- `__module__ -- dht`
- `__qualname__ -- DHT11`
- `humidity -- <function humidity at 0x3fda1080>`
- `object <class 'DHT11'> is of type type`
- `temperature -- <function temperature at 0x3fda1070>`

--> [dht](#)

--> [Overview](#)

dht --> DHT22

MP ESP32 highlight

- `__module__ -- dht`
- `__qualname__ -- DHT22`
- `humidity -- <function humidity at 0x3fda1130>`
- `object <class 'DHT22'> is of type type`
- `temperature -- <function temperature at 0x3fda1120>`

--> [dht](#)

--> [Overview](#)

ds18x20

MP ESP32 highlight

- `object <module 'ds18x20' from 'ds18x20.py'> is of type module`

- `const` -- <function>
- `DS18X20` -- <class 'DS18X20'>
- `__name__` -- `ds18x20`
- `__file__` -- `ds18x20.py`

--> [Overview](#)

ds18x20 --> DS18X20

MP ESP32 highlight

- `__init__` -- <function `__init__` at 0x3fda2750>
- `__module__` -- `ds18x20`
- `__qualname__` -- `DS18X20`
- `convert_temp` -- <function `convert_temp` at 0x3fda2780>
- `object` <class 'DS18X20'> is of type `type`
- `read_scratch` -- <function `read_scratch` at 0x3fda2760>
- `read_temp` -- <function `read_temp` at 0x3fda2790>
- `scan` -- <function `scan` at 0x3fda2740>
- `write_scratch` -- <function `write_scratch` at 0x3fda2770>

--> `ds18x20`

--> [Overview](#)

esp

MP Home

- `object` <module 'esp'> is of type `module`
- `__name__` -- `esp`
- `osdebug` -- <function>
- `flash_read` -- <function>
- `flash_write` -- <function>
- `flash_erase` -- <function>
- `flash_size` -- <function>
- `flash_user_start` -- <function>
- `gpio_matrix_in` -- <function>
- `gpio_matrix_out` -- <function>
- `dht_readinto` -- <function>
- `LOG_NONE` -- 0
- `LOG_ERROR` -- 1
- `LOG_WARNING` -- 2
- `LOG_INFO` -- 3
- `LOG_DEBUG` -- 4
- `LOG_VERBOSE` -- 5

[--> Overview](#)

esp32

MP Home

- `object <module 'esp32'> is of type module`
- `__name__ -- esp32`
- `wake_on_touch -- <function>`
- `wake_on_ext0 -- <function>`
- `wake_on_ext1 -- <function>`
- `gpio_deep_sleep_hold -- <function>`
- `idf_heap_info -- <function>`
- `NVS -- <class 'NVS'>`
- `Partition -- <class 'Partition'>`
- `RMT -- <class 'RMT'>`
- `WAKEUP_ALL_LOW -- False`
- `WAKEUP_ANY_HIGH -- True`
- `HEAP_DATA -- 4`
- `HEAP_EXEC -- 1`

[--> Overview](#)

esp32 --> NVS

Extern**MP Home highlight****Extern****YouTube**

- `commit -- <function>`
- `erase_key -- <function>`
- `get_blob -- <function>`
- `get_i32 -- <function>`
- `object <class 'NVS'> is of type type`
- `set_blob -- <function>`
- `set_i32 -- <function>`

[--> esp32](#)[--> Overview](#)

esp32 --> Partition

MP Home highlight

- `BOOT -- 0`
- `RUNNING -- 1`
- `TYPE_APP -- 0`
- `TYPE_DATA -- 1`

- `find` -- <staticmethod>
- `get_next_update` -- <function>
- `info` -- <function>
- `ioctl` -- <function>
- `mark_app_valid_cancel_rollback` -- <classmethod>
- `object` <class 'Partition'> is of type type
- `readblocks` -- <function>
- `set_boot` -- <function>
- `writeblocks` -- <function>

--> [esp32](#)

--> [Overview](#)

esp32 --> RMT

MP ESP32 highlight

- `__del__` -- <function>
- `bitstream_channel` -- <staticmethod>
- `clock_div` -- <function>
- `deinit` -- <function>
- `loop` -- <function>
- `object` <class 'RMT'> is of type type
- `source_freq` -- <function>
- `wait_done` -- <function>
- `write_pulses` -- <function>

--> [esp32](#)

--> [Overview](#)

flashbdev

Extern highlight

- `object` <module 'flashbdev' from 'flashbdev.py'> is of type module
- `Partition` -- <class 'Partition'>
- `bdev` -- <Partition type=1, subtype=129, address=2097152, size=2097152, label=vfs, encrypted=0>
- `__name__` -- flashbdev
- `__file__` -- flashbdev.py

--> [Overview](#)

flashbdev --> Partition

Extern highlight

- BOOT -- 0
- RUNNING -- 1
- TYPE_APP -- 0
- TYPE_DATA -- 1
- find -- <staticmethod>
- get_next_update -- <function>
- info -- <function>
- ioctl -- <function>
- mark_app_valid_cancel_rollback -- <classmethod>
- object <class 'Partition'> is of type type
- readblocks -- <function>
- set_boot -- <function>
- writeblocks -- <function>

--> [flashbdev](#)

--> [Overview](#)

framebuf

MP Home

- object <module 'framebuf'> is of type module
- __name__ -- framebuf
- FrameBuffer -- <class 'FrameBuffer'>
- FrameBuffer1 -- <function>
- MVLSB -- 0
- MONO_VLSB -- 0
- RGB565 -- 1
- GS2_HMSB -- 5
- GS4_HMSB -- 2
- GS8 -- 6
- MONO_HLSB -- 3
- MONO_HMSB -- 4

--> [Overview](#)

framebuf --> FrameBuffer

- blit -- <function>
- fill -- <function>
- fill_rect -- <function>
- hline -- <function>
- line -- <function>
- object <class 'FrameBuffer'> is of type type
- pixel -- <function>
- rect -- <function>

- `scroll -- <function>`
- `text -- <function>`
- `vline -- <function>`

[--> framebuffer](#)

[--> Overview](#)

gc

MP Home

- object `<module 'gc'>` is of type module
- `__name__ -- gc`
- `collect -- <function>`
- `disable -- <function>`
- `enable -- <function>`
- `isenabled -- <function>`
- `mem_free -- <function>`
- `mem_alloc -- <function>`
- `threshold -- <function>`

[--> Overview](#)

inisetup

- object `<module 'inisetup' from 'inisetup.py'>` is of type module
- `bdev -- <Partition type=1, subtype=129, address=2097152, size=2097152, label=vfs, encrypted=0>`
- `__name__ -- inisetup`
- `__file__ -- inisetup.py`
- `uos -- <module 'uos'>`
- `fs_corrupted -- <function fs_corrupted at 0x3fda8470>`
- `setup -- <function setup at 0x3fda8480>`
- `check_bootsec -- <function check_bootsec at 0x3fda8490>`

[--> Overview](#)

math

MP Home

- object `<module 'math'>` is of type module
- `__name__ -- math`
- `e -- 2.718282`
- `pi -- 3.141593`

- tau -- 6.283185
- inf -- inf
- nan -- nan
- sqrt -- <function>
- pow -- <function>
- exp -- <function>
- expm1 -- <function>
- log -- <function>
- log2 -- <function>
- log10 -- <function>
- cosh -- <function>
- sinh -- <function>
- tanh -- <function>
- acosh -- <function>
- asinh -- <function>
- atanh -- <function>
- cos -- <function>
- sin -- <function>
- tan -- <function>
- acos -- <function>
- asin -- <function>
- atan -- <function>
- atan2 -- <function>
- ceil -- <function>
- copysign -- <function>
- fabs -- <function>
- floor -- <function>
- fmod -- <function>
- frexp -- <function>
- ldexp -- <function>
- modf -- <function>
- isfinite -- <function>
- isinf -- <function>
- isnan -- <function>
- isclose -- <function>
- trunc -- <function>
- radians -- <function>
- degrees -- <function>
- factorial -- <function>
- erf -- <function>
- erfc -- <function>
- gamma -- <function>
- lgamma -- <function>

--> [Overview](#)

micropython

MP Home

- object <module 'micropython'> is of type module
- __name__ -- micropython
- const -- <function>
- opt_level -- <function>
- mem_info -- <function>
- qstr_info -- <function>
- stack_use -- <function>
- alloc_emergency_exception_buf -- <function>
- heap_lock -- <function>
- heap_unlock -- <function>
- kbd_intr -- <function>
- schedule -- <function>

--> [Overview](#)

neopixel

MP Home

- object <module 'neopixel' from 'neopixel.py'> is of type module
- bitstream -- <function>
- NeoPixel -- <class 'NeoPixel'>
- __name__ -- neonpixel
- __file__ -- neonpixel.py

--> [Overview](#)

neopixel --> NeoPixel

MP ESP32 highlight

- ORDER -- (1, 0, 2, 3)
- __getitem__ -- <function __getitem__ at 0x3fd8ffc0>
- __init__ -- <function __init__ at 0x3fd8ffd0>
- __len__ -- <function __len__ at 0x3fd8fff0>
- __module__ -- neonpixel
- __qualname__ -- NeoPixel
- __setitem__ -- <function __setitem__ at 0x3fd8ffb0>
- fill -- <function fill at 0x3fd90000>
- object <class 'NeoPixel'> is of type type
- write -- <function write at 0x3fd90010>

--> [neopixel](#)

--> [Overview](#)

network

MP Home

- object <module 'network'> is of type module
- `__name__` -- network
- `__init__` -- <function>
- `WLAN` -- <function>
- `PPP` -- <function>
- `phy_mode` -- <function>
- `STA_IF` -- 0
- `AP_IF` -- 1
- `MODE_11B` -- 1
- `MODE_11G` -- 2
- `MODE_11N` -- 4
- `AUTH_OPEN` -- 0
- `AUTH_WEP` -- 1
- `AUTH_WPA_PSK` -- 2
- `AUTH_WPA2_PSK` -- 3
- `AUTH_WPA_WPA2_PSK` -- 4
- `AUTH_WPA2_ENTERPRISE` -- 5
- `AUTH_WPA3_PSK` -- 6
- `AUTH_WPA2_WPA3_PSK` -- 7
- `AUTH_WAPI_PSK` -- 8
- `AUTH_MAX` -- 9
- `STAT_IDLE` -- 1000
- `STAT_CONNECTING` -- 1001
- `STAT_GOT_IP` -- 1010
- `STAT_NO_AP_FOUND` -- 201
- `STAT_WRONG_PASSWORD` -- 202
- `STAT_BEACON_TIMEOUT` -- 200
- `STAT_ASSOC_FAIL` -- 203
- `STAT_HANDSHAKE_TIMEOUT` -- 204

--> [Overview](#)

ntptime

Extern

Extern

- object <module 'ntptime' from 'ntptime.py'> is of type module
- `socket` -- <module 'usocket'>

- NTP_DELTA -- 3155673600
- struct -- <module 'ustruct'>
- __name__ -- ntptime
- __file__ -- ntptime.py
- host -- pool.ntp.org
- time -- <function time at 0x3fda8450>
- settime -- <function settime at 0x3fdad170>

--> [Overview](#)

onewire

MP ESP32 highlight

- object <module 'onewire' from 'onewire.py'> is of type module
- __name__ -- onewire
- _ow -- <module 'onewire'>
- OneWireError -- <class 'OneWireError'>
- __file__ -- onewire.py
- OneWire -- <class 'OneWire'>

--> [Overview](#)

onewire --> OneWireError

- __module__ -- onewire
- __qualname__ -- OneWireError
- object <class 'OneWireError'> is of type type

--> [onewire](#)

--> [Overview](#)

onewire --> OneWire

MP ESP32 highlight

- MATCH_ROM -- 85
- SEARCH_ROM -- 240
- SKIP_ROM -- 204
- __init__ -- <function __init__ at 0x3fdada50>
- __module__ -- onewire
- __qualname__ -- OneWire
- _search_rom -- <function _search_rom at 0x3fdadb10>
- crc8 -- <function crc8 at 0x3fdadb20>
- object <class 'OneWire'> is of type type
- readbit -- <function readbit at 0x3fdada70>
- readbyte -- <function readbyte at 0x3fdada80>

- readinto -- <function readinto at 0x3fdada90>
- reset -- <function reset at 0x3fdadab0>
- scan -- <function scan at 0x3fdadb00>
- select_rom -- <function select_rom at 0x3fdadaf0>
- write -- <function write at 0x3fdadae0>
- writebit -- <function writebit at 0x3fdadaa0>
- writebyte -- <function writebyte at 0x3fdadad0>

--> [onewire](#)

--> [Overview](#)

s2mini

Extern

- object <module 's2mini' from 's2mini.py'> is of type module
- led -- Pin(15)
- button -- Pin(0)
- __file__ -- s2mini.py
- I2C_SCL -- 35
- Pin -- <class 'Pin'>
- const -- <function>
- BUTTON -- 0
- SPI_MOSI -- 11
- DAC2 -- 18
- DAC1 -- 17
- __name__ -- s2mini
- SPI_MISO -- 9
- I2C_SDA -- 33
- SPI_CLK -- 7
- LED -- 15

--> [Overview](#)

s2mini --> Pin

MP ESP32 highlight

- DRIVE_0 -- 0
- DRIVE_1 -- 1
- DRIVE_2 -- 2
- DRIVE_3 -- 3
- IN -- 1
- IRQ_FALLING -- 2
- IRQ_RISING -- 1
- OPEN_DRAIN -- 7

- `OUT -- 3`
- `PULL_DOWN -- 1`
- `PULL_UP -- 2`
- `WAKE_HIGH -- 5`
- `WAKE_LOW -- 4`
- `init -- <function>`
- `irq -- <function>`
- `object <class 'Pin'> is of type type`
- `off -- <function>`
- `on -- <function>`
- `value -- <function>`

--> [s2mini](#)

--> [Overview](#)

uarray

[MP Home](#)

- `object <module 'uarray'> is of type module`
- `__name__ -- uarray`
- `array -- <class 'array'>`

--> [Overview](#)

uarray --> array

[MP Home](#)

- `append -- <function>`
- `decode -- <function>`
- `extend -- <function>`
- `object <class 'array'> is of type type`

--> [uarray](#)

--> [Overview](#)

uasyncio/core

[MP Home](#)

[Extern](#)

[Extern](#)

- `object <module 'uasyncio/core' from 'uasyncio/core.py'> is of type module`
- `sys -- <module 'sys'>`
- `Task -- <class 'Task'>`
- `new_event_loop -- <function new_event_loop at 0x3fdb14c0>`

- `_promote_to_task` -- <function `_promote_to_task` at `0x3fdb1440`>
- `__name__` -- `uasyncio/core`
- `run` -- <function `run` at `0x3fdb1320`>
- `current_task` -- <function `current_task` at `0x3fdb14b0`>
- `_task_queue` -- <TaskQueue>
- `_io_queue` -- <IOQueue object at `3fdb14e0`>
- `sleep_ms` -- <function `sleep_ms` at `0x3fdb1210`>
- `sleep` -- <function `sleep` at `0x3fdb1250`>
- `ticks_add` -- <function>
- `_exc_context` -- {'future': None, 'message': "Task exception wasn't retrieved", 'exception': None}
- `ticks_diff` -- <function>
- `TaskQueue` -- <class 'TaskQueue'>
- `SingletonGenerator` -- <class 'SingletonGenerator'>
- `TimeoutError` -- <class 'TimeoutError'>
- `__file__` -- `uasyncio/core.py`
- `_stopper` -- <generator>
- `Loop` -- <class 'Loop'>
- `IOQueue` -- <class 'IOQueue'>
- `select` -- <module 'select'>
- `_stop_task` -- None
- `CancelledError` -- <class 'CancelledError'>
- `get_event_loop` -- <function `get_event_loop` at `0x3fdb1630`>
- `run_until_complete` -- <function `run_until_complete` at `0x3fdb1300`>
- `ticks` -- <function>
- `create_task` -- <function `create_task` at `0x3fdb14a0`>

--> [Overview](#)

uasyncio/core --> Task

MP Home

- object <class 'Task'> is of type type

--> [uasyncio/core](#)

--> [Overview](#)

uasyncio/core --> TaskQueue

MP Home

- object <class 'TaskQueue'> is of type type
- `peek` -- <function>
- `pop` -- <function>
- `push` -- <function>
- `remove` -- <function>

[--> uasyncio/core](#)

[--> Overview](#)

uasyncio/core --> SingletonGenerator

MP Home

- `__init__` -- <function `__init__` at 0x3fdb1240>
- `__iter__` -- <function `__iter__` at 0x3fdb1230>
- `__module__` -- `uasyncio/core`
- `__next__` -- <function `__next__` at 0x3fdb1270>
- `__qualname__` -- `SingletonGenerator`
- `object` <class `'SingletonGenerator'`> is of type `type`

[--> uasyncio/core](#)

[--> Overview](#)

uasyncio/core --> TimeoutError

MP Home

- `__module__` -- `uasyncio/core`
- `__qualname__` -- `TimeoutError`
- `object` <class `'TimeoutError'`> is of type `type`

[--> uasyncio/core](#)

[--> Overview](#)

uasyncio/core --> Loop

MP Home

- `__module__` -- `uasyncio/core`
- `__qualname__` -- `Loop`
- `_exc_handler` -- `None`
- `call_exception_handler` -- <function `call_exception_handler` at 0x3fdb15d0>
- `close` -- <function `close` at 0x3fdb1590>
- `create_task` -- <function `create_task` at 0x3fdb1360>
- `default_exception_handler` -- <function `default_exception_handler` at 0x3fdb15c0>
- `get_exception_handler` -- <function `get_exception_handler` at 0x3fdb15b0>
- `object` <class `'Loop'`> is of type `type`
- `run_forever` -- <function `run_forever` at 0x3fdb1370>
- `run_until_complete` -- <function `run_until_complete` at 0x3fdb1570>
- `set_exception_handler` -- <function `set_exception_handler` at 0x3fdb15a0>
- `stop` -- <function `stop` at 0x3fdb1580>

--> [uasyncio/core](#)

--> [Overview](#)

uasyncio/core --> IOQueue

[MP Home](#)

- `__init__` -- <function `__init__` at 0x3fdb13a0>
- `__module__` -- `uasyncio/core`
- `__qualname__` -- `IOQueue`
- `_dequeue` -- <function `_dequeue` at 0x3fdb13d0>
- `_enqueue` -- <function `_enqueue` at 0x3fdb1390>
- `object` <class `'IOQueue'`> is of type `type`
- `queue_read` -- <function `queue_read` at 0x3fdb13b0>
- `queue_write` -- <function `queue_write` at 0x3fdb13c0>
- `remove` -- <function `remove` at 0x3fdb13e0>
- `wait_io_event` -- <function `wait_io_event` at 0x3fdb13f0>

--> [uasyncio/core](#)

--> [Overview](#)

uasyncio/core --> CancelledError

[MP Home](#)

- `__module__` -- `uasyncio/core`
- `__qualname__` -- `CancelledError`
- `object` <class `'CancelledError'`> is of type `type`

--> [uasyncio/core](#)

--> [Overview](#)

uasyncio/event

[MP Home](#)

- `object` <module `'ubinascii'`> is of type `module`
- `__name__` -- `ubinascii`
- `hexlify` -- <function>
- `unhexlify` -- <function>
- `a2b_base64` -- <function>
- `b2a_base64` -- <function>
- `crc32` -- <function>

--> [Overview](#)

ucollections

[MP Home](#)

- `object <module 'ucollections'> is of type module`
- `__name__ -- ucollections`
- `deque -- <class 'deque'>`
- `namedtuple -- <function>`
- `OrderedDict -- <class 'OrderedDict'>`

[--> Overview](#)

ucollections --> deque

[MP Home](#)[MP Home highlight](#)

- `append -- <function>`
- `object <class 'deque'> is of type type`
- `popleft -- <function>`

[--> ucollections](#)[--> Overview](#)

ucollections --> OrderedDict

[MP Home](#)[MP Home highlight](#)

- `__delitem__ -- <function>`
- `__getitem__ -- <function>`
- `__setitem__ -- <function>`
- `clear -- <function>`
- `copy -- <function>`
- `fromkeys -- <classmethod>`
- `get -- <function>`
- `items -- <function>`
- `keys -- <function>`
- `object <class 'OrderedDict'> is of type type`
- `pop -- <function>`
- `popitem -- <function>`
- `setdefault -- <function>`
- `update -- <function>`
- `values -- <function>`

[--> ucollections](#)[--> Overview](#)

ucryptolib

MP Home

- object <module 'ucryptolib'> is of type module
- __name__ -- ucryptolib
- aes -- <class 'aes'>

--> [Overview](#)

ucryptolib --> aes

MP Home

MP Home highlight

Extern

- decrypt -- <function>
- encrypt -- <function>
- object <class 'aes'> is of type type

--> [ucryptolib](#)

--> [Overview](#)

uctypes

MP Home

- object <module 'uctypes'> is of type module
- __name__ -- uctypes
- struct -- <class 'struct'>
- sizeof -- <function>
- addressof -- <function>
- bytes_at -- <function>
- bytearray_at -- <function>
- NATIVE -- 2
- LITTLE_ENDIAN -- 0
- BIG_ENDIAN -- 1
- VOID -- 0
- UINT8 -- 0
- INT8 -- 134217728
- UINT16 -- 268435456
- INT16 -- 402653184
- UINT32 -- 536870912
- INT32 -- 671088640
- UINT64 -- 805306368
- INT64 -- 939524096
- BFUINT8 -- -1073741824

- BFINT8 -- -939524096
- BFUINT16 -- -805306368
- BFINT16 -- -671088640
- BFUINT32 -- -536870912
- BFINT32 -- -402653184
- BF_POS -- 17
- BF_LEN -- 22
- FLOAT32 -- -268435456
- FLOAT64 -- -134217728
- SHORT -- 402653184
- USHORT -- 268435456
- INT -- 671088640
- UINT -- 536870912
- LONG -- 671088640
- ULONG -- 536870912
- LONGLONG -- 939524096
- ULONGLONG -- 805306368
- PTR -- 536870912
- ARRAY -- -1073741824

--> [Overview](#)

uctypes --> struct

MP ESP32 highlight

- object <class 'struct'> is of type type

--> [uctypes](#)

--> [Overview](#)

uerrno

MP Home

- object <module 'uerrno'> is of type module
- __name__ -- uerrno
- errorcode -- {1: 'EPERM', 2: 'ENOENT', 5: 'EIO', 9: 'EBADF', 11: 'EAGAIN', 12: 'ENOMEM', 13: 'EACCES', 17: 'EEXIST', 19: 'ENODEV', 21: 'EISDIR', 22: 'EINVAL', 95: 'EOPNOTSUPP', 112: 'EADDRINUSE', 113: 'ECONNABORTED', 104: 'ECONNRESET', 105: 'ENOBUFS', 128: 'ENOTCONN', 116: 'ETIMEDOUT', 111: 'ECONNREFUSED', 118: 'EHOSTUNREACH', 120: 'EALREADY', 119: 'EINPROGRESS'}
- EPERM -- 1
- ENOENT -- 2
- EIO -- 5
- EBADF -- 9

- EAGAIN -- 11
- ENOMEM -- 12
- EACCES -- 13
- EEXIST -- 17
- ENODEV -- 19
- EISDIR -- 21
- EINVAL -- 22
- EOPNOTSUPP -- 95
- EADDRINUSE -- 112
- ECONNABORTED -- 113
- ECONNRESET -- 104
- ENOBUFS -- 105
- ENOTCONN -- 128
- ETIMEDOUT -- 116
- ECONNREFUSED -- 111
- EHOSTUNREACH -- 118
- EALREADY -- 120
- EINPROGRESS -- 119

--> [Overview](#)

uhashlib

MP Home

- object <module 'uhashlib'> is of type module
- __name__ -- uhashlib
- sha256 -- <class 'sha256'>
- sha1 -- <class 'sha1'>

--> [Overview](#)

uhashlib --> sha256

MP Home

- digest -- <function>
- object <class 'sha256'> is of type type
- update -- <function>

--> [uhashlib](#)

--> [Overview](#)

uhashlib --> sha1

MP Home

- `digest -- <function>`
- `object <class 'sha1'> is of type type`
- `update -- <function>`

[--> uhashlib](#)

[--> Overview](#)

uheapq

[MP Home](#)

- `object <module 'uheapq'> is of type module`
- `__name__ -- uheapq`
- `heappush -- <function>`
- `heappop -- <function>`
- `heapify -- <function>`

[--> Overview](#)

uio

[MP Home](#)

- `object <module 'uio'> is of type module`
- `__name__ -- uio`
- `open -- <function>`
- `IOBase -- <class 'IOBase'>`
- `FileIO -- <class 'FileIO'>`
- `TextIOWrapper -- <class 'TextIOWrapper'>`
- `StringIO -- <class 'StringIO'>`
- `BytesIO -- <class 'BytesIO'>`
- `BufferedWriter -- <class 'BufferedWriter'>`

[--> Overview](#)

uio --> IOBase

[MP Home](#)

- `object <class 'IOBase'> is of type type`

[--> uio](#)

[--> Overview](#)

uio --> FileIO

MP Home

- `__del__` -- <function>
- `__enter__` -- <function>
- `__exit__` -- <function>
- `close` -- <function>
- `flush` -- <function>
- `object <class 'FileIO'> is of type type`
- `read` -- <function>
- `readinto` -- <function>
- `readline` -- <function>
- `readlines` -- <function>
- `seek` -- <function>
- `tell` -- <function>
- `write` -- <function>

--> [uio](#)

--> [Overview](#)

uio --> TextIOWrapper

MP Home

- `__del__` -- <function>
- `__enter__` -- <function>
- `__exit__` -- <function>
- `close` -- <function>
- `flush` -- <function>
- `object <class 'TextIOWrapper'> is of type type`
- `read` -- <function>
- `readinto` -- <function>
- `readline` -- <function>
- `readlines` -- <function>
- `seek` -- <function>
- `tell` -- <function>
- `write` -- <function>

--> [uio](#)

--> [Overview](#)

uio --> StringIO

MP Home

- `__enter__` -- <function>
- `__exit__` -- <function>

- `close` -- <function>
- `flush` -- <function>
- `getvalue` -- <function>
- `object` <class 'StringIO'> is of type type
- `read` -- <function>
- `readinto` -- <function>
- `readline` -- <function>
- `seek` -- <function>
- `tell` -- <function>
- `write` -- <function>

--> [uio](#)

--> [Overview](#)

uio --> BytesIO

MP Home

- `__enter__` -- <function>
- `__exit__` -- <function>
- `close` -- <function>
- `flush` -- <function>
- `getvalue` -- <function>
- `object` <class 'BytesIO'> is of type type
- `read` -- <function>
- `readinto` -- <function>
- `readline` -- <function>
- `seek` -- <function>
- `tell` -- <function>
- `write` -- <function>

--> [uio](#)

--> [Overview](#)

uio --> BufferedWriter

MP Home

- `flush` -- <function>
- `object` <class 'BufferedWriter'> is of type type
- `write` -- <function>

--> [uio](#)

--> [Overview](#)

ujson

MP Home

- object <module 'ujson'> is of type module
- `__name__` -- ujson
- `dump` -- <function>
- `dumps` -- <function>
- `load` -- <function>
- `loads` -- <function>

--> [Overview](#)

umachine

MP Home

- object <module 'umachine'> is of type module
- `__name__` -- umachine
- `mem8` -- <8-bit memory>
- `mem16` -- <16-bit memory>
- `mem32` -- <32-bit memory>
- `freq` -- <function>
- `reset` -- <function>
- `soft_reset` -- <function>
- `unique_id` -- <function>
- `sleep` -- <function>
- `lightsleep` -- <function>
- `deepsleep` -- <function>
- `idle` -- <function>
- `disable_irq` -- <function>
- `enable_irq` -- <function>
- `bitstream` -- <function>
- `time_pulse_us` -- <function>
- `Timer` -- <class 'Timer'>
- `WDT` -- <class 'WDT'>
- `SLEEP` -- 2
- `DEEPSLEEP` -- 4
- `Pin` -- <class 'Pin'>
- `Signal` -- <class 'Signal'>
- `ADC` -- <class 'ADC'>
- `ADCBlock` -- <class 'ADCBlock'>
- `DAC` -- <class 'DAC'>
- `I2C` -- <class 'I2C'>
- `SoftI2C` -- <class 'SoftI2C'>
- `I2S` -- <class 'I2S'>
- `PWM` -- <class 'PWM'>

- RTC -- <class 'RTC'>
- SPI -- <class 'SPI'>
- SoftSPI -- <class 'SoftSPI'>
- UART -- <class 'UART'>
- reset_cause -- <function>
- HARD_RESET -- 2
- PWRON_RESET -- 1
- WDT_RESET -- 3
- DEEPSLEEP_RESET -- 4
- SOFT_RESET -- 5
- wake_reason -- <function>
- PIN_WAKE -- 2
- EXT0_WAKE -- 2
- EXT1_WAKE -- 3
- TIMER_WAKE -- 4
- TOUCHPAD_WAKE -- 5
- ULP_WAKE -- 6

--> [Overview](#)

umachine --> Timer

[MP Home](#)

- ONE_SHOT -- 0
- PERIODIC -- 1
- __del__ -- <function>
- deinit -- <function>
- init -- <function>
- object <class 'Timer'> is of type type
- value -- <function>

--> [umachine](#)

--> [Overview](#)

umachine --> WDT

[MP Home](#)

- feed -- <function>
- object <class 'WDT'> is of type type

--> [umachine](#)

--> [Overview](#)

umachine --> Pin

MP Home

- `DRIVE_0 -- 0`
- `DRIVE_1 -- 1`
- `DRIVE_2 -- 2`
- `DRIVE_3 -- 3`
- `IN -- 1`
- `IRQ_FALLING -- 2`
- `IRQ_RISING -- 1`
- `OPEN_DRAIN -- 7`
- `OUT -- 3`
- `PULL_DOWN -- 1`
- `PULL_UP -- 2`
- `WAKE_HIGH -- 5`
- `WAKE_LOW -- 4`
- `init -- <function>`
- `irq -- <function>`
- `object <class 'Pin'> is of type type`
- `off -- <function>`
- `on -- <function>`
- `value -- <function>`

--> [umachine](#)

--> [Overview](#)

umachine --> Signal

MP Home

- `object <class 'Signal'> is of type type`
- `off -- <function>`
- `on -- <function>`
- `value -- <function>`

--> [umachine](#)

--> [Overview](#)

umachine --> ADC

MP Home

- `ATTN_0DB -- 0`
- `ATTN_11DB -- 3`
- `ATTN_2_5DB -- 1`
- `ATTN_6DB -- 2`
- `WIDTH_13BIT -- 13`

- `atten -- <function>`
- `block -- <function>`
- `init -- <function>`
- `object <class 'ADC'> is of type type`
- `read -- <function>`
- `read_u16 -- <function>`
- `read_uv -- <function>`
- `width -- <function>`

[--> umachine](#)

[--> Overview](#)

umachine --> ADCBlock

MP Home

- `connect -- <function>`
- `init -- <function>`
- `object <class 'ADCBlock'> is of type type`

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[--> Overview](#)

umachine --> DAC

MP Home

- `object <class 'DAC'> is of type type`
- `write -- <function>`

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[--> Overview](#)

umachine --> I2C

MP Home

- `init -- <function>`
- `object <class 'I2C'> is of type type`
- `readfrom -- <function>`
- `readfrom_into -- <function>`
- `readfrom_mem -- <function>`
- `readfrom_mem_into -- <function>`
- `readinto -- <function>`
- `scan -- <function>`
- `start -- <function>`

- `stop -- <function>`
- `write -- <function>`
- `writeto -- <function>`
- `writeto_mem -- <function>`
- `writevto -- <function>`

[--> umachine](#)

[--> Overview](#)

umachine --> SoftI2C

MP Home

- `init -- <function>`
- `object <class 'SoftI2C'> is of type type`
- `readfrom -- <function>`
- `readfrom_into -- <function>`
- `readfrom_mem -- <function>`
- `readfrom_mem_into -- <function>`
- `readinto -- <function>`
- `scan -- <function>`
- `start -- <function>`
- `stop -- <function>`
- `write -- <function>`
- `writeto -- <function>`
- `writeto_mem -- <function>`
- `writevto -- <function>`

[--> umachine](#)

[--> Overview](#)

umachine --> I2S

MP Home

- `MONO -- 0`
- `RX -- 9`
- `STEREO -- 1`
- `TX -- 5`
- `deinit -- <function>`
- `init -- <function>`
- `irq -- <function>`
- `object <class 'I2S'> is of type type`
- `readinto -- <function>`
- `shift -- <staticmethod>`
- `write -- <function>`

[--> umachine](#)

[--> Overview](#)

umachine --> PWM

MP Home

- `deinit -- <function>`
- `duty -- <function>`
- `duty_ns -- <function>`
- `duty_u16 -- <function>`
- `freq -- <function>`
- `init -- <function>`
- `object <class 'PWM'> is of type type`

[--> umachine](#)

[--> Overview](#)

umachine --> RTC

MP Home

- `datetime -- <function>`
- `init -- <function>`
- `memory -- <function>`
- `object <class 'RTC'> is of type type`

[--> umachine](#)

[--> Overview](#)

umachine --> SPI

MP Home

- `LSB -- 1`
- `MSB -- 0`
- `deinit -- <function>`
- `init -- <function>`
- `object <class 'SPI'> is of type type`
- `read -- <function>`
- `readinto -- <function>`
- `write -- <function>`
- `write_readinto -- <function>`

[--> umachine](#)

[--> Overview](#)

umachine --> SoftSPI

[MP Home](#)

- `LSB -- 1`
- `MSB -- 0`
- `deinit -- <function>`
- `init -- <function>`
- `object <class 'SoftSPI'> is of type type`
- `read -- <function>`
- `readinto -- <function>`
- `write -- <function>`
- `write_readinto -- <function>`

[--> umachine](#)[--> Overview](#)

umachine --> UART

[MP Home](#)

- `CTS -- 2`
- `INV_CTS -- 8`
- `INV_RTS -- 64`
- `INV_RX -- 4`
- `INV_TX -- 32`
- `RTS -- 1`
- `any -- <function>`
- `deinit -- <function>`
- `init -- <function>`
- `object <class 'UART'> is of type type`
- `read -- <function>`
- `readinto -- <function>`
- `readline -- <function>`
- `sendbreak -- <function>`
- `write -- <function>`

[--> umachine](#)[--> Overview](#)

UOS

[MP Home](#)

- `object <module 'uos'> is of type module`

- `__name__` -- `uos`
- `uname` -- `<function>`
- `urandom` -- `<function>`
- `chdir` -- `<function>`
- `getcwd` -- `<function>`
- `listdir` -- `<function>`
- `mkdir` -- `<function>`
- `remove` -- `<function>`
- `rename` -- `<function>`
- `rmdir` -- `<function>`
- `stat` -- `<function>`
- `statvfs` -- `<function>`
- `unlink` -- `<function>`
- `dupterm` -- `<function>`
- `dupterm_notify` -- `<function>`
- `ilistdir` -- `<function>`
- `mount` -- `<function>`
- `umount` -- `<function>`
- `VfsFat` -- `<class 'VfsFat'>`
- `VfsLfs2` -- `<class 'VfsLfs2'>`

--> [Overview](#)

uos --> VfsFat

MP Home

- `chdir` -- `<function>`
- `getcwd` -- `<function>`
- `ilistdir` -- `<function>`
- `mkdir` -- `<function>`
- `mkfs` -- `<staticmethod>`
- `mount` -- `<function>`
- `object <class 'VfsFat'> is of type type`
- `open` -- `<function>`
- `remove` -- `<function>`
- `rename` -- `<function>`
- `rmdir` -- `<function>`
- `stat` -- `<function>`
- `statvfs` -- `<function>`
- `umount` -- `<function>`

--> [uos](#)

--> [Overview](#)

uos --> VfsLfs2

MP Home

- `chdir` -- <function>
- `getcwd` -- <function>
- `listdir` -- <function>
- `mkdir` -- <function>
- `mkfs` -- <staticmethod>
- `mount` -- <function>
- `object` <class 'VfsLfs2'> is of type type
- `open` -- <function>
- `remove` -- <function>
- `rename` -- <function>
- `rmdir` -- <function>
- `stat` -- <function>
- `statvfs` -- <function>
- `umount` -- <function>

--> uos

--> Overview

upip

- `object` <module 'upip' from 'upip.py'> is of type module
- `main` -- <function main at 0x3fd8c330>
- `url_open` -- <function url_open at 0x3fd8bfd0>
- `fatal` -- <function fatal at 0x3fd8c000>
- `ssl` -- <module 'ssl'>
- `socket` -- <module 'socket'>
- `_makedirs` -- <function _makedirs at 0x3fd8c0f0>
- `save_file` -- <function save_file at 0x3fd8bfa0>
- `NotFoundError` -- <class 'NotFoundError'>
- `os` -- <module 'os'>
- `expandhome` -- <function expandhome at 0x3fd8bfc0>
- `__file__` -- upip.py
- `cleanup_files` -- []
- `uzlib` -- <module 'uzlib'>
- `tarfile` -- <module 'upip_utarfile' from 'upip_utarfile.py'>
- `install` -- <function install at 0x3fd8c250>
- `install_path` -- None
- `index_urls` -- ['https://micropython.org/pi', 'https://pypi.org/pypi']
- `sys` -- <module 'sys'>
- `__name__` -- upip
- `install_pkg` -- <function install_pkg at 0x3fd8c020>
- `get_pkg_metadata` -- <function get_pkg_metadata at 0x3fd8bfe0>
- `cleanup` -- <function cleanup at 0x3fd8c310>

- `gc -- <module 'gc'>`
- `''`
- `help -- <function help at 0x3fd8c320>`
- `gzdict_sz -- 31`
- `op_split -- <function op_split at 0x3fd8c030>`
- `debug -- False`
- `errno -- <module 'errno'>`
- `install_tar -- <function install_tar at 0x3fd8bfb0>`
- `json -- <module 'json'>`
- `warn_ussl -- True`
- `get_install_path -- <function get_install_path at 0x3fd8c270>`

--> [Overview](#)

upip --> NotFoundError

- `__module__ -- upip`
- `__qualname__ -- NotFoundError`
- `object <class 'NotFoundError'> is of type type`

--> [upip](#)

--> [Overview](#)

upip_utarfile

- `object <module 'upip_utarfile' from 'upip_utarfile.py'> is of type module`
- `FileSection -- <class 'FileSection'>`
- `TarInfo -- <class 'TarInfo'>`
- `__name__ -- upip_utarfile`
- `TarFile -- <class 'TarFile'>`
- `DIRTYPE -- dir`
- `TAR_HEADER -- {'name': (-1073741824, 100), 'size': (-1073741700, 11)}`
- `uctypes -- <module 'uctypes'>`
- `__file__ -- upip_utarfile.py`
- `roundup -- <function roundup at 0x3fdb1060>`
- `REGTYPE -- file`

--> [Overview](#)

upip_utarfile --> FileSection

- `__init__ -- <function __init__ at 0x3fdc83e0>`
- `__module__ -- upip_utarfile`
- `__qualname__ -- FileSection`
- `object <class 'FileSection'> is of type type`
- `read -- <function read at 0x3fdc8450>`
- `readinto -- <function readinto at 0x3fdc8470>`

- `skip -- <function skip at 0x3fdc8430>`

--> [upip_utarfile](#)

--> [Overview](#)

upip_utarfile --> TarInfo

- `__module__ -- upip_utarfile`
- `__qualname__ -- TarInfo`
- `__str__ -- <function __str__ at 0x3fdc8510>`
- `object <class 'TarInfo'> is of type type`

--> [upip_utarfile](#)

--> [Overview](#)

upip_utarfile --> TarFile

- `__init__ -- <function __init__ at 0x3fdc85d0>`
- `__iter__ -- <function __iter__ at 0x3fdc8500>`
- `__module__ -- upip_utarfile`
- `__next__ -- <function __next__ at 0x3fdc85f0>`
- `__qualname__ -- TarFile`
- `extractfile -- <function extractfile at 0x3fdc8600>`
- `next -- <function next at 0x3fdc8410>`
- `object <class 'TarFile'> is of type type`

--> [upip_utarfile](#)

--> [Overview](#)

uplatform

- `object <module 'uplatform'> is of type module`
- `__name__ -- uplatform`
- `platform -- <function>`
- `python_compiler -- <function>`
- `libc_ver -- <function>`

--> [Overview](#)

urandom

[MP Home](#)

- `object <module 'urandom'> is of type module`
- `__name__ -- urandom`

- `__init__` -- <function>
- `getrandbits` -- <function>
- `seed` -- <function>
- `randrange` -- <function>
- `randint` -- <function>
- `choice` -- <function>
- `random` -- <function>
- `uniform` -- <function>

--> [Overview](#)

ure

MP Home

- object <module 'ure'> is of type module
- `__name__` -- ure
- `compile` -- <function>
- `match` -- <function>
- `search` -- <function>
- `sub` -- <function>

--> [Overview](#)

uselect

MP Home

- object <module 'uselect'> is of type module
- `__name__` -- uselect
- `select` -- <function>
- `poll` -- <function>
- `POLLIN` -- 1
- `POLLOUT` -- 4
- `POLLERR` -- 8
- `POLLHUP` -- 16

--> [Overview](#)

usocket

MP Home

- object <module 'usocket'> is of type module
- `__name__` -- usocket

- `__init__` -- <function>
- `socket` -- <class 'socket'>
- `getaddrinfo` -- <function>
- `AF_INET` -- 2
- `AF_INET6` -- 10
- `SOCK_STREAM` -- 1
- `SOCK_DGRAM` -- 2
- `SOCK_RAW` -- 3
- `IPPROTO_TCP` -- 6
- `IPPROTO_UDP` -- 17
- `IPPROTO_IP` -- 0
- `SOL_SOCKET` -- 4095
- `SO_REUSEADDR` -- 4
- `IP_ADD_MEMBERSHIP` -- 3

--> [Overview](#)

usocket --> socket

MP Home

- `__del__` -- <function>
- `accept` -- <function>
- `bind` -- <function>
- `close` -- <function>
- `connect` -- <function>
- `fileno` -- <function>
- `listen` -- <function>
- `makefile` -- <function>
- `object <class 'socket'> is of type type`
- `read` -- <function>
- `readinto` -- <function>
- `readline` -- <function>
- `recv` -- <function>
- `recvfrom` -- <function>
- `send` -- <function>
- `sendall` -- <function>
- `sendto` -- <function>
- `setblocking` -- <function>
- `setsockopt` -- <function>
- `settimeout` -- <function>
- `write` -- <function>

--> [usocket](#)

--> [Overview](#)

ussl

[MP Home](#)

- `object <module 'ussl'> is of type module`
- `__name__ -- ssl`
- `wrap_socket -- <function>`

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ustruct

[MP Home](#)

- `object <module 'ustruct'> is of type module`
- `__name__ -- ustruct`
- `calcsz -- <function>`
- `pack -- <function>`
- `pack_into -- <function>`
- `unpack -- <function>`
- `unpack_from -- <function>`

[--> Overview](#)

usys

[MP Home](#)

Hile in Micropython hat fehlgeschlagen

[--> Overview](#)

utime

[MP Home](#)

- `object <module 'utime'> is of type module`
- `__name__ -- utime`
- `gmtime -- <function>`
- `localtime -- <function>`
- `mktime -- <function>`
- `time -- <function>`
- `sleep -- <function>`
- `sleep_ms -- <function>`

- `sleep_us` -- <function>
- `ticks_ms` -- <function>
- `ticks_us` -- <function>
- `ticks_cpu` -- <function>
- `ticks_add` -- <function>
- `ticks_diff` -- <function>
- `time_ns` -- <function>

--> [Overview](#)

utimeq

- `object` <module 'utimeq'> is of type module
- `__name__` -- utimeq
- `utimeq` -- <class 'utimeq'>

--> [Overview](#)

utimeq --> utimeq

- `object` <class 'utimeq'> is of type type
- `peektime` -- <function>
- `pop` -- <function>
- `push` -- <function>

--> [utimeq](#)

--> [Overview](#)

uwebsocket

- `object` <module 'uwebsocket'> is of type module
- `__name__` -- uwebsocket
- `websocket` -- <class 'websocket'>

--> [Overview](#)

uwebsocket --> websocket

- `close` -- <function>
- `ioctl` -- <function>
- `object` <class 'websocket'> is of type type
- `read` -- <function>
- `readinto` -- <function>
- `readline` -- <function>
- `write` -- <function>

--> [uwebsocket](#)

--> [Overview](#)

uzlib

MP Home

- `object <module 'uzlib'> is of type module`
- `__name__ -- uzlib`
- `decompress -- <function>`
- `DecompIO -- <class 'DecompIO'>`

--> [Overview](#)

uzlib --> DecompIO

MP Home

- `object <class 'DecompIO'> is of type type`
- `read -- <function>`
- `readinto -- <function>`
- `readline -- <function>`

--> [uzlib](#)

--> [Overview](#)

webrepl

MP ESP32 highlight

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--> [Overview](#)

webrepl_setup

MP ESP32 highlight

Hile in Micropython hat fehlgeschlagen

--> [Overview](#)

websocket_helper

- `object <module 'websocket_helper' from 'websocket_helper.py'> is of type module`
- `hashlib -- <module 'uhashlib'>`

- `binascii -- <module 'binascii'>`
- `__name__ -- websocket_helper`
- `__file__ -- websocket_helper.py`
- `sys -- <module 'sys'>`
- `DEBUG -- 0`
- `server_handshake -- <function server_handshake at 0x3fd98df0>`
- `client_handshake -- <function client_handshake at 0x3fd98e00>`

--> [Overview](#)