

Non-alphabetical

- ??
 - in regular expressions, 109
- ..
 - in pathnames, 586
- ..., **1899**
 - ellipsis literal, 27, 83
 - in doctests, 1476
 - interpreter prompt, 1473, 1671
 - placeholder, 142, 254, 259
- { } (curly brackets)
 - in regular expressions, 109
 - in string formatting, 99
- . (dot)
 - in glob-style wildcards, 403
 - in pathnames, 586
 - in printf-style formatting, 52, 66
 - in regular expressions, 109
 - in string formatting, 99
 - in Tkinter, 1406
- ! (exclamation)
 - in a command interpreter, 1393
 - in curses module, 706
 - in glob-style wildcards, 403, 404
 - in string formatting, 99
 - in struct format strings, 152
- (minus)
 - binary operator, 31
 - in doctests, 1478
 - in glob-style wildcards, 403, 404
 - in printf-style formatting, 52, 66
 - in regular expressions, 109
 - in string formatting, 101
 - unary operator, 31
- ! (pdb command), 1613
- ? (question mark)
 - in a command interpreter, 1393
 - in argparse module, 623
 - in AST grammar, 1785
 - in glob-style wildcards, 403, 404
 - in regular expressions, 109
 - in SQL statements, 447
 - in struct format strings, 154
 - replacement character, 160
- # (hash)
 - comment, 1742
 - in doctests, 1478
 - in printf-style formatting, 52, 66
 - in regular expressions, 115
 - in string formatting, 101
- \$ (dollar)
 - environment variables expansion, 386
 - in regular expressions, 109
 - in template strings, 106
 - interpolation in configuration files, 504
- % (percent)
 - datetime format, 203, 604, 606
 - environment variables expansion (Windows), 386, 1836
 - interpolation in configuration files, 504
 - operator, 31
 - printf-style formatting, 51, 66
- & (ampersand)
 - operator, 32
- (?
 - in regular expressions, 110
- (?!
 - in regular expressions, 111
- (?#
 - in regular expressions, 111
- () (parentheses)
 - in printf-style formatting, 52, 66
 - in regular expressions, 110
- (?:
 - in regular expressions, 110
- (?<!
 - in regular expressions, 112
- (?<=
 - in regular expressions, 111
- (?P<
 - in regular expressions, 111
- (?P=
 - in regular expressions, 111
- *?
 - in regular expressions, 111

- in regular expressions, 109
- * (asterisk)
 - in argparse module, 623
 - in AST grammar, 1785
 - in glob-style wildcards, 403, 404
 - in printf-style formatting, 52, 66
 - in regular expressions, 109
- operator, 31
- **
 - in glob-style wildcards, 403
- operator, 31
- +?
 - in regular expressions, 109
- + (plus)
 - binary operator, 31
 - in argparse module, 624
 - in doctests, 1478
 - in printf-style formatting, 52, 66
 - in regular expressions, 109
 - in string formatting, 101
- unary operator, 31
- , (comma)
 - in string formatting, 101
- / (slash)
 - in pathnames, 586
- operator, 31
- //
 - operator, 31
- 2to3, [1899](#)
- : (colon)
 - in SQL statements, 447
 - in string formatting, 99
 - path separator (POSIX), 586
- ; (semicolon), 586
- < (less)
 - in string formatting, 101
 - in struct format strings, 152
- operator, 30
- <<
 - operator, 32
- <=
 - operator, 30
- <BLANKLINE>, 1476
- !=
 - operator, 30
- = (equals)
 - in string formatting, 101
 - in struct format strings, 152
- ==
 - operator, 30
- > (greater)
 - in string formatting, 101
 - in struct format strings, 152
- operator, 30

- >=
 - operator, 30
- >>
 - operator, 32
- >>>
 - interpreter prompt, 1473, 1671
- @ (at)
 - in struct format strings, 152
- [] (square brackets)
 - in glob-style wildcards, 403, 404
 - in regular expressions, 109
 - in string formatting, 99
- \ (backslash)
 - escape sequence, 160
 - in pathnames (Windows), 586
 - in regular expressions, 109, 110, 112
- \\
 - in regular expressions, 113
- \A
 - in regular expressions, 112
- \a
 - in regular expressions, 113
- \B
 - in regular expressions, 112
- \b
 - in regular expressions, 112, 113
- \D
 - in regular expressions, 112
- \d
 - in regular expressions, 112
- \f
 - in regular expressions, 113
- \g
 - in regular expressions, 117
- \N
 - escape sequence, 160
 - in regular expressions, 113
- \n
 - in regular expressions, 113
- \r
 - in regular expressions, 113
- \S
 - in regular expressions, 113
- \s
 - in regular expressions, 112
- \t
 - in regular expressions, 113
- >>>, [1899](#)
- \U
 - escape sequence, 160
 - in regular expressions, 113
- \u
 - escape sequence, 160
 - in regular expressions, 113

- `\v`
 - in regular expressions, 113
- `\W`
 - in regular expressions, 113
- `\w`
 - in regular expressions, 113
- `\x`
 - escape sequence, 160
 - in regular expressions, 113
- `\Z`
 - in regular expressions, 113
- `^` (caret)
 - in curses module, 706
 - in regular expressions, 109, 110
 - in string formatting, 101
 - marker, 1475, 1716
 - operator, 32
- `_` (underscore)
 - `gettext`, 1342
 - in string formatting, 101
- `__abs__()` (in module operator), 360
- `__add__()` (in module operator), 360
- `__and__()` (in module operator), 360
- `__bases__` (class attribute), 84
- `__breakpointhook__` (in module sys), 1661
- `__bytes__()` (email.message.EmailMessage method), 1015
- `__bytes__()` (email.message.Message method), 1054
- `__call__()` (email.headerregistry.HeaderRegistry method), 1041
- `__call__()` (weakref.finalize method), 244
- `__callback__` (weakref.ref attribute), 242
- `__cause__` (traceback.TracebackException attribute), 1717
- `__ceil__()` (fractions.Fraction method), 323
- `__class__` (instance attribute), 84
- `__class__` (unittest.mock.Mock attribute), 1531
- `__code__` (function object attribute), 83
- `__concat__()` (in module operator), 361
- `__contains__()` (email.message.EmailMessage method), 1016
- `__contains__()` (email.message.Message method), 1055
- `__contains__()` (in module operator), 362
- `__contains__()` (mailbox.Mailbox method), 1085
- `__context__` (traceback.TracebackException attribute), 1717
- `__copy__()` (copy protocol), 253
- `__debug__` (built-in variable), 27
- `__deepcopy__()` (copy protocol), 253
- `__del__()` (io.IOBase method), 592
- `__delitem__()` (email.message.EmailMessage method), 1017
- `__delitem__()` (email.message.Message method), 1056
- `__delitem__()` (in module operator), 362
- `__delitem__()` (mailbox.Mailbox method), 1084
- `__delitem__()` (mailbox.MH method), 1089
- `__dict__` (object attribute), 84
- `__dir__()` (unittest.mock.Mock method), 1528
- `__displayhook__` (in module sys), 1661
- `__doc__` (types.ModuleType attribute), 250
- `__enter__()` (contextmanager method), 81
- `__enter__()` (winreg.PyHKEY method), 1842
- `__eq__()` (email.charset.Charset method), 1067
- `__eq__()` (email.header.Header method), 1065
- `__eq__()` (in module operator), 360
- `__eq__()` (instance method), 30
- `__eq__()` (memoryview method), 69
- `__excepthook__` (in module sys), 1661
- `__exit__()` (contextmanager method), 81
- `__exit__()` (winreg.PyHKEY method), 1842
- `__floor__()` (fractions.Fraction method), 322
- `__floordiv__()` (in module operator), 360
- `__format__`, 12
- `__format__()` (datetime.date method), 182
- `__format__()` (datetime.datetime method), 190
- `__format__()` (datetime.time method), 194
- `__fspath__()` (os.PathLike method), 543
- `__future__`, 1903
- `__future__` (module), 1722
- `__ge__()` (in module operator), 360
- `__ge__()` (instance method), 30
- `__getitem__()` (email.headerregistry.HeaderRegistry method), 1041
- `__getitem__()` (email.message.EmailMessage method), 1016
- `__getitem__()` (email.message.Message method), 1056
- `__getitem__()` (in module operator), 362
- `__getitem__()` (mailbox.Mailbox method), 1084
- `__getitem__()` (re.Match method), 121
- `__getnewargs__()` (object method), 421
- `__getnewargs_ex__()` (object method), 421
- `__getstate__()` (copy protocol), 425
- `__getstate__()` (object method), 421
- `__gt__()` (in module operator), 360
- `__gt__()` (instance method), 30
- `__iadd__()` (in module operator), 365
- `__iand__()` (in module operator), 365
- `__iconcat__()` (in module operator), 365
- `__ifloordiv__()` (in module operator), 365
- `__ilshift__()` (in module operator), 365
- `__imatmul__()` (in module operator), 365
- `__imod__()` (in module operator), 365
- `__import__()` (built-in function), 25
- `__import__()` (in module importlib), 1760

- `__imul__()` (in module operator), 365
- `__index__()` (in module operator), 360
- `__init__()` (`difflib.HtmlDiff` method), 129
- `__init__()` (`logging.Handler` method), 650
- `__interactivehook__` (in module `sys`), 1668
- `__inv__()` (in module operator), 361
- `__invert__()` (in module operator), 361
- `__ior__()` (in module operator), 366
- `__ipow__()` (in module operator), 366
- `__irshift__()` (in module operator), 366
- `__isub__()` (in module operator), 366
- `__iter__()` (container method), 36
- `__iter__()` (iterator method), 37
- `__iter__()` (`mailbox.Mailbox` method), 1084
- `__iter__()` (`unittest.TestSuite` method), 1512
- `__itruediv__()` (in module operator), 366
- `__ixor__()` (in module operator), 366
- `__le__()` (in module operator), 360
- `__le__()` (instance method), 30
- `__len__()` (`email.message.EmailMessage` method), 1016
- `__len__()` (`email.message.Message` method), 1055
- `__len__()` (`mailbox.Mailbox` method), 1085
- `__loader__` (`types.ModuleType` attribute), 250
- `__lshift__()` (in module operator), 361
- `__lt__()` (in module operator), 360
- `__lt__()` (instance method), 30
- `__main__`
 - `module`, 1757, 1758
- `__main__` (module), 1681
- `__matmul__()` (in module operator), 361
- `__missing__()`, 78
- `__missing__()` (`collections.defaultdict` method), 220
- `__mod__()` (in module operator), 361
- `__mro__` (class attribute), 84
- `__mul__()` (in module operator), 361
- `__name__` (definition attribute), 84
- `__name__` (`types.ModuleType` attribute), 250
- `__ne__()` (`email.charset.Charset` method), 1067
- `__ne__()` (`email.header.Header` method), 1065
- `__ne__()` (in module operator), 360
- `__ne__()` (instance method), 30
- `__neg__()` (in module operator), 361
- `__next__()` (`csv.csvreader` method), 497
- `__next__()` (iterator method), 37
- `__not__()` (in module operator), 360
- `__or__()` (in module operator), 361
- `__package__` (`types.ModuleType` attribute), 250
- `__pos__()` (in module operator), 361
- `__pow__()` (in module operator), 361
- `__qualname__` (definition attribute), 84
- `__reduce__()` (object method), 422
- `__reduce_ex__()` (object method), 422
- `__repr__()` (`multiprocessing.managers.BaseProxy` method), 790
- `__repr__()` (`netrc.netrc` method), 518
- `__round__()` (`fractions.Fraction` method), 323
- `__rshift__()` (in module operator), 361
- `__setitem__()` (`email.message.EmailMessage` method), 1016
- `__setitem__()` (`email.message.Message` method), 1056
- `__setitem__()` (in module operator), 362
- `__setitem__()` (`mailbox.Mailbox` method), 1084
- `__setitem__()` (`mailbox.Maildir` method), 1087
- `__setstate__()` (`copy` protocol), 425
- `__setstate__()` (object method), 421
- `__slots__`, 1909
- `__stderr__` (in module `sys`), 1675
- `__stdin__` (in module `sys`), 1675
- `__stdout__` (in module `sys`), 1675
- `__str__()` (`datetime.date` method), 181
- `__str__()` (`datetime.datetime` method), 189
- `__str__()` (`datetime.time` method), 194
- `__str__()` (`email.charset.Charset` method), 1067
- `__str__()` (`email.header.Header` method), 1065
- `__str__()` (`email.headerregistry.Address` method), 1042
- `__str__()` (`email.headerregistry.Group` method), 1042
- `__str__()` (`email.message.EmailMessage` method), 1015
- `__str__()` (`email.message.Message` method), 1053
- `__str__()` (`multiprocessing.managers.BaseProxy` method), 790
- `__sub__()` (in module operator), 361
- `__subclasses__()` (class method), 84
- `__subclasshook__()` (`abc.ABCMeta` method), 1710
- `__suppress_context__` (`traceback.TracebackException` attribute), 1717
- `__truediv__()` (in module operator), 361
- `__xor__()` (in module operator), 361
- `__anonymous__` (`ctypes.Structure` attribute), 749
- `__asdict__()` (`collections.namedtuple` method), 222
- `__b_base__` (`ctypes._CData` attribute), 745
- `__b_needsfree__` (`ctypes._CData` attribute), 745
- `__callmethod__` (`multiprocessing.managers.BaseProxy` method), 790
- `__CData` (class in `ctypes`), 745
- `__clear_type_cache__()` (in module `sys`), 1660
- `__current_frames__()` (in module `sys`), 1660
- `__debugmallocstats__()` (in module `sys`), 1660
- `__dummy_thread` (module), 838
- `__enablelegacywindowsfsencoding__()` (in module `sys`), 1674
- `__exit__()` (in module `os`), 576

- `__fields` (ast.AST attribute), 1785
 - `__fields` (collections.somenamedtuple attribute), 223
 - `__fields__` (ctypes.Structure attribute), 748
 - `__fields_defaults` (collections.somenamedtuple attribute), 223
 - `__flush()` (wsgiref.handlers.BaseHandler method), 1190
 - `__FuncPtr` (class in ctypes), 739
 - `__get_child_mock()` (unittest.mock.Mock method), 1528
 - `__getframe()` (in module sys), 1666
 - `__getvalue()` (multiprocessing.managers.BaseProxy method), 790
 - `__handle` (ctypes.PyDLL attribute), 738
 - `__length__` (ctypes.Array attribute), 749
 - `__locale`
 - module, 1349
 - `__make()` (collections.somenamedtuple class method), 222
 - `__makeResult()` (unittest.TextTestRunner method), 1517
 - `__name` (ctypes.PyDLL attribute), 738
 - `__objects` (ctypes._CData attribute), 745
 - `__pack__` (ctypes.Structure attribute), 749
 - `__parse()` (gettext.NullTranslations method), 1344
 - `__Pointer` (class in ctypes), 750
 - `__replace()` (collections.somenamedtuple method), 223
 - `__setroot()` (xml.etree.ElementTree.ElementTree method), 1130
 - `__SimpleCData` (class in ctypes), 745
 - `__structure()` (in module email.iterators), 1071
 - `__thread` (module), 836
 - `__type__` (ctypes._Pointer attribute), 750
 - `__type__` (ctypes.Array attribute), 750
 - `__write()` (wsgiref.handlers.BaseHandler method), 1189
 - `__xoptions` (in module sys), 1676
 - | (vertical bar)
 - in regular expressions, 110
 - operator, 32
 - ~ (tilde)
 - home directory expansion, 386
 - operator, 32
- ## A
- A (in module re), 114
 - a, -annotate
 - pickletools command line option, 1820
 - `a2b_base64()` (in module binascii), 1107
 - `a2b_hex()` (in module binascii), 1109
 - `a2b_hqx()` (in module binascii), 1108
 - `a2b_qp()` (in module binascii), 1107
 - `a2b_uu()` (in module binascii), 1107
 - `a85decode()` (in module base64), 1105
 - `a85encode()` (in module base64), 1105
 - ABC (class in abc), 1709
 - abc (module), 1709
 - ABCMeta (class in abc), 1709
 - abiflags (in module sys), 1659
 - `abort()` (asyncio.DatagramTransport method), 902
 - `abort()` (asyncio.WriteTransport method), 901
 - `abort()` (ftplib.FTP method), 1231
 - `abort()` (in module os), 575
 - `abort()` (threading.Barrier method), 762
 - `above()` (curses.panel.Panel method), 707
 - ABOVE_NORMAL_PRIORITY_CLASS (in module subprocess), 824
 - `abs()` (built-in function), 5
 - `abs()` (decimal.Context method), 308
 - `abs()` (in module operator), 360
 - `abspath()` (in module os.path), 385
 - abstract base class, 1899
 - AbstractAsyncContextManager (class in contextlib), 1696
 - AbstractBasicAuthHandler (class in urllib.request), 1196
 - AbstractChildWatcher (class in asyncio), 914
 - `abstractclassmethod()` (in module abc), 1712
 - AbstractContextManager (class in contextlib), 1696
 - AbstractDigestAuthHandler (class in urllib.request), 1197
 - AbstractEventLoop (class in asyncio), 892
 - AbstractEventLoopPolicy (class in asyncio), 912
 - AbstractFormatter (class in formatter), 1823
 - `abstractmethod()` (in module abc), 1711
 - `abstractproperty()` (in module abc), 1713
 - AbstractSet (class in typing), 1459
 - `abstractstaticmethod()` (in module abc), 1713
 - AbstractWriter (class in formatter), 1824
 - `accept()` (asyncore.dispatcher method), 998
 - `accept()` (multiprocessing.connection.Listener method), 794
 - `accept()` (socket.socket method), 938
 - `access()` (in module os), 557
 - `accumulate()` (in module itertools), 338
 - `aclose()` (contextlib.AsyncExitStack method), 1703
 - `acos()` (in module cmath), 291
 - `acos()` (in module math), 287
 - `acosh()` (in module cmath), 291
 - `acosh()` (in module math), 288
 - `acquire()` (_thread.lock method), 837
 - `acquire()` (asyncio.Condition method), 865
 - `acquire()` (asyncio.Lock method), 863
 - `acquire()` (asyncio.Semaphore method), 866
 - `acquire()` (logging.Handler method), 650
 - `acquire()` (multiprocessing.Lock method), 779
 - `acquire()` (multiprocessing.RLock method), 780

- ul style="list-style-type: none; padding-left: 0;">
- acquire() (threading.Condition method), 758
- acquire() (threading.Lock method), 755
- acquire() (threading.RLock method), 756
- acquire() (threading.Semaphore method), 759
- acquire_lock() (in module imp), 1893
- Action (class in argparse), 630
- action (optparse.Option attribute), 1876
- ACTIONS (optparse.Option attribute), 1889
- active_children() (in module multiprocessing), 775
- active_count() (in module threading), 751
- add() (decimal.Context method), 308
- add() (frozenset method), 76
- add() (in module audioop), 1321
- add() (in module operator), 360
- add() (mailbox.Mailbox method), 1083
- add() (mailbox.Maildir method), 1087
- add() (msilib.RadioButtonGroup method), 1831
- add() (pstats.Stats method), 1618
- add() (tarfile.TarFile method), 486
- add() (tkinter.ttk.Notebook method), 1422
- add_alias() (in module email.charset), 1068
- add_alternative() (email.message.EmailMessage method), 1021
- add_argument() (argparse.ArgumentParser method), 620
- add_argument_group() (argparse.ArgumentParser method), 638
- add_attachment() (email.message.EmailMessage method), 1022
- add_cgi_vars() (wsgiref.handlers.BaseHandler method), 1190
- add_charset() (in module email.charset), 1067
- add_child_handler() (asyncio.AbstractChildWatcher method), 914
- add_codec() (in module email.charset), 1068
- add_cookie_header() (http.cookiejar.CookieJar method), 1285
- add_data() (in module msilib), 1828
- add_done_callback() (asyncio.Future method), 896
- add_done_callback() (asyncio.Task method), 855
- add_done_callback() (concurrent.futures.Future method), 812
- add_fallback() (gettext.NullTranslations method), 1344
- add_file() (msilib.Directory method), 1830
- add_flag() (mailbox.MaildirMessage method), 1092
- add_flag() (mailbox.mboxMessage method), 1094
- add_flag() (mailbox.MMDFMessage method), 1098
- add_flowng_data() (formatter.formatter method), 1822
- add_folder() (mailbox.Maildir method), 1087
- add_folder() (mailbox.MH method), 1088
- add_get_handler() (email.contentmanager.ContentManager method), 1043
- add_handler() (urllib.request.OpenerDirector method), 1199
- add_header() (email.message.EmailMessage method), 1017
- add_header() (email.message.Message method), 1056
- add_header() (urllib.request.Request method), 1198
- add_header() (wsgiref.headers.Headers method), 1186
- add_history() (in module readline), 147
- add_hor_rule() (formatter.formatter method), 1822
- add_label() (mailbox.BabylMessage method), 1096
- add_label_data() (formatter.formatter method), 1822
- add_line_break() (formatter.formatter method), 1822
- add_literal_data() (formatter.formatter method), 1822
- add_mutually_exclusive_group() (argparse.ArgumentParser method), 639
- add_option() (optparse.OptionParser method), 1875
- add_parent() (urllib.request.BaseHandler method), 1200
- add_password() (urllib.request.HTTPPasswordMgr method), 1202
- add_password() (urllib.request.HTTPPasswordMgrWithPriorAuth method), 1203
- add_reader() (asyncio.loop method), 884
- add_related() (email.message.EmailMessage method), 1021
- add_section() (configparser.ConfigParser method), 513
- add_section() (configparser.RawConfigParser method), 516
- add_sequence() (mailbox.MHMessage method), 1095
- add_set_handler() (email.contentmanager.ContentManager method), 1043
- add_signal_handler() (asyncio.loop method), 886
- add_stream() (in module msilib), 1828
- add_subparsers() (argparse.ArgumentParser method), 634
- add_tables() (in module msilib), 1828
- add_type() (in module mimetypes), 1101
- add_unredirected_header() (urllib.request.Request method), 1199
- add_writer() (asyncio.loop method), 884
- addch() (curses.window method), 692
- addCleanup() (unittest.TestCase method), 1510
- addComponent() (turtle.Shape method), 1386
- addError() (unittest.TestResult method), 1516
- addExpectedFailure() (unittest.TestResult method), 1516

- `addFailure()` (`unittest.TestResult` method), 1516
- `addfile()` (`tarfile.TarFile` method), 486
- `addFilter()` (`logging.Handler` method), 650
- `addFilter()` (`logging.Logger` method), 648
- `addHandler()` (`logging.Logger` method), 649
- `addLevelName()` (in module `logging`), 658
- `addnstr()` (`curses.window` method), 692
- `AddPackagePath()` (in module `modulefinder`), 1756
- `addr` (`smtpd.SMTPChannel` attribute), 1259
- `addr_spec` (`email.headerregistry.Address` attribute), 1042
- `Address` (class in `email.headerregistry`), 1041
- `address` (`email.headerregistry.SingleAddressHeader` attribute), 1040
- `address` (`multiprocessing.connection.Listener` attribute), 794
- `address` (`multiprocessing.managers.BaseManager` attribute), 785
- `address_exclude()` (`ipaddress.IPv4Network` method), 1313
- `address_exclude()` (`ipaddress.IPv6Network` method), 1315
- `address_family` (`socketserver.BaseServer` attribute), 1269
- `address_string()` (`http.server.BaseHTTPRequestHandler` method), 1278
- `addresses` (`email.headerregistry.AddressHeader` attribute), 1040
- `addresses` (`email.headerregistry.Group` attribute), 1042
- `AddressHeader` (class in `email.headerregistry`), 1039
- `addressof()` (in module `ctypes`), 742
- `AddressValueError`, 1319
- `addshape()` (in module `turtle`), 1384
- `addsitedir()` (in module `site`), 1744
- `addSkip()` (`unittest.TestResult` method), 1516
- `addstr()` (`curses.window` method), 692
- `addSubTest()` (`unittest.TestResult` method), 1517
- `addSuccess()` (`unittest.TestResult` method), 1516
- `addTest()` (`unittest.TestSuite` method), 1512
- `addTests()` (`unittest.TestSuite` method), 1512
- `addTypeEqualityFunc()` (`unittest.TestCase` method), 1508
- `addUnexpectedSuccess()` (`unittest.TestResult` method), 1516
- `adjusted()` (`decimal.Decimal` method), 299
- `adler32()` (in module `zlib`), 459
- `ADPCM`, Intel/DVI, 1321
- `adpcm2lin()` (in module `audioop`), 1321
- `AF_ALG` (in module `socket`), 932
- `AF_CAN` (in module `socket`), 931
- `AF_INET` (in module `socket`), 930
- `AF_INET6` (in module `socket`), 930
- `AF_LINK` (in module `socket`), 932
- `AF_PACKET` (in module `socket`), 932
- `AF_RDS` (in module `socket`), 932
- `AF_UNIX` (in module `socket`), 930
- `AF_VSOCK` (in module `socket`), 932
- `aifc` (module), 1324
- `aifc()` (`aifc.aifc` method), 1326
- `AIFF`, 1324, 1332
- `aiff()` (`aifc.aifc` method), 1325
- `AIFF-C`, 1324, 1332
- `alarm()` (in module `signal`), 1004
- `A-LAW`, 1326, 1334
- `a-LAW`, 1321
- `alaw2lin()` (in module `audioop`), 1321
- `ALERT_DESCRIPTION_HANDSHAKE_FAILURE` (in module `ssl`), 962
- `ALERT_DESCRIPTION_INTERNAL_ERROR` (in module `ssl`), 962
- `AlertDescription` (class in `ssl`), 962
- `algorithms_available` (in module `hashlib`), 526
- `algorithms_guaranteed` (in module `hashlib`), 526
- `alias` (`pdb` command), 1613
- `alignment()` (in module `ctypes`), 742
- `alive` (`weakref.finalize` attribute), 244
- `all()` (built-in function), 5
- `all_errors` (in module `ftplib`), 1230
- `all_features` (in module `xml.sax.handler`), 1154
- `all_frames` (`tracemalloc.Filter` attribute), 1636
- `all_properties` (in module `xml.sax.handler`), 1154
- `all_suffixes()` (in module `importlib.machinery`), 1770
- `all_tasks()` (`asyncio.Task` class method), 855
- `all_tasks()` (in module `asyncio`), 853
- `allocate_lock()` (in module `_thread`), 836
- `allow_reuse_address` (`socketserver.BaseServer` attribute), 1269
- `allowed_domains()` (`http.cookiejar.DefaultCookiePolicy` method), 1289
- `alt()` (in module `curses.ascii`), 706
- `ALT_DIGITS` (in module `locale`), 1353
- `altsep` (in module `os`), 586
- `altzone` (in module `time`), 609
- `ALWAYS_TYPED_ACTIONS` (`optparse.Option` attribute), 1889
- `AMPER` (in module `token`), 1794
- `AMPEREQUAL` (in module `token`), 1794
- `and`
 - operator, 29
- `and_()` (in module `operator`), 360
- `annotation`, 1899
- `annotation` (`inspect.Parameter` attribute), 1733
- `answer_challenge()` (in module `multiprocessing.connection`), 793
- `anticipate_failure()` (in module `test.support`), 1593
- `Any` (in module `typing`), 1465
- `ANY` (in module `unittest.mock`), 1552

- `any()` (built-in function), 5
- `AnyStr` (in module `typing`), 1466
- `api_version` (in module `sys`), 1676
- `apop()` (`poplib.POP3` method), 1235
- `append()` (`array.array` method), 239
- `append()` (`collections.deque` method), 216
- `append()` (`email.header.Header` method), 1064
- `append()` (`imaplib.IMAP4` method), 1238
- `append()` (`msilib.CAB` method), 1830
- `append()` (`pipes.Template` method), 1856
- `append()` (sequence method), 39
- `append()` (`xml.etree.ElementTree.Element` method), 1128
- `append_history_file()` (in module `readline`), 147
- `appendChild()` (`xml.dom.Node` method), 1137
- `appendleft()` (`collections.deque` method), 216
- `application_uri()` (in module `wsgiref.util`), 1184
- `apply` (2to3 fixer), 1580
- `apply()` (`multiprocessing.pool.Pool` method), 791
- `apply_async()` (`multiprocessing.pool.Pool` method), 791
- `apply_defaults()` (`inspect.BoundsArguments` method), 1735
- `architecture()` (in module `platform`), 708
- `archive` (`zipimport.zipimporter` attribute), 1752
- `aRepr` (in module `reprlib`), 259
- `argparse` (module), 610
- `args` (`BaseException` attribute), 88
- `args` (`functools.partial` attribute), 359
- `args` (`inspect.BoundsArguments` attribute), 1735
- `args` (`pdb` command), 1612
- `args` (`subprocess.CompletedProcess` attribute), 815
- `args` (`subprocess.Popen` attribute), 822
- `args_from_interpreter_flags()` (in module `test.support`), 1591
- `argtypes` (`ctypes._FuncPtr` attribute), 739
- `argument`, 1899
- `ArgumentDefaultsHelpFormatter` (class in `argparse`), 615
- `ArgumentError`, 740
- `ArgumentParser` (class in `argparse`), 612
- `arguments` (`inspect.BoundsArguments` attribute), 1734
- `argv` (in module `sys`), 1659
- `arithmetic`, 31
- `ArithmeticError`, 88
- `array`
 - module, 53
- `array` (class in `array`), 238
- `Array` (class in `ctypes`), 749
- `array` (module), 238
- `Array()` (in module `multiprocessing`), 781
- `Array()` (in module `multiprocessing.sharedctypes`), 782
- `Array()` (`multiprocessing.managers.SyncManager` method), 786
- `arrays`, 238
- `arraysize` (`sqlite3.Cursor` attribute), 450
- `article()` (`nntplib.NNTP` method), 1248
- `as_bytes()` (`email.message.EmailMessage` method), 1015
- `as_bytes()` (`email.message.Message` method), 1053
- `as_completed()` (in module `asyncio`), 852
- `as_completed()` (in module `concurrent.futures`), 813
- `as_integer_ratio()` (`decimal.Decimal` method), 299
- `as_integer_ratio()` (`float` method), 34
- `AS_IS` (in module `formatter`), 1821
- `as_posix()` (`pathlib.PurePath` method), 374
- `as_string()` (`email.message.EmailMessage` method), 1015
- `as_string()` (`email.message.Message` method), 1053
- `as_tuple()` (`decimal.Decimal` method), 299
- `as_uri()` (`pathlib.PurePath` method), 375
- `ASCII` (in module `re`), 114
- `ascii` (built-in function), 5
- `ascii()` (in module `curses.ascii`), 706
- `ascii_letters` (in module `string`), 97
- `ascii_lowercase` (in module `string`), 97
- `ascii_uppercase` (in module `string`), 97
- `asctime()` (in module `time`), 601
- `asdict()` (in module `dataclasses`), 1691
- `asin()` (in module `cmath`), 291
- `asin()` (in module `math`), 287
- `asinh()` (in module `cmath`), 291
- `asinh()` (in module `math`), 288
- `assert`
 - statement, 88
- `assert_any_call()` (`unittest.mock.Mock` method), 1526
- `assert_called()` (`unittest.mock.Mock` method), 1525
- `assert_called_once()` (`unittest.mock.Mock` method), 1525
- `assert_called_once_with()` (`unittest.mock.Mock` method), 1525
- `assert_called_with()` (`unittest.mock.Mock` method), 1525
- `assert_has_calls()` (`unittest.mock.Mock` method), 1526
- `assert_line_data()` (`formatter.formatter` method), 1823
- `assert_not_called()` (`unittest.mock.Mock` method), 1526
- `assert_python_failure()` (in module `test.support.script_helper`), 1599
- `assert_python_ok()` (in module `test.support.script_helper`), 1599
- `assertAlmostEqual()` (`unittest.TestCase` method), 1507

- `assertCountEqual()` (`unittest.TestCase` method), 1508
- `assertDictEqual()` (`unittest.TestCase` method), 1509
- `assertEqual()` (`unittest.TestCase` method), 1504
- `assertFalse()` (`unittest.TestCase` method), 1504
- `assertGreater()` (`unittest.TestCase` method), 1508
- `assertGreaterEqual()` (`unittest.TestCase` method), 1508
- `assertIn()` (`unittest.TestCase` method), 1504
- `AssertionError`, 88
- `assertIs()` (`unittest.TestCase` method), 1504
- `assertIsInstance()` (`unittest.TestCase` method), 1505
- `assertIsNone()` (`unittest.TestCase` method), 1504
- `assertIsNot()` (`unittest.TestCase` method), 1504
- `assertIsNotNone()` (`unittest.TestCase` method), 1504
- `assertLess()` (`unittest.TestCase` method), 1508
- `assertLessEqual()` (`unittest.TestCase` method), 1508
- `assertListEqual()` (`unittest.TestCase` method), 1509
- `assertLogs()` (`unittest.TestCase` method), 1507
- `assertMultiLineEqual()` (`unittest.TestCase` method), 1509
- `assertNotAlmostEqual()` (`unittest.TestCase` method), 1507
- `assertNotEqual()` (`unittest.TestCase` method), 1504
- `assertNotIn()` (`unittest.TestCase` method), 1504
- `assertNotIsInstance()` (`unittest.TestCase` method), 1505
- `assertNotRegex()` (`unittest.TestCase` method), 1508
- `assertRaises()` (`unittest.TestCase` method), 1505
- `assertRaisesRegex()` (`unittest.TestCase` method), 1505
- `assertRegex()` (`unittest.TestCase` method), 1508
- `asserts` (2to3 fixer), 1580
- `assertSequenceEqual()` (`unittest.TestCase` method), 1509
- `assertSetEqual()` (`unittest.TestCase` method), 1509
- `assertTrue()` (`unittest.TestCase` method), 1504
- `assertTupleEqual()` (`unittest.TestCase` method), 1509
- `assertWarns()` (`unittest.TestCase` method), 1506
- `assertWarnsRegex()` (`unittest.TestCase` method), 1506
- `assignment`
 - `slice`, 39
 - `subscript`, 39
- `AST` (class in `ast`), 1785
- `ast` (module), 1785
- `astimezone()` (`datetime.datetime` method), 187
- `astuple()` (in module `dataclasses`), 1691
- `async_chat` (class in `asyncchat`), 1000
- `async_chat.ac_in_buffer_size` (in module `asyncchat`), 1000
- `async_chat.ac_out_buffer_size` (in module `asyncchat`), 1000
- `AsyncContextManager` (class in `typing`), 1461
- `asynccontextmanager()` (in module `contextlib`), 1697
- `AsyncExitStack` (class in `contextlib`), 1702
- `AsyncGenerator` (class in `collections.abc`), 230
- `AsyncGenerator` (class in `typing`), 1462
- `AsyncGeneratorType` (in module `types`), 249
- `asyncchat` (module), 1000
- `asynchronous context manager`, 1900
- `asynchronous generator`, 1900
- `asynchronous generator iterator`, 1900
- `asynchronous iterable`, 1900
- `asynchronous iterator`, 1900
- `asyncio` (module), 843
- `asyncio.subprocess.DEVNULL` (in module `asyncio`), 868
- `asyncio.subprocess.PIPE` (in module `asyncio`), 868
- `asyncio.subprocess.Process` (class in `asyncio`), 868
- `asyncio.subprocess.STDOUT` (in module `asyncio`), 868
- `AsyncIterable` (class in `collections.abc`), 230
- `AsyncIterable` (class in `typing`), 1461
- `AsyncIterator` (class in `collections.abc`), 230
- `AsyncIterator` (class in `typing`), 1461
- `asyncore` (module), 995
- `AsyncResult` (class in `multiprocessing.pool`), 792
- `AT` (in module `token`), 1794
- `at_eof()` (`asyncio.StreamReader` method), 858
- `atan()` (in module `cmath`), 291
- `atan()` (in module `math`), 287
- `atan2()` (in module `math`), 287
- `atanh()` (in module `cmath`), 291
- `atanh()` (in module `math`), 288
- `ATEQUAL` (in module `token`), 1794
- `atexit` (module), 1714
- `atexit` (`weakref.finalize` attribute), 244
- `atof()` (in module `locale`), 1354
- `atoi()` (in module `locale`), 1354
- `attach()` (`email.message.Message` method), 1054
- `attach_loop()` (`asyncio.AbstractChildWatcher` method), 914
- `attach_mock()` (`unittest.mock.Mock` method), 1527
- `AttlistDeclHandler()` (`xml.parsers.expat.xmlparser` method), 1166
- `attrgetter()` (in module `operator`), 362
- `attrib` (`xml.etree.ElementTree.Element` attribute), 1128
- `attribute`, 1900
- `AttributeError`, 88
- `attributes` (`xml.dom.Node` attribute), 1136
- `AttributesImpl` (class in `xml.sax.xmlreader`), 1159
- `AttributesNSImpl` (class in `xml.sax.xmlreader`), 1159
- `attroff()` (`curses.window` method), 692
- `attron()` (`curses.window` method), 693
- `attrset()` (`curses.window` method), 693
- `Audio Interchange File Format`, 1324, 1332

- AUDIO_FILE_ENCODING_ADPCM_G721 (in module sunau), [1327](#)
- AUDIO_FILE_ENCODING_ADPCM_G722 (in module sunau), [1327](#)
- AUDIO_FILE_ENCODING_ADPCM_G723_3 (in module sunau), [1327](#)
- AUDIO_FILE_ENCODING_ADPCM_G723_5 (in module sunau), [1327](#)
- AUDIO_FILE_ENCODING_ALAW_8 (in module sunau), [1327](#)
- AUDIO_FILE_ENCODING_DOUBLE (in module sunau), [1327](#)
- AUDIO_FILE_ENCODING_FLOAT (in module sunau), [1327](#)
- AUDIO_FILE_ENCODING_LINEAR_8 (in module sunau), [1327](#)
- AUDIO_FILE_ENCODING_LINEAR_16 (in module sunau), [1327](#)
- AUDIO_FILE_ENCODING_LINEAR_24 (in module sunau), [1327](#)
- AUDIO_FILE_ENCODING_LINEAR_32 (in module sunau), [1327](#)
- AUDIO_FILE_ENCODING_MULAW_8 (in module sunau), [1327](#)
- AUDIO_FILE_MAGIC (in module sunau), [1327](#)
- AUDIODEV, [1335](#)
- audioop (module), [1321](#)
- auth() (ftplib.FTP_TLS method), [1233](#)
- auth() (smtplib.SMTP method), [1253](#)
- authenticate() (imaplib.IMAP4 method), [1238](#)
- AuthenticationError, [772](#)
- authenticators() (netrc.netrc method), [518](#)
- authkey (multiprocessing.Process attribute), [771](#)
- auto (class in enum), [261](#)
- autorange() (timeit.Timer method), [1624](#)
- avg() (in module audioop), [1321](#)
- avgpp() (in module audioop), [1321](#)
- avoids_symlink_attacks (shutil.rmtree attribute), [409](#)
- awaitable, [1900](#)
- Awaitable (class in collections.abc), [229](#)
- Awaitable (class in typing), [1461](#)
- B**
- b
 - compileall command line option, [1803](#)
- b, -buffer
 - unittest command line option, [1495](#)
- b2a_base64() (in module binascii), [1107](#)
- b2a_hex() (in module binascii), [1108](#)
- b2a_hqx() (in module binascii), [1108](#)
- b2a_qp() (in module binascii), [1108](#)
- b2a_uu() (in module binascii), [1107](#)
- b16decode() (in module base64), [1105](#)
- b16encode() (in module base64), [1105](#)
- b32decode() (in module base64), [1104](#)
- b32encode() (in module base64), [1104](#)
- b64decode() (in module base64), [1104](#)
- b64encode() (in module base64), [1104](#)
- b85decode() (in module base64), [1105](#)
- b85encode() (in module base64), [1105](#)
- Babyl (class in mailbox), [1089](#)
- BabylMessage (class in mailbox), [1096](#)
- back() (in module turtle), [1362](#)
- backslashreplace_errors() (in module codecs), [161](#)
- backup() (sqlite3.Connection method), [447](#)
- backward() (in module turtle), [1362](#)
- BadStatusLine, [1223](#)
- BadZipFile, [474](#)
- BadZipfile, [474](#)
- Balloon (class in tkinter.tix), [1434](#)
- Barrier (class in multiprocessing), [779](#)
- Barrier (class in threading), [762](#)
- Barrier() (multiprocessing.managers.SyncManager method), [785](#)
- base64
 - encoding, [1103](#)
 - module, [1107](#)
- base64 (module), [1103](#)
- base_exec_prefix (in module sys), [1659](#)
- base_prefix (in module sys), [1659](#)
- BaseCGIHandler (class in wsgiref.handlers), [1189](#)
- BaseCookie (class in http.cookies), [1280](#)
- BaseException, [87](#)
- BaseHandler (class in urllib.request), [1196](#)
- BaseHandler (class in wsgiref.handlers), [1189](#)
- BaseHeader (class in email.headerregistry), [1038](#)
- BaseHTTPRequestHandler (class in http.server), [1275](#)
- BaseManager (class in multiprocessing.managers), [784](#)
- basename() (in module os.path), [385](#)
- BaseProtocol (class in asyncio), [903](#)
- BaseProxy (class in multiprocessing.managers), [789](#)
- BaseRequestHandler (class in socketserver), [1270](#)
- BaseRotatingHandler (class in logging.handlers), [674](#)
- BaseSelector (class in selectors), [993](#)
- BaseServer (class in socketserver), [1268](#)
- basestring (2to3 fixer), [1581](#)
- BaseTransport (class in asyncio), [899](#)
- basicConfig() (in module logging), [659](#)
- BasicContext (class in decimal), [305](#)
- BasicInterpolation (class in configparser), [504](#)
- BasicTestRunner (class in test.support), [1598](#)
- baudrate() (in module curses), [686](#)
- bbox() (tkinter.ttk.Treeview method), [1426](#)
- BDADDR_ANY (in module socket), [933](#)
- BDADDR_LOCAL (in module socket), [933](#)

- bdb
 - module, 1608
- Bdb (class in bdb), 1602
- bdb (module), 1601
- BdbQuit, 1601
- BDFL, 1900
- beep() (in module curses), 686
- Beep() (in module winsound), 1842
- BEFORE_ASYNC_WITH (opcode), 1812
- begin_fill() (in module turtle), 1372
- begin_poly() (in module turtle), 1377
- below() (curses.panel.Panel method), 707
- BELOW_NORMAL_PRIORITY_CLASS (in module subprocess), 824
- Benchmarking, 1622
- benchmarking, 601, 604, 607
- betavariate() (in module random), 326
- bgcolor() (in module turtle), 1379
- bgpic() (in module turtle), 1379
- bias() (in module audioop), 1321
- bidirectional() (in module unicodedata), 143
- bigaddrspacetest() (in module test.support), 1594
- BigEndianStructure (class in ctypes), 748
- bigmemtest() (in module test.support), 1594
- bin() (built-in function), 6
- binary
 - data, packing, 151
 - literals, 31
- Binary (class in msilib), 1828
- Binary (class in xmlrpc.client), 1296
- binary file, 1900
- binary mode, 18
- binary semaphores, 836
- BINARY_ADD (opcode), 1811
- BINARY_AND (opcode), 1811
- BINARY_FLOOR_DIVIDE (opcode), 1811
- BINARY_LSHIFT (opcode), 1811
- BINARY_MATRIX_MULTIPLY (opcode), 1811
- BINARY_MODULO (opcode), 1811
- BINARY_MULTIPLY (opcode), 1810
- BINARY_OR (opcode), 1811
- BINARY_POWER (opcode), 1810
- BINARY_RSHIFT (opcode), 1811
- BINARY_SUBSCR (opcode), 1811
- BINARY_SUBTRACT (opcode), 1811
- BINARY_TRUE_DIVIDE (opcode), 1811
- BINARY_XOR (opcode), 1811
- BinaryIO (class in typing), 1463
- binascii (module), 1107
- bind (widgets), 1412
- bind() (asyncore.dispatcher method), 998
- bind() (inspect.Signature method), 1732
- bind() (socket.socket method), 939
- bind_partial() (inspect.Signature method), 1732
- bind_port() (in module test.support), 1595
- bind_textdomain_codeset() (in module gettext), 1341
- bind_unix_socket() (in module test.support), 1595
- bindtextdomain() (in module gettext), 1341
- bindtextdomain() (in module locale), 1356
- binhex
 - module, 1107
- binhex (module), 1106
- binhex() (in module binhex), 1106
- bisect (module), 235
- bisect() (in module bisect), 236
- bisect_left() (in module bisect), 236
- bisect_right() (in module bisect), 236
- bit_length() (int method), 32
- bitmap() (msilib.Dialog method), 1832
- bitwise
 - operations, 32
- bk() (in module turtle), 1362
- bkgd() (curses.window method), 693
- bkgdset() (curses.window method), 693
- blake2b() (in module hashlib), 528
- blake2b, blake2s, 528
- blake2b.MAX_DIGEST_SIZE (in module hashlib), 529
- blake2b.MAX_KEY_SIZE (in module hashlib), 529
- blake2b.PERSON_SIZE (in module hashlib), 529
- blake2b.SALT_SIZE (in module hashlib), 529
- blake2s() (in module hashlib), 528
- blake2s.MAX_DIGEST_SIZE (in module hashlib), 529
- blake2s.MAX_KEY_SIZE (in module hashlib), 529
- blake2s.PERSON_SIZE (in module hashlib), 529
- blake2s.SALT_SIZE (in module hashlib), 529
- block_size (hmac.HMAC attribute), 536
- blocked_domains() (http.cookiejar.DefaultCookiePolicy method), 1289
- BlockingIOError, 92, 589
- blocksize (http.client.HTTPConnection attribute), 1225
- body() (nntplib.NNTP method), 1248
- body_encode() (email.charset.Charset method), 1067
- body_encoding (email.charset.Charset attribute), 1066
- body_line_iterator() (in module email.iterators), 1071
- BOM (in module codecs), 159
- BOM_BE (in module codecs), 159
- BOM_LE (in module codecs), 159
- BOM_UTF8 (in module codecs), 159
- BOM_UTF16 (in module codecs), 159
- BOM_UTF16_BE (in module codecs), 159
- BOM_UTF16_LE (in module codecs), 159

- BOM_UTF32 (in module codecs), 159
- BOM_UTF32_BE (in module codecs), 159
- BOM_UTF32_LE (in module codecs), 159
- bool (built-in class), 6
- Boolean
 - object, 30
 - operations, 29
 - type, 6
 - values, 84
- BOOLEAN_STATES (configparser.ConfigParser attribute), 509
- bootstrap() (in module ensurepip), 1642
- border() (curses.window method), 693
- bottom() (curses.panel.Panel method), 707
- bottom_panel() (in module curses.panel), 707
- BoundArguments (class in inspect), 1734
- BoundaryError, 1036
- BoundedSemaphore (class in asyncio), 866
- BoundedSemaphore (class in multiprocessing), 779
- BoundedSemaphore (class in threading), 759
- BoundedSemaphore() (multiprocessing.managers.SyncManager method), 785
- box() (curses.window method), 693
- bpformat() (bdb.Breakpoint method), 1601
- bpprint() (bdb.Breakpoint method), 1602
- break (pdb command), 1610
- break_anywhere() (bdb.Bdb method), 1603
- break_here() (bdb.Bdb method), 1603
- break_long_words (textwrap.TextWrapper attribute), 142
- BREAK_LOOP (opcode), 1812
- break_on_hyphens (textwrap.TextWrapper attribute), 142
- Breakpoint (class in bdb), 1601
- breakpoint() (built-in function), 6
- breakpointhook() (in module sys), 1660
- breakpoints, 1442
- broadcast_address (ipaddress.IPv4Network attribute), 1312
- broadcast_address (ipaddress.IPv6Network attribute), 1315
- broken (threading.Barrier attribute), 762
- BrokenBarrierError, 762
- BrokenExecutor, 813
- BrokenPipeError, 93
- BrokenProcessPool, 813
- BrokenThreadPool, 813
- BROWSER, 1173, 1174
- BsdDbShelf (class in shelve), 431
- buffer (2to3 fixer), 1581
- buffer (io.TextIOBase attribute), 597
- buffer (unittest.TestResult attribute), 1515
- buffer protocol
 - binary sequence types, 53
 - str (built-in class), 44
- buffer size, I/O, 18
- buffer_info() (array.array method), 239
- buffer_size (xml.parsers.expat.xmlparser attribute), 1164
- buffer_text (xml.parsers.expat.xmlparser attribute), 1165
- buffer_updated() (asyncio.BufferedProtocol method), 905
- buffer_used (xml.parsers.expat.xmlparser attribute), 1165
- BufferedIOBase (class in io), 593
- BufferedProtocol (class in asyncio), 903
- BufferedRandom (class in io), 596
- BufferedReader (class in io), 595
- BufferedRWPair (class in io), 596
- BufferedWriter (class in io), 596
- BufferError, 88
- BufferingHandler (class in logging.handlers), 681
- BufferTooShort, 772
- bufsize() (ossaudiodev.oss_audio_device method), 1338
- BUILD_CONST_KEY_MAP (opcode), 1815
- BUILD_LIST (opcode), 1814
- BUILD_LIST_UNPACK (opcode), 1815
- BUILD_MAP (opcode), 1815
- BUILD_MAP_UNPACK (opcode), 1815
- BUILD_MAP_UNPACK_WITH_CALL (opcode), 1815
- build_opener() (in module urllib.request), 1194
- BUILD_SET (opcode), 1814
- BUILD_SET_UNPACK (opcode), 1815
- BUILD_SLICE (opcode), 1818
- BUILD_STRING (opcode), 1815
- BUILD_TUPLE (opcode), 1814
- BUILD_TUPLE_UNPACK (opcode), 1815
- BUILD_TUPLE_UNPACK_WITH_CALL (opcode), 1815
- built-in
 - types, 29
- built-in function
 - compile, 83, 250, 1783
 - complex, 31
 - eval, 83, 255, 1783
 - exec, 10, 83, 1783
 - float, 31
 - hash, 39
 - int, 31
 - len, 37, 77
 - max, 37
 - min, 37
 - slice, 1818
 - type, 83

- builtin_module_names (in module sys), 1660
- BuiltinFunctionType (in module types), 250
- BuiltinImporter (class in importlib.machinery), 1770
- BuiltinMethodType (in module types), 250
- builtins (module), 1680
- ButtonBox (class in tkinter.tix), 1434
- bye() (in module turtle), 1385
- byref() (in module ctypes), 742
- bytearray
 - formatting, 66
 - interpolation, 66
 - methods, 56
 - object, 39, 53, 55
- bytearray (built-in class), 55
- bytecode, 1901
- byte-code
 - file, 1801, 1890
- Bytecode (class in dis), 1807
- BYTECODE_SUFFIXES (in module importlib.machinery), 1770
- Bytecode.codeobj (in module dis), 1807
- Bytecode.first_line (in module dis), 1807
- byteorder (in module sys), 1659
- bytes
 - formatting, 66
 - interpolation, 66
 - methods, 56
 - object, 53, 54
 - str (built-in class), 44
- bytes (built-in class), 54
- bytes (uuid.UUID attribute), 1263
- bytes_le (uuid.UUID attribute), 1263
- BytesFeedParser (class in email.parser), 1023
- BytesGenerator (class in email.generator), 1026
- BytesHeaderParser (class in email.parser), 1024
- BytesIO (class in io), 595
- bytes-like object, 1900
- BytesParser (class in email.parser), 1024
- ByteString (class in collections.abc), 229
- ByteString (class in typing), 1460
- byteswap() (array.array method), 239
- byteswap() (in module audioop), 1322
- BytesWarning, 94
- bz2 (module), 465
- BZ2Compressor (class in bz2), 467
- BZ2Decompressor (class in bz2), 467
- BZ2File (class in bz2), 466
- C**
- C**
 - language, 30, 31
 - structures, 151
- c <tarfile> <source1> ... <sourceN>
 - tarfile command line option, 489
- c <zipfile> <source1> ... <sourceN>
 - zipfile command line option, 481
- c, -catch
 - unittest command line option, 1495
- c, -compress
 - zipapp command line option, 1653
- c, -count
 - trace command line option, 1628
- C, -coverdir=<dir>
 - trace command line option, 1628
- c_bool (class in ctypes), 747
- C_BUILTIN (in module imp), 1894
- c_byte (class in ctypes), 746
- c_char (class in ctypes), 746
- c_char_p (class in ctypes), 746
- c_contiguous (memoryview attribute), 74
- c_double (class in ctypes), 746
- C_EXTENSION (in module imp), 1894
- c_float (class in ctypes), 746
- c_int (class in ctypes), 746
- c_int8 (class in ctypes), 746
- c_int16 (class in ctypes), 746
- c_int32 (class in ctypes), 746
- c_int64 (class in ctypes), 746
- c_long (class in ctypes), 746
- c_longdouble (class in ctypes), 746
- c_longlong (class in ctypes), 747
- c_short (class in ctypes), 747
- c_size_t (class in ctypes), 747
- c_ssize_t (class in ctypes), 747
- c_ubyte (class in ctypes), 747
- c_uint (class in ctypes), 747
- c_uint8 (class in ctypes), 747
- c_uint16 (class in ctypes), 747
- c_uint32 (class in ctypes), 747
- c_uint64 (class in ctypes), 747
- c_ulong (class in ctypes), 747
- c_ulonglong (class in ctypes), 747
- c_ushort (class in ctypes), 747
- c_void_p (class in ctypes), 747
- c_wchar (class in ctypes), 747
- c_wchar_p (class in ctypes), 747
- CAB (class in msilib), 1830
- cache_from_source() (in module imp), 1892
- cache_from_source() (in module importlib.util), 1774
- cached (importlib.machinery.ModuleSpec attribute), 1774
- CacheFTPHandler (class in urllib.request), 1197
- calcobjsize() (in module test.support), 1592
- calcszize() (in module struct), 152
- calcobjsize() (in module test.support), 1593
- Calendar (class in calendar), 206
- calendar (module), 206

- calendar() (in module calendar), 210
- call() (in module subprocess), 825
- call() (in module unittest.mock), 1550
- call_args (unittest.mock.Mock attribute), 1530
- call_args_list (unittest.mock.Mock attribute), 1530
- call_at() (asyncio.loop method), 878
- call_count (unittest.mock.Mock attribute), 1528
- call_exception_handler() (asyncio.loop method), 888
- CALL_FUNCTION (opcode), 1817
- CALL_FUNCTION_EX (opcode), 1817
- CALL_FUNCTION_KW (opcode), 1817
- call_later() (asyncio.loop method), 878
- call_list() (unittest.mock.call method), 1550
- CALL_METHOD (opcode), 1818
- call_soon() (asyncio.loop method), 877
- call_soon_threadsafe() (asyncio.loop method), 877
- call_tracing() (in module sys), 1660
- Callable (class in collections.abc), 228
- Callable (in module typing), 1466
- callable() (built-in function), 7
- CallableProxyType (in module weakref), 244
- callback (optparse.Option attribute), 1877
- callback() (contextlib.ExitStack method), 1702
- callback_args (optparse.Option attribute), 1877
- callback_kwargs (optparse.Option attribute), 1877
- callbacks (in module gc), 1725
- called (unittest.mock.Mock attribute), 1528
- CalledProcessError, 816
- CAN_BCM (in module socket), 931
- can_change_color() (in module curses), 686
- can_fetch() (urllib.robotparser.RobotFileParser method), 1219
- CAN_ISOTP (in module socket), 931
- CAN_RAW_FD_FRAMES (in module socket), 931
- can_symlink() (in module test.support), 1593
- can_write_eof() (asyncio.StreamWriter method), 859
- can_write_eof() (asyncio.WriteTransport method), 901
- can_xattr() (in module test.support), 1593
- cancel() (asyncio.Future method), 897
- cancel() (asyncio.Handle method), 890
- cancel() (asyncio.Task method), 853
- cancel() (concurrent.futures.Future method), 811
- cancel() (sched.scheduler method), 832
- cancel() (threading.Timer method), 761
- cancel_dump_traceback_later() (in module fault-handler), 1606
- cancel_join_thread() (multiprocessing.Queue method), 774
- cancelled() (asyncio.Future method), 896
- cancelled() (asyncio.Handle method), 890
- cancelled() (asyncio.Task method), 854
- cancelled() (concurrent.futures.Future method), 811
- CancelledError, 813, 874
- CannotSendHeader, 1223
- CannotSendRequest, 1223
- canonic() (bdb.Bdb method), 1602
- canonical() (decimal.Context method), 308
- canonical() (decimal.Decimal method), 299
- capa() (poplib.POP3 method), 1235
- capitalize() (bytearray method), 61
- capitalize() (bytes method), 61
- capitalize() (str method), 44
- captured_stderr() (in module test.support), 1591
- captured_stdin() (in module test.support), 1591
- captured_stdout() (in module test.support), 1591
- captureWarnings() (in module logging), 660
- capwords() (in module string), 107
- casefold() (str method), 44
- cast() (in module ctypes), 743
- cast() (in module typing), 1464
- cast() (memoryview method), 71
- cat() (in module nis), 1861
- catch_warnings (class in warnings), 1687
- category() (in module unicodedata), 143
- cbreak() (in module curses), 686
- ccc() (ftplib.FTP_TLS method), 1233
- C-contiguous, 1901
- CDLL (class in ctypes), 737
- ceil() (in module math), 31, 284
- center() (bytearray method), 59
- center() (bytes method), 59
- center() (str method), 45
- CERT_NONE (in module ssl), 956
- CERT_OPTIONAL (in module ssl), 957
- CERT_REQUIRED (in module ssl), 957
- cert_store_stats() (ssl.SSLContext method), 968
- cert_time_to_seconds() (in module ssl), 955
- CertificateError, 953
- certificates, 975
- CFUNCTYPE() (in module ctypes), 740
- CGI
 - debugging, 1181
 - exceptions, 1182
 - protocol, 1175
 - security, 1180
 - tracebacks, 1182
- cgi (module), 1175
- cgi_directories (http.server.CGIHTTPRequestHandler attribute), 1280
- CGIHandler (class in wsgiref.handlers), 1188
- CGIHTTPRequestHandler (class in http.server), 1279
- cgibt (module), 1182
- CGIXMLRPCRequestHandler (class in xml-rpc.server), 1301

- chain() (in module itertools), 339
- chaining
 - comparisons, 30
- ChainMap (class in collections), 211
- ChainMap (class in typing), 1461
- change_cwd() (in module test.support), 1591
- CHANNEL_BINDING_TYPES (in module ssl), 961
- channel_class (smtpd.SMTPServer attribute), 1257
- channels() (ossaudiodev.oss_audio_device method), 1337
- CHAR_MAX (in module locale), 1355
- character, 142
- CharacterDataHandler()
 - (xml.parsers.expat.xmlparser method), 1166
- characters()
 - (xml.sax.handler.ContentHandler method), 1156
- characters_written (BlockingIOError attribute), 93
- Charset (class in email.charset), 1066
- charset() (gettext.NullTranslations method), 1344
- chdir() (in module os), 558
- check (lzma.LZMADecompressor attribute), 471
- check() (imaplib.IMAP4 method), 1239
- check() (in module tabnanny), 1799
- check__all__() (in module test.support), 1596
- check_call() (in module subprocess), 826
- check_free_after_iterating()
 - (in module test.support), 1596
- check_hostname (ssl.SSLContext attribute), 973
- check_impl_detail() (in module test.support), 1589
- check_no_resource_warning()
 - (in module test.support), 1590
- check_output() (doctest.OutputChecker method), 1488
- check_output() (in module subprocess), 826
- check_returncode()
 - (subprocess.CompletedProcess method), 815
- check_syntax_error() (in module test.support), 1594
- check_unused_args() (string.Formatter method), 99
- check_warnings() (in module test.support), 1590
- checkbox() (msilib.Dialog method), 1832
- checkcache() (in module linecache), 405
- CHECKED_HASH (py_compile.PycInvalidationMode attribute), 1802
- checkfuncname() (in module bdb), 1605
- CheckList (class in tkinter.tix), 1436
- checksizeof() (in module test.support), 1593
- checksum
 - Cyclic Redundancy Check, 460
- chflags() (in module os), 558
- chgat() (curses.window method), 693
- childNodes (xml.dom.Node attribute), 1137
- ChildProcessError, 93
- children (pyclbr.Class attribute), 1801
- chmod() (in module os), 559
- chmod() (pathlib.Path method), 378
- choice() (in module random), 325
- choice() (in module secrets), 537
- choices (optparse.Option attribute), 1877
- choices() (in module random), 325
- chown() (in module os), 559
- chown() (in module shutil), 409
- chr() (built-in function), 7
- chroot() (in module os), 560
- Chunk (class in chunk), 1332
- chunk (module), 1332
- cipher
 - DES, 1848
- cipher() (ssl.SSLSocket method), 965
- circle() (in module turtle), 1364
- CIRCUMFLEX (in module token), 1794
- CIRCUMFLEXEQUAL (in module token), 1794
- Clamped (class in decimal), 312
- class, 1901
- Class (class in symtable), 1792
- Class browser, 1439
- class variable, 1901
- classmethod() (built-in function), 7
- ClassMethodDescriptorType (in module types), 250
- ClassVar (in module typing), 1466
- CLD_CONTINUED (in module os), 582
- CLD_DUMPED (in module os), 582
- CLD_EXITED (in module os), 582
- CLD_TRAPPED (in module os), 582
- clean() (mailbox.Maildir method), 1087
- cleandoc() (in module inspect), 1731
- CleanImport (class in test.support), 1597
- clear (pdb command), 1611
- Clear Breakpoint, 1442
- clear() (asyncio.Event method), 864
- clear() (collections.deque method), 216
- clear() (curses.window method), 693
- clear() (dict method), 78
- clear() (email.message.EmailMessage method), 1022
- clear() (frozenset method), 76
- clear() (http.cookiejar.CookieJar method), 1286
- clear() (in module turtle), 1372, 1379
- clear() (mailbox.Mailbox method), 1085
- clear() (sequence method), 39
- clear() (threading.Event method), 760
- clear()
 - (xml.etree.ElementTree.Element method), 1128
- clear_all_breaks() (bdb.Bdb method), 1604
- clear_all_file_breaks() (bdb.Bdb method), 1604
- clear_bpbynumber() (bdb.Bdb method), 1604
- clear_break() (bdb.Bdb method), 1604
- clear_cache() (in module filecmp), 397

`clear_content()` (email.message.EmailMessage method), 1022
`clear_flags()` (decimal.Context method), 307
`clear_frames()` (in module traceback), 1717
`clear_history()` (in module readline), 147
`clear_session_cookies()` (http.cookiejar.CookieJar method), 1286
`clear_traces()` (in module tracemalloc), 1634
`clear_traps()` (decimal.Context method), 307
`clearcache()` (in module linecache), 405
`ClearData()` (msilib.Record method), 1830
`clearok()` (curses.window method), 693
`clearscreen()` (in module turtle), 1379
`clearstamp()` (in module turtle), 1365
`clearstamps()` (in module turtle), 1365
`Client()` (in module multiprocessing.connection), 793
`client_address` (http.server.BaseHTTPRequestHandler attribute), 1275
`clock()` (in module time), 601
`CLOCK_BOOTTIME` (in module time), 608
`clock_getres()` (in module time), 602
`clock_gettime()` (in module time), 602
`clock_gettime_ns()` (in module time), 602
`CLOCK_HIGHRES` (in module time), 609
`CLOCK_MONOTONIC` (in module time), 609
`CLOCK_MONOTONIC_RAW` (in module time), 609
`CLOCK_PROCESS_CPUTIME_ID` (in module time), 609
`CLOCK_PROF` (in module time), 609
`CLOCK_REALTIME` (in module time), 609
`clock_settime()` (in module time), 602
`clock_settime_ns()` (in module time), 602
`CLOCK_THREAD_CPUTIME_ID` (in module time), 609
`CLOCK_UPTIME` (in module time), 609
`clone()` (email.generator.BytesGenerator method), 1027
`clone()` (email.generator.Generator method), 1028
`clone()` (email.policy.Policy method), 1031
`clone()` (in module turtle), 1377
`clone()` (pipes.Template method), 1856
`cloneNode()` (xml.dom.Node method), 1138
`close()` (aifc.aifc method), 1325, 1326
`close()` (asyncio.AbstractChildWatcher method), 914
`close()` (asyncio.BaseTransport method), 900
`close()` (asyncio.loop method), 877
`close()` (asyncio.Server method), 891
`close()` (asyncio.StreamWriter method), 859
`close()` (asyncio.SubprocessTransport method), 903
`close()` (asyncore.dispatcher method), 998
`close()` (chunk.Chunk method), 1332
`close()` (contextlib.ExitStack method), 1702
`close()` (dbm.dumb.dumbdbm method), 437
`close()` (dbm.gnu.gdbm method), 435
`close()` (dbm.ndbm.ndbm method), 436
`close()` (email.parser.BytesFeedParser method), 1024
`close()` (ftplib.FTP method), 1233
`close()` (html.parser.HTMLParser method), 1113
`close()` (http.client.HTTPConnection method), 1225
`close()` (imaplib.IMAP4 method), 1239
`close()` (in module fileinput), 390
`close()` (in module os), 548
`close()` (in module socket), 934
`close()` (io.IOBase method), 591
`close()` (logging.FileHandler method), 673
`close()` (logging.Handler method), 650
`close()` (logging.handlers.MemoryHandler method), 682
`close()` (logging.handlers.NTEventLogHandler method), 680
`close()` (logging.handlers.SocketHandler method), 677
`close()` (logging.handlers.SysLogHandler method), 678
`close()` (mailbox.Mailbox method), 1086
`close()` (mailbox.Maildir method), 1087
`close()` (mailbox.MH method), 1089
`close()` (mmap.mmap method), 1011
`Close()` (msilib.Database method), 1828
`Close()` (msilib.View method), 1829
`close()` (multiprocessing.connection.Connection method), 777
`close()` (multiprocessing.connection.Listener method), 794
`close()` (multiprocessing.pool.Pool method), 792
`close()` (multiprocessing.Process method), 772
`close()` (multiprocessing.Queue method), 774
`close()` (ossaudiodev.oss_audio_device method), 1336
`close()` (ossaudiodev.oss_mixer_device method), 1338
`close()` (os.scandir method), 565
`close()` (select.devpoll method), 987
`close()` (select.epoll method), 989
`close()` (select.kqueue method), 990
`close()` (selectors.BaseSelector method), 994
`close()` (shelve.Shelf method), 430
`close()` (socket.socket method), 939
`close()` (sqlite3.Connection method), 442
`close()` (sqlite3.Cursor method), 450
`close()` (sunau.AU_read method), 1328
`close()` (sunau.AU_write method), 1329
`close()` (tarfile.TarFile method), 487
`close()` (telnetlib.Telnet method), 1261
`close()` (urllib.request.BaseHandler method), 1200
`close()` (wave.Wave_read method), 1330
`close()` (wave.Wave_write method), 1331

- Close() (winreg.PyHKEY method), 1841
- close() (xml.etree.ElementTree.TreeBuilder method), 1131
- close() (xml.etree.ElementTree.XMLParser method), 1132
- close() (xml.etree.ElementTree.XMLPullParser method), 1133
- close() (xml.sax.xmlreader.IncrementalParser method), 1161
- close() (zipfile.ZipFile method), 476
- close_connection (http.server.BaseHTTPRequestHandler attribute), 1275
- close_when_done() (asyncio.async_chat method), 1001
- closed (http.client.HTTPResponse attribute), 1227
- closed (io.IOBase attribute), 591
- closed (mmap.mmap attribute), 1011
- closed (ossaudiodev.oss_audio_device attribute), 1338
- closed (select.devpoll attribute), 987
- closed (select.epoll attribute), 989
- closed (select.kqueue attribute), 990
- CloseKey() (in module winreg), 1834
- closelog() (in module syslog), 1862
- closerange() (in module os), 548
- closing() (in module contextlib), 1698
- clrtoeb() (curses.window method), 694
- clrtoeol() (curses.window method), 694
- cmath (module), 289
- cmd
 - module, 1608
- Cmd (class in cmd), 1392
- cmd (module), 1392
- cmd (subprocess.CalledProcessError attribute), 816
- cmd (subprocess.TimeoutExpired attribute), 816
- cmdloop() (cmd.Cmd method), 1392
- cmdqueue (cmd.Cmd attribute), 1394
- cmp() (in module filecmp), 397
- cmp_op (in module dis), 1819
- cmp_to_key() (in module functools), 352
- cmpfiles() (in module filecmp), 397
- CMSG_LEN() (in module socket), 937
- CMSG_SPACE() (in module socket), 937
- CO_ASYNC_GENERATOR (in module inspect), 1741
- CO_COROUTINE (in module inspect), 1741
- CO_GENERATOR (in module inspect), 1741
- CO_ITERABLE_COROUTINE (in module inspect), 1741
- CO_NESTED (in module inspect), 1741
- CO_NEWLOCALS (in module inspect), 1741
- CO_NOFREE (in module inspect), 1741
- CO_OPTIMIZED (in module inspect), 1741
- CO_VARARGS (in module inspect), 1741
- CO_VARKEYWORDS (in module inspect), 1741
- code (module), 1747
- code (SystemExit attribute), 91
- code (urllib.error.HTTPError attribute), 1218
- code (xml.etree.ElementTree.ParseError attribute), 1133
- code (xml.parsers.expat.ExpatError attribute), 1167
- code object, 83, 432
- code_info() (in module dis), 1807
- CodecInfo (class in codecs), 157
- codecs, 156
 - decode, 156
 - encode, 156
- codecs (module), 156
- coded_value (http.cookies.Morsel attribute), 1282
- codeop (module), 1749
- codepoint2name (in module html.entities), 1116
- codes (in module xml.parsers.expat.errors), 1169
- CODESET (in module locale), 1352
- CodeType (in module types), 249
- coercion, 1901
- col_offset (ast.AST attribute), 1786
- collapse_addresses() (in module ipaddress), 1318
- collapse_rfc2231_value() (in module email.utils), 1071
- collect() (in module gc), 1723
- collect_incoming_data() (asyncio.async_chat method), 1001
- Collection (class in collections.abc), 229
- Collection (class in typing), 1459
- collections (module), 210
- collections.abc (module), 227
- colno (json.JSONDecodeError attribute), 1079
- colno (re.error attribute), 118
- COLON (in module token), 1794
- color() (in module turtle), 1371
- color_content() (in module curses), 686
- color_pair() (in module curses), 686
- colormode() (in module turtle), 1384
- colorsys (module), 1333
- COLS, 691
- column() (tkinter.ttk.Treeview method), 1426
- COLUMNS, 692
- columns (os.terminal_size attribute), 556
- combinations() (in module itertools), 340
- combinations_with_replacement() (in module itertools), 341
- combine() (datetime.datetime class method), 184
- combining() (in module unicodedata), 143
- ComboBox (class in tkinter.tix), 1434
- Combobox (class in tkinter.ttk), 1419
- COMMA (in module token), 1794
- command (http.server.BaseHTTPRequestHandler attribute), 1275

- CommandCompiler (class in codeop), 1750
- commands (pdb command), 1611
- comment (http.cookiejar.Cookie attribute), 1291
- COMMENT (in module token), 1795
- comment (zipfile.ZipFile attribute), 478
- comment (zipfile.ZipInfo attribute), 480
- Comment() (in module xml.etree.ElementTree), 1125
- comment_url (http.cookiejar.Cookie attribute), 1291
- commenters (shlex.shlex attribute), 1399
- CommentHandler() (xml.parsers.expat.xmlparser method), 1167
- commit() (msilib.CAB method), 1830
- Commit() (msilib.Database method), 1828
- commit() (sqlite3.Connection method), 441
- common (filecmp.dircmp attribute), 398
- Common Gateway Interface, 1175
- common_dirs (filecmp.dircmp attribute), 398
- common_files (filecmp.dircmp attribute), 398
- common_funny (filecmp.dircmp attribute), 398
- common_types (in module mimetypes), 1102
- commonpath() (in module os.path), 385
- commonprefix() (in module os.path), 385
- communicate() (asyncio.asyncio.subprocess.Process method), 869
- communicate() (subprocess.Popen method), 821
- compare() (decimal.Context method), 308
- compare() (decimal.Decimal method), 299
- compare() (difflib.Differ method), 136
- compare_digest() (in module hmac), 537
- compare_digest() (in module secrets), 538
- compare_networks() (ipaddress.IPv4Network method), 1314
- compare_networks() (ipaddress.IPv6Network method), 1315
- COMPARE_OP (opcode), 1815
- compare_signal() (decimal.Context method), 308
- compare_signal() (decimal.Decimal method), 300
- compare_to() (tracemalloc.Snapshot method), 1637
- compare_total() (decimal.Context method), 308
- compare_total() (decimal.Decimal method), 300
- compare_total_mag() (decimal.Context method), 308
- compare_total_mag() (decimal.Decimal method), 300
- comparing
 - objects, 30
- comparison
 - operator, 30
- COMPARISON_FLAGS (in module doctest), 1477
- comparisons
 - chaining, 30
- Compat32 (class in email.policy), 1035
- compat32 (in module email.policy), 1036
- compile
 - built-in function, 83, 250, 1783
- Compile (class in codeop), 1750
- compile() (built-in function), 7
- compile() (in module py_compile), 1801
- compile() (in module re), 113
- compile() (parser.ST method), 1784
- compile_command() (in module code), 1747
- compile_command() (in module codeop), 1749
- compile_dir() (in module compileall), 1804
- compile_file() (in module compileall), 1805
- compile_path() (in module compileall), 1805
- compileall (module), 1803
- compileall command line option
 - b, 1803
 - d destdir, 1803
 - directory ..., 1803
 - f, 1803
 - file ..., 1803
 - i list, 1803
 - invalidation-mode [timestamp|checked-hash|unchecked-hash], 1804
 - j N, 1804
 - l, 1803
 - q, 1803
 - r, 1804
 - x regex, 1803
- compilest() (in module parser), 1783
- complete() (rlcompleter.Completer method), 150
- complete_statement() (in module sqlite3), 440
- completedefault() (cmd.Cmd method), 1393
- CompletedProcess (class in subprocess), 815
- complex
 - built-in function, 31
- complex (built-in class), 8
- Complex (class in numbers), 281
- complex number, **1901**
 - literals, 31
 - object, 30
- compress() (bz2.BZ2Compressor method), 467
- compress() (in module bz2), 468
- compress() (in module gzip), 464
- compress() (in module itertools), 341
- compress() (in module lzma), 471
- compress() (in module zlib), 459
- compress() (lzma.LZMACompressor method), 470
- compress() (zlib.Compress method), 461
- compress_size (zipfile.ZipInfo attribute), 481
- compress_type (zipfile.ZipInfo attribute), 480
- compressed (ipaddress.IPv4Address attribute), 1308
- compressed (ipaddress.IPv4Network attribute), 1312
- compressed (ipaddress.IPv6Address attribute), 1309
- compressed (ipaddress.IPv6Network attribute), 1315
- compression() (ssl.SSLSocket method), 965
- CompressionError, 483

- compressobj() (in module zlib), 460
- COMSPEC, 581, 818
- concat() (in module operator), 361
- concatenation
 - operation, 37
- concurrent.futures (module), 807
- Condition (class in asyncio), 864
- Condition (class in multiprocessing), 779
- Condition (class in threading), 757
- condition (pdb command), 1611
- condition() (msilib.Control method), 1831
- Condition() (multiprocessing.managers.SyncManager method), 786
- ConfigParser (class in configparser), 513
- configparser (module), 499
- configuration
 - file, 499
 - file, debugger, 1610
 - file, path, 1742
- configuration information, 1677
- configure() (tkinter.ttk.Style method), 1430
- configure_mock() (unittest.mock.Mock method), 1527
- confstr() (in module os), 585
- confstr_names (in module os), 585
- conjugate() (complex number method), 31
- conjugate() (decimal.Decimal method), 300
- conjugate() (numbers.Complex method), 281
- conn (smtpd.SMTPChannel attribute), 1259
- connect() (asyncore.dispatcher method), 998
- connect() (ftplib.FTP method), 1231
- connect() (http.client.HTTPConnection method), 1225
- connect() (in module sqlite3), 439
- connect() (multiprocessing.managers.BaseManager method), 784
- connect() (smtplib.SMTP method), 1252
- connect() (socket.socket method), 939
- connect_accepted_socket() (asyncio.loop method), 882
- connect_ex() (socket.socket method), 939
- connect_read_pipe() (asyncio.loop method), 886
- connect_write_pipe() (asyncio.loop method), 886
- Connection (class in multiprocessing.connection), 777
- Connection (class in sqlite3), 441
- connection (sqlite3.Cursor attribute), 450
- connection_lost() (asyncio.BaseProtocol method), 904
- connection_made() (asyncio.BaseProtocol method), 903
- ConnectionAbortedError, 93
- ConnectionError, 93
- ConnectionRefusedError, 93
- ConnectionResetError, 93
- ConnectRegistry() (in module winreg), 1834
- const (optparse.Option attribute), 1877
- constructor() (in module copyreg), 428
- consumed (asyncio.LimitOverrunError attribute), 875
- container
 - iteration over, 36
- Container (class in collections.abc), 228
- Container (class in typing), 1459
- contains() (in module operator), 362
- content type
 - MIME, 1100
- content_manager (email.policy.EmailPolicy attribute), 1034
- content_type (email.headerregistry.ContentTypeHeader attribute), 1040
- ContentDispositionHeader (class in email.headerregistry), 1040
- ContentHandler (class in xml.sax.handler), 1153
- ContentManager (class in email.contentmanager), 1043
- contents (ctypes._Pointer attribute), 750
- contents() (importlib.abc.ResourceReader method), 1765
- contents() (in module importlib.resources), 1769
- ContentTooShortError, 1218
- ContentTransferEncoding (class in email.headerregistry), 1040
- ContentTypeHeader (class in email.headerregistry), 1040
- Context (class in contextvars), 840
- Context (class in decimal), 306
- context (ssl.SSLSocket attribute), 966
- context management protocol, 81
- context manager, 81, **1901**
- context_diff() (in module difflib), 129
- ContextDecorator (class in contextlib), 1700
- contextlib (module), 1696
- ContextManager (class in typing), 1461
- contextmanager() (in module contextlib), 1696
- ContextVar (class in contextvars), 839
- contextvars (module), 839
- contextvars.Token (class in contextvars), 840
- contiguous, **1901**
- contiguous (memoryview attribute), 74
- continue (pdb command), 1612
- CONTINUE_LOOP (opcode), 1812
- Control (class in msilib), 1831
- Control (class in tkinter.tix), 1434
- control() (msilib.Dialog method), 1831
- control() (select.kqueue method), 990
- controlnames (in module curses.ascii), 706

- `controls()` (`ossaudiodev.oss_mixer_device` method), 1338
- `ConversionError`, 521
- `conversions`
 - `numeric`, 31
- `convert_arg_line_to_args()` (`argparse.ArgumentParser` method), 641
- `convert_field()` (`string.Formatter` method), 99
- `Cookie` (class in `http.cookiejar`), 1285
- `CookieError`, 1280
- `CookieJar` (class in `http.cookiejar`), 1284
- `cookiejar` (`urllib.request.HTTPCookieProcessor` attribute), 1202
- `CookiePolicy` (class in `http.cookiejar`), 1284
- `Coordinated Universal Time`, 601
- `Copy`, 1442
- `copy`
 - module, 428
 - protocol, 421
- `copy` (module), 252
- `copy()` (`collections.deque` method), 216
- `copy()` (`contextvars.Context` method), 841
- `copy()` (`decimal.Context` method), 307
- `copy()` (`dict` method), 78
- `copy()` (`frozenset` method), 76
- `copy()` (`hashlib.hash` method), 527
- `copy()` (`hmac.HMAC` method), 536
- `copy()` (`http.cookies.Morsel` method), 1282
- `copy()` (`imaplib.IMAP4` method), 1239
- `copy()` (in module `copy`), 252
- `copy()` (in module `multiprocessing.sharedctypes`), 783
- `copy()` (in module `shutil`), 407
- `copy()` (`pipes.Template` method), 1856
- `copy()` (sequence method), 39
- `copy()` (`types.MappingProxyType` method), 251
- `copy()` (`zlib.Compress` method), 461
- `copy()` (`zlib.Decompress` method), 462
- `copy2()` (in module `shutil`), 407
- `copy_abs()` (`decimal.Context` method), 308
- `copy_abs()` (`decimal.Decimal` method), 300
- `copy_context()` (in module `contextvars`), 840
- `copy_decimal()` (`decimal.Context` method), 307
- `copy_location()` (in module `ast`), 1790
- `copy_negate()` (`decimal.Context` method), 308
- `copy_negate()` (`decimal.Decimal` method), 300
- `copy_sign()` (`decimal.Context` method), 308
- `copy_sign()` (`decimal.Decimal` method), 300
- `copyfile()` (in module `shutil`), 406
- `copyfileobj()` (in module `shutil`), 406
- copying files, 406
- `copymode()` (in module `shutil`), 407
- `copyreg` (module), 428
- `copyright` (built-in variable), 28
- `copyright` (in module `sys`), 1660
- `copysign()` (in module `math`), 284
- `copystat()` (in module `shutil`), 407
- `copytree()` (in module `shutil`), 408
- `coroutine`, 1901
- `Coroutine` (class in `collections.abc`), 230
- `Coroutine` (class in `typing`), 1461
- `coroutine function`, 1901
- `coroutine()` (in module `asyncio`), 856
- `coroutine()` (in module `types`), 252
- `CoroutineType` (in module `types`), 249
- `cos()` (in module `cmath`), 291
- `cos()` (in module `math`), 287
- `cosh()` (in module `cmath`), 291
- `cosh()` (in module `math`), 288
- `count` (`tracemalloc.Statistic` attribute), 1638
- `count` (`tracemalloc.StatisticDiff` attribute), 1638
- `count()` (`array.array` method), 239
- `count()` (`bytearray` method), 56
- `count()` (`bytes` method), 56
- `count()` (`collections.deque` method), 216
- `count()` (in module `itertools`), 341
- `count()` (sequence method), 37
- `count()` (`str` method), 45
- `count_diff` (`tracemalloc.StatisticDiff` attribute), 1638
- `Counter` (class in `collections`), 213
- `Counter` (class in `typing`), 1461
- `countOf()` (in module `operator`), 362
- `countTestCases()` (`unittest.TestCase` method), 1510
- `countTestCases()` (`unittest.TestSuite` method), 1512
- `CoverageResults` (class in `trace`), 1629
- `cProfile` (module), 1616
- `CPU time`, 601, 604, 607
- `cpu_count()` (in module `multiprocessing`), 775
- `cpu_count()` (in module `os`), 585
- `CPython`, 1901
- `cpython_only()` (in module `test.support`), 1594
- `crawl_delay()` (`urllib.robotparser.RobotFileParser` method), 1219
- `CRC` (`zipfile.ZipInfo` attribute), 481
- `crc32()` (in module `binascii`), 1108
- `crc32()` (in module `zlib`), 460
- `crc_hqx()` (in module `binascii`), 1108
- `-create <tarfile> <source1> ... <sourceN>`
 - `tarfile` command line option, 489
- `-create <zipfile> <source1> ... <sourceN>`
 - `zipfile` command line option, 481
- `create()` (`imaplib.IMAP4` method), 1239
- `create()` (in module `venv`), 1647
- `create()` (`venv.EnvBuilder` method), 1646
- `create_aggregate()` (`sqlite3.Connection` method), 442
- `create_archive()` (in module `zipapp`), 1653
- `create_autospec()` (in module `unittest.mock`), 1552
- `CREATE_BREAKAWAY_FROM_JOB` (in module `subprocess`), 825

- [create_collation\(\)](#) (sqlite3.Connection method), 443
[create_configuration\(\)](#) (venv.EnvBuilder method), 1647
[create_connection\(\)](#) (asyncio.loop method), 879
[create_connection\(\)](#) (in module socket), 934
[create_datagram_endpoint\(\)](#) (asyncio.loop method), 880
[create_decimal\(\)](#) (decimal.Context method), 307
[create_decimal_from_float\(\)](#) (decimal.Context method), 307
[create_default_context\(\)](#) (in module ssl), 951
[CREATE_DEFAULT_ERROR_MODE](#) (in module subprocess), 825
[create_empty_file\(\)](#) (in module test.support), 1589
[create_function\(\)](#) (sqlite3.Connection method), 442
[create_future\(\)](#) (asyncio.loop method), 879
[create_module\(\)](#) (importlib.abc.Loader method), 1763
[create_module\(\)](#) (importlib.machinery.ExtensionFileLoader method), 1773
[CREATE_NEW_CONSOLE](#) (in module subprocess), 824
[CREATE_NEW_PROCESS_GROUP](#) (in module subprocess), 824
[CREATE_NO_WINDOW](#) (in module subprocess), 825
[create_server\(\)](#) (asyncio.loop method), 881
[create_socket\(\)](#) (asyncore.dispatcher method), 997
[create_stats\(\)](#) (profile.Profile method), 1617
[create_string_buffer\(\)](#) (in module ctypes), 743
[create_subprocess_exec\(\)](#) (in module asyncio), 867
[create_subprocess_shell\(\)](#) (in module asyncio), 867
[create_system](#) (zipfile.ZipInfo attribute), 480
[create_task\(\)](#) (asyncio.loop method), 879
[create_task\(\)](#) (in module asyncio), 847
[create_unicode_buffer\(\)](#) (in module ctypes), 743
[create_unix_connection\(\)](#) (asyncio.loop method), 881
[create_unix_server\(\)](#) (asyncio.loop method), 882
[create_version](#) (zipfile.ZipInfo attribute), 480
[createAttribute\(\)](#) (xml.dom.Document method), 1139
[createAttributeNS\(\)](#) (xml.dom.Document method), 1139
[createComment\(\)](#) (xml.dom.Document method), 1139
[createDocument\(\)](#) (xml.dom.DOMImplementation method), 1136
[createDocumentType\(\)](#) (xml.dom.DOMImplementation method), 1136
[createElement\(\)](#) (xml.dom.Document method), 1139
[createElementNS\(\)](#) (xml.dom.Document method), 1139
[createfilehandler\(\)](#) (tkinter.Widget.tk method), 1414
[CreateKey\(\)](#) (in module winreg), 1834
[CreateKeyEx\(\)](#) (in module winreg), 1835
[createLock\(\)](#) (logging.Handler method), 650
[createLock\(\)](#) (logging.NullHandler method), 673
[createProcessingInstruction\(\)](#) (xml.dom.Document method), 1139
[CreateRecord\(\)](#) (in module msilib), 1827
[createSocket\(\)](#) (logging.handlers.SocketHandler method), 677
[createTextNode\(\)](#) (xml.dom.Document method), 1139
[credits](#) (built-in variable), 28
[critical\(\)](#) (in module logging), 658
[critical\(\)](#) (logging.Logger method), 648
[CRNCYSTR](#) (in module locale), 1352
[cross\(\)](#) (in module audioop), 1322
[crypt](#)
 module, 1846
[crypt](#) (module), 1848
[crypt\(\)](#) (in module crypt), 1849
[crypt\(3\)](#), 1848, 1849
[cryptography](#), 525
[cssclass_month](#) (calendar.HTMLCalendar attribute), 208
[cssclass_month_head](#) (calendar.HTMLCalendar attribute), 208
[cssclass_noday](#) (calendar.HTMLCalendar attribute), 208
[cssclass_year](#) (calendar.HTMLCalendar attribute), 208
[cssclass_year_head](#) (calendar.HTMLCalendar attribute), 208
[cssclasses](#) (calendar.HTMLCalendar attribute), 208
[cssclasses_weekday_head](#) (calendar.HTMLCalendar attribute), 208
[csv](#), 493
[csv](#) (module), 493
[cte](#) (email.headerregistry.ContentTransferEncoding attribute), 1041
[cte_type](#) (email.policy.Policy attribute), 1031
[ctermid\(\)](#) (in module os), 542
[ctime\(\)](#) (datetime.date method), 182
[ctime\(\)](#) (datetime.datetime method), 190
[ctime\(\)](#) (in module time), 602
[ctrl\(\)](#) (in module curses.ascii), 706
[CTRL_BREAK_EVENT](#) (in module signal), 1004
[CTRL_C_EVENT](#) (in module signal), 1003
[ctypes](#) (module), 717
[curdir](#) (in module os), 586
[currency\(\)](#) (in module locale), 1354
[current\(\)](#) (tkinter.ttk.Combobox method), 1419
[current_process\(\)](#) (in module multiprocessing), 775

- `current_task()` (`asyncio.Task` class method), 855
- `current_task()` (in module `asyncio`), 853
- `current_thread()` (in module `threading`), 751
- `CurrentByteIndex` (`xml.parsers.expat.xmlparser` attribute), 1165
- `CurrentColumnNumber` (`xml.parsers.expat.xmlparser` attribute), 1165
- `currentframe()` (in module `inspect`), 1739
- `CurrentLineNumber` (`xml.parsers.expat.xmlparser` attribute), 1165
- `curs_set()` (in module `curses`), 686
- `curses` (module), 685
- `curses.ascii` (module), 704
- `curses.panel` (module), 707
- `curses.textpad` (module), 703
- `Cursor` (class in `sqlite3`), 447
- `cursor()` (`sqlite3.Connection` method), 441
- `cursyncup()` (`curses.window` method), 694
- `Cut`, 1442
- `cwd()` (`ftplib.FTP` method), 1233
- `cwd()` (`pathlib.Path` class method), 378
- `cycle()` (in module `itertools`), 342
- Cyclic Redundancy Check, 460
- D**
- `-d destdir`
 - compileall command line option, 1803
- `D_FMT` (in module `locale`), 1352
- `D_T_FMT` (in module `locale`), 1352
- `daemon` (`multiprocessing.Process` attribute), 771
- `daemon` (`threading.Thread` attribute), 754
- `data`
 - packing binary, 151
 - tabular, 493
- `Data` (class in `plistlib`), 523
- `data` (`collections.UserDict` attribute), 226
- `data` (`collections.UserList` attribute), 227
- `data` (`collections.UserString` attribute), 227
- `data` (`select.kevent` attribute), 992
- `data` (`selectors.SelectorKey` attribute), 993
- `data` (`urllib.request.Request` attribute), 1198
- `data` (`xml.dom.Comment` attribute), 1141
- `data` (`xml.dom.ProcessingInstruction` attribute), 1142
- `data` (`xml.dom.Text` attribute), 1141
- `data` (`xmlrpc.client.Binary` attribute), 1296
- `data()` (`xml.etree.ElementTree.TreeBuilder` method), 1131
- `data_open()` (`urllib.request.DataHandler` method), 1204
- `data_received()` (`asyncio.Protocol` method), 904
- `database`
 - Unicode, 142
- `DatabaseError`, 452
- `databases`, 436
- `dataclass()` (in module `dataclasses`), 1688
- `dataclasses` (module), 1687
- `datagram_received()` (`asyncio.DatagramProtocol` method), 905
- `DatagramHandler` (class in `logging.handlers`), 678
- `DatagramProtocol` (class in `asyncio`), 903
- `DatagramRequestHandler` (class in `socketserver`), 1270
- `DatagramTransport` (class in `asyncio`), 899
- `DataHandler` (class in `urllib.request`), 1197
- `date` (class in `datetime`), 179
- `date()` (`datetime.datetime` method), 186
- `date()` (`nntplib.NNTP` method), 1249
- `date_time` (`zipfile.ZipInfo` attribute), 480
- `date_time_string()` (`http.server.BaseHTTPRequestHandler` method), 1278
- `DateHeader` (class in `email.headerregistry`), 1039
- `datetime` (class in `datetime`), 183
- `DateTime` (class in `xmlrpc.client`), 1295
- `datetime` (`email.headerregistry.DateHeader` attribute), 1039
- `datetime` (module), 175
- `day` (`datetime.date` attribute), 180
- `day` (`datetime.datetime` attribute), 185
- `day_abbr` (in module `calendar`), 210
- `day_name` (in module `calendar`), 210
- `daylight` (in module `time`), 609
- Daylight Saving Time, 601
- `DbfilenameShelf` (class in `shelve`), 431
- `dbm` (module), 433
- `dbm.dumb` (module), 436
- `dbm.gnu`
 - module, 430
- `dbm.gnu` (module), 434
- `dbm.ndbm`
 - module, 430
- `dbm.ndbm` (module), 436
- `dcgettext()` (in module `locale`), 1356
- `debug` (`imaplib.IMAP4` attribute), 1242
- `DEBUG` (in module `re`), 114
- `debug` (`shlex.shlex` attribute), 1400
- `debug` (`zipfile.ZipFile` attribute), 478
- `debug()` (in module `doctest`), 1490
- `debug()` (in module `logging`), 657
- `debug()` (`logging.Logger` method), 647
- `debug()` (`pipes.Template` method), 1856
- `debug()` (`unittest.TestCase` method), 1503
- `debug()` (`unittest.TestSuite` method), 1512
- `DEBUG_BYTECODE_SUFFIXES` (in module `importlib.machinery`), 1770
- `DEBUG_COLLECTABLE` (in module `gc`), 1726
- `DEBUG_LEAK` (in module `gc`), 1726

- DEBUG_SAVEALL (in module gc), 1726
- debug_src() (in module doctest), 1490
- DEBUG_STATS (in module gc), 1726
- DEBUG_UNCOLLECTABLE (in module gc), 1726
- debugger, 1441, 1666, 1672
 - configuration file, 1610
- debugging, 1607
 - CGI, 1181
- DebuggingServer (class in smtpd), 1258
- debuglevel (http.client.HTTPResponse attribute), 1227
- DebugRunner (class in doctest), 1491
- Decimal (class in decimal), 298
- decimal (module), 293
- decimal() (in module unicodedata), 142
- DecimalException (class in decimal), 312
- decode
 - Codecs, 156
- decode (codecs.CodecInfo attribute), 157
- decode() (bytearray method), 56
- decode() (bytes method), 56
- decode() (codecs.Codec method), 161
- decode() (codecs.IncrementalDecoder method), 163
- decode() (in module base64), 1105
- decode() (in module codecs), 157
- decode() (in module quopri), 1109
- decode() (in module uu), 1110
- decode() (json.JSONDecoder method), 1077
- decode() (xmlrpc.client.Binary method), 1296
- decode() (xmlrpc.client.DateTime method), 1295
- decode_header() (in module email.header), 1065
- decode_header() (in module nntplib), 1249
- decode_params() (in module email.utils), 1071
- decode_rfc2231() (in module email.utils), 1071
- decode_source() (in module importlib.util), 1775
- decodebytes() (in module base64), 1105
- DecodedGenerator (class in email.generator), 1028
- decodestring() (in module base64), 1106
- decodestring() (in module quopri), 1109
- decomposition() (in module unicodedata), 143
- decompress() (bz2.BZ2Decompressor method), 467
- decompress() (in module bz2), 468
- decompress() (in module gzip), 464
- decompress() (in module lzma), 471
- decompress() (in module zlib), 460
- decompress() (lzma.LZMADecompressor method), 471
- decompress() (zlib.Decompress method), 462
- decompressobj() (in module zlib), 461
- decorator, 1901
- DEDENT (in module token), 1794
- dedent() (in module textwrap), 139
- deepcopy() (in module copy), 253
- def_prog_mode() (in module curses), 686
- def_shell_mode() (in module curses), 686
- default (in module email.policy), 1035
- DEFAULT (in module unittest.mock), 1550
- default (inspect.Parameter attribute), 1733
- default (optparse.Option attribute), 1876
- default() (cmd.Cmd method), 1393
- default() (json.JSONEncoder method), 1078
- DEFAULT_BUFFER_SIZE (in module io), 589
- default_bufsize (in module xml.dom.pulldom), 1150
- default_exception_handler() (asyncio.loop method), 888
- default_factory (collections.defaultdict attribute), 220
- DEFAULT_FORMAT (in module tarfile), 484
- DEFAULT_IGNORES (in module filecmp), 398
- default_open() (urllib.request.BaseHandler method), 1200
- DEFAULT_PROTOCOL (in module pickle), 417
- default_timer() (in module timeit), 1623
- DefaultContext (class in decimal), 306
- DefaultCookiePolicy (class in http.cookiejar), 1284
- defaultdict (class in collections), 219
- DefaultDict (class in typing), 1461
- DefaultEventLoopPolicy (class in asyncio), 913
- DefaultHandler() (xml.parsers.expat.xmlparser method), 1167
- DefaultHandlerExpand() (xml.parsers.expat.xmlparser method), 1167
- defaults() (configparser.ConfigParser method), 513
- DefaultSelector (class in selectors), 994
- defaultTestLoader (in module unittest), 1517
- defaultTestResult() (unittest.TestCase method), 1510
- defects (email.headerregistry.BaseHeader attribute), 1038
- defects (email.message.EmailMessage attribute), 1022
- defects (email.message.Message attribute), 1060
- defpath (in module os), 586
- DefragResult (class in urllib.parse), 1215
- DefragResultBytes (class in urllib.parse), 1215
- degrees() (in module math), 288
- degrees() (in module turtle), 1368
- del
 - statement, 39, 77
- del_param() (email.message.EmailMessage method), 1018
- del_param() (email.message.Message method), 1058
- delattr() (built-in function), 8
- delay() (in module turtle), 1380
- delay_output() (in module curses), 686
- delayload (http.cookiejar.FileCookieJar attribute), 1287

- delch() (curses.window method), 694
- dele() (poplib.POP3 method), 1235
- delete() (ftplib.FTP method), 1233
- delete() (imaplib.IMAP4 method), 1239
- delete() (tkinter.ttk.Treeview method), 1427
- DELETE_ATTR (opcode), 1814
- DELETE_DEREF (opcode), 1817
- DELETE_FAST (opcode), 1816
- DELETE_GLOBAL (opcode), 1814
- DELETE_NAME (opcode), 1814
- DELETE_SUBSCR (opcode), 1812
- deleteacl() (imaplib.IMAP4 method), 1239
- deletefilehandler() (tkinter.Widget.tk method), 1414
- DeleteKey() (in module winreg), 1835
- DeleteKeyEx() (in module winreg), 1835
- deleteln() (curses.window method), 694
- deleteMe() (bdb.Breakpoint method), 1601
- DeleteValue() (in module winreg), 1836
- delimiter (csv.Dialect attribute), 497
- delitem() (in module operator), 362
- deliver_challenge() (in module multiprocessing.connection), 793
- delocalize() (in module locale), 1354
- demo_app() (in module wsgiref.simple_server), 1187
- denominator (fractions.Fraction attribute), 322
- denominator (numbers.Rational attribute), 282
- DeprecationWarning, 94
- deque (class in collections), 216
- Deque (class in typing), 1460
- dequeue() (logging.handlers.QueueListener method), 684
- DER_cert_to_PEM_cert() (in module ssl), 955
- derwin() (curses.window method), 694
- DES
 - cipher, 1848
- description (sqlite3.Cursor attribute), 450
- description() (nntplib.NNTP method), 1247
- descriptions() (nntplib.NNTP method), 1247
- descriptor, **1902**
- dest (optparse.Option attribute), 1876
- detach() (io.BufferedIOBase method), 593
- detach() (io.TextIOBase method), 597
- detach() (socket.socket method), 939
- detach() (tkinter.ttk.Treeview method), 1427
- detach() (weakref.finalize method), 244
- Detach() (winreg.PyHKEY method), 1842
- DETACHED_PROCESS (in module subprocess), 825
- details
 - inspect command line option, 1742
- detect_api_mismatch() (in module test.support), 1596
- detect_encoding() (in module tokenize), 1796
- deterministic profiling, 1614
- device_encoding() (in module os), 548
- devnull (in module os), 586
- DEVNULL (in module subprocess), 815
- devpoll() (in module select), 985
- DevpollSelector (class in selectors), 994
- dgettext() (in module gettext), 1342
- dgettext() (in module locale), 1356
- Dialect (class in csv), 496
- dialect (csv.csvreader attribute), 498
- dialect (csv.csvwriter attribute), 498
- Dialog (class in msilib), 1831
- dict (2to3 fixer), 1581
- dict (built-in class), 77
- Dict (class in typing), 1461
- dict() (multiprocessing.managers.SyncManager method), 786
- dictConfig() (in module logging.config), 661
- dictionary, **1902**
 - object, 77
 - type, operations on, 77
- dictionary view, **1902**
- DictReader (class in csv), 495
- DictWriter (class in csv), 495
- diff_bytes() (in module difflib), 132
- diff_files (filecmp.dircmp attribute), 398
- Differ (class in difflib), 128, 136
- difference() (frozenset method), 75
- difference_update() (frozenset method), 76
- difflib (module), 128
- digest() (hashlib.hash method), 527
- digest() (hashlib.shake method), 527
- digest() (hmac.HMAC method), 536
- digest() (in module hmac), 536
- digest_size (hmac.HMAC attribute), 536
- digit() (in module unicodedata), 143
- digits (in module string), 97
- dir() (built-in function), 9
- dir() (ftplib.FTP method), 1232
- dircmp (class in filecmp), 397
- directory
 - changing, 558
 - creating, 562
 - deleting, 408, 564
 - site-packages, 1742
 - traversal, 572, 573
 - walking, 572, 573
- directory ...
 - compileall command line option, 1803
- Directory (class in msilib), 1830
- directory (http.server.SimpleHTTPRequestHandler attribute), 1278
- DirEntry (class in os), 565
- DirList (class in tkinter.tix), 1435
- dirname() (in module os.path), 386

- DirSelectBox (class in tkinter.tix), 1435
- DirSelectDialog (class in tkinter.tix), 1435
- DirsOnSysPath (class in test.support), 1598
- DirTree (class in tkinter.tix), 1435
- dis (module), 1806
- dis() (dis.Bytecode method), 1807
- dis() (in module dis), 1808
- dis() (in module pickletools), 1820
- disable (pdb command), 1611
- disable() (bdb.Breakpoint method), 1601
- disable() (in module faulthandler), 1606
- disable() (in module gc), 1723
- disable() (in module logging), 658
- disable() (profile.Profile method), 1617
- disable_faulthandler() (in module test.support), 1592
- disable_gc() (in module test.support), 1592
- disable_interspersed_args() (optparse.OptionParser method), 1881
- DisableReflectionKey() (in module winreg), 1839
- disassemble() (in module dis), 1808
- discard (http.cookiejar.Cookie attribute), 1291
- discard() (frozenset method), 76
- discard() (mailbox.Mailbox method), 1084
- discard() (mailbox.MH method), 1089
- discard_buffers() (asyncio.async_chat method), 1001
- disco() (in module dis), 1808
- discover() (unittest.TestLoader method), 1513
- disk_usage() (in module shutil), 409
- dispatch_call() (bdb.Bdb method), 1603
- dispatch_exception() (bdb.Bdb method), 1603
- dispatch_line() (bdb.Bdb method), 1602
- dispatch_return() (bdb.Bdb method), 1603
- dispatch_table (pickle.Pickler attribute), 419
- dispatcher (class in asyncore), 996
- dispatcher_with_send (class in asyncore), 998
- display (pdb command), 1613
- display_name (email.headerregistry.Address attribute), 1042
- display_name (email.headerregistry.Group attribute), 1042
- displayhook() (in module sys), 1661
- dist() (in module platform), 711
- distance() (in module turtle), 1367
- distb() (in module dis), 1808
- distutils (module), 1641
- divide() (decimal.Context method), 308
- divide_int() (decimal.Context method), 308
- DivisionByZero (class in decimal), 312
- divmod() (built-in function), 9
- divmod() (decimal.Context method), 308
- DllCanUnloadNow() (in module ctypes), 743
- DllGetClassObject() (in module ctypes), 743
- dllhandle (in module sys), 1660
- dngettext() (in module gettext), 1342
- do_clear() (bdb.Bdb method), 1603
- do_command() (curses.textpad.Textbox method), 703
- do_GET() (http.server.SimpleHTTPRequestHandler method), 1278
- do_handshake() (ssl.SSLSocket method), 964
- do_HEAD() (http.server.SimpleHTTPRequestHandler method), 1278
- do_POST() (http.server.CGIHTTPRequestHandler method), 1280
- doc (json.JSONDecodeError attribute), 1079
- doc_header (cmd.Cmd attribute), 1394
- DocCGIXMLRPCRequestHandler (class in xmlrpc.server), 1306
- DocFileSuite() (in module doctest), 1482
- doCleanups() (unittest.TestCase method), 1510
- docmd() (smtplib.SMTP method), 1252
- docstring, **1902**
- docstring (doctest.DocTest attribute), 1485
- DocTest (class in doctest), 1484
- doctest (module), 1468
- DocTestFailure, 1491
- DocTestFinder (class in doctest), 1486
- DocTestParser (class in doctest), 1486
- DocTestRunner (class in doctest), 1487
- DocTestSuite() (in module doctest), 1483
- doctype() (xml.etree.ElementTree.TreeBuilder method), 1131
- doctype() (xml.etree.ElementTree.XMLParser method), 1132
- documentation
 - generation, 1467
 - online, 1467
- documentElement (xml.dom.Document attribute), 1139
- DocXMLRPCRequestHandler (class in xmlrpc.server), 1306
- DocXMLRPCServer (class in xmlrpc.server), 1305
- domain (email.headerregistry.Address attribute), 1042
- domain (tracemalloc.DomainFilter attribute), 1636
- domain (tracemalloc.Filter attribute), 1636
- domain (tracemalloc.Trace attribute), 1638
- domain_initial_dot (http.cookiejar.Cookie attribute), 1291
- domain_return_ok() (http.cookiejar.CookiePolicy method), 1288
- domain_specified (http.cookiejar.Cookie attribute), 1291
- DomainFilter (class in tracemalloc), 1635
- DomainLiberal (http.cookiejar.DefaultCookiePolicy attribute), 1290

- DomainRFC2965Match (http.cookiejar.DefaultCookiePolicy attribute), 1290
 - DomainStrict (http.cookiejar.DefaultCookiePolicy attribute), 1290
 - DomainStrictNoDots (http.cookiejar.DefaultCookiePolicy attribute), 1290
 - DomainStrictNonDomain (http.cookiejar.DefaultCookiePolicy attribute), 1290
 - DOMEventStream (class in xml.dom.pulldom), 1150
 - DOMException, 1142
 - DomstringSizeErr, 1142
 - done() (asyncio.Future method), 896
 - done() (asyncio.Task method), 854
 - done() (concurrent.futures.Future method), 811
 - done() (in module turtle), 1382
 - done() (xdrlib.Unpacker method), 520
 - DONT_ACCEPT_BLANKLINE (in module doctest), 1476
 - DONT_ACCEPT_TRUE_FOR_1 (in module doctest), 1476
 - dont_write_bytecode (in module sys), 1661
 - doRollover() (logging.handlers.RotatingFileHandler method), 675
 - doRollover() (logging.handlers.TimedRotatingFileHandler method), 677
 - DOT (in module token), 1794
 - dot() (in module turtle), 1365
 - DOTALL (in module re), 115
 - doublequote (csv.Dialect attribute), 497
 - DOUBLESASH (in module token), 1794
 - DOUBLESASHEQUAL (in module token), 1794
 - DOUBLESTAR (in module token), 1794
 - DOUBLESTAREQUAL (in module token), 1794
 - doupdate() (in module curses), 687
 - down (pdb command), 1610
 - down() (in module turtle), 1368
 - drain() (asyncio.StreamWriter method), 859
 - drop_whitespace (textwrap.TextWrapper attribute), 141
 - dropwhile() (in module itertools), 342
 - dst() (datetime.datetime method), 188
 - dst() (datetime.time method), 194
 - dst() (datetime.timezone method), 203
 - dst() (datetime.tzinfo method), 196
 - DTDHandler (class in xml.sax.handler), 1153
 - duck-typing, 1902
 - DumbWriter (class in formatter), 1824
 - dummy_threading (module), 838
 - dump() (in module ast), 1791
 - dump() (in module json), 1074
 - dump() (in module marshal), 432
 - dump() (in module pickle), 417
 - dump() (in module plistlib), 522
 - dump() (in module xml.etree.ElementTree), 1125
 - dump() (pickle.Pickler method), 418
 - dump() (tracemalloc.Snapshot method), 1637
 - dump_stats() (profile.Profile method), 1617
 - dump_stats() (pstats.Stats method), 1618
 - dump_traceback() (in module faulthandler), 1606
 - dump_traceback_later() (in module faulthandler), 1606
 - dumps() (in module json), 1075
 - dumps() (in module marshal), 432
 - dumps() (in module pickle), 417
 - dumps() (in module plistlib), 523
 - dumps() (in module xmlrpc.client), 1299
 - dup() (in module os), 548
 - dup() (socket.socket method), 939
 - dup2() (in module os), 548
 - DUP_TOP (opcode), 1810
 - DUP_TOP_TWO (opcode), 1810
 - DuplicateOptionError, 517
 - DuplicateSectionError, 517
 - dwFlags (subprocess.STARTUPINFO attribute), 823
 - DynamicClassAttribute() (in module types), 252
- ## E
- e (in module cmath), 292
 - e (in module math), 289
 - e <tarfile> [<output_dir>]
tarfile command line option, 489
 - e <zipfile> <output_dir>
zipfile command line option, 481
 - e, -exact
tokenize command line option, 1797
 - E2BIG (in module errno), 712
 - EACCES (in module errno), 712
 - EADDRINUSE (in module errno), 716
 - EADDRNOTAVAIL (in module errno), 716
 - EADV (in module errno), 714
 - EAFNOSUPPORT (in module errno), 716
 - EAFP, 1902
 - EAGAIN (in module errno), 712
 - EALREADY (in module errno), 716
 - east_asian_width() (in module unicodedata), 143
 - EBADE (in module errno), 714
 - EBADF (in module errno), 712
 - EBADFD (in module errno), 715
 - EBADMSG (in module errno), 715
 - EBADR (in module errno), 714
 - EBADRQC (in module errno), 714
 - EBADSLT (in module errno), 714
 - EBFONT (in module errno), 714
 - EBUSY (in module errno), 712
 - ECHILD (in module errno), 712
 - echo() (in module curses), 687

- echochar() (curses.window method), 694
- ECHRRNG (in module errno), 713
- ECOMM (in module errno), 714
- ECONNABORTED (in module errno), 716
- ECONNREFUSED (in module errno), 716
- ECONNRESET (in module errno), 716
- EDEADLK (in module errno), 713
- EDEADLOCK (in module errno), 714
- EDESTADDRREQ (in module errno), 715
- edit() (curses.textpad.Textbox method), 703
- EDOM (in module errno), 713
- EDOTDOT (in module errno), 715
- EDQUOT (in module errno), 717
- EEXIST (in module errno), 712
- EFAULT (in module errno), 712
- EFBIG (in module errno), 712
- effective() (in module bdb), 1605
- ehlo() (smtplib.SMTP method), 1252
- ehlo_or_helo_if_needed() (smtplib.SMTP method), 1253
- EHOSTDOWN (in module errno), 716
- EHOSTUNREACH (in module errno), 716
- EIDRM (in module errno), 713
- EILSEQ (in module errno), 715
- EINPROGRESS (in module errno), 716
- EINTR (in module errno), 711
- EINVAL (in module errno), 712
- EIO (in module errno), 712
- EISCONN (in module errno), 716
- EISDIR (in module errno), 712
- EISNAM (in module errno), 717
- EL2HLT (in module errno), 714
- EL2NSYNC (in module errno), 713
- EL3HLT (in module errno), 713
- EL3RST (in module errno), 713
- Element (class in xml.etree.ElementTree), 1127
- element_create() (tkinter.ttk.Style method), 1431
- element_names() (tkinter.ttk.Style method), 1432
- element_options() (tkinter.ttk.Style method), 1432
- ElementDeclHandler() (xml.parsers.expat.xmlparser method), 1166
- elements() (collections.Counter method), 214
- ElementTree (class in xml.etree.ElementTree), 1129
- ELIBACC (in module errno), 715
- ELIBBAD (in module errno), 715
- ELIBEXEC (in module errno), 715
- ELIBMAX (in module errno), 715
- ELIBSCN (in module errno), 715
- Ellinghouse, Lance, 1110
- Ellipsis (built-in variable), 27
- ELLIPSIS (in module doctest), 1476
- ELLIPSIS (in module token), 1794
- ELNRNG (in module errno), 713
- ELOOP (in module errno), 713
- email (module), 1013
- email.charset (module), 1066
- email.contentmanager (module), 1042
- email.encoders (module), 1068
- email.errors (module), 1036
- email.generator (module), 1026
- email.header (module), 1063
- email.headerregistry (module), 1037
- email.iterators (module), 1071
- EmailMessage (class in email.message), 1015
- email.message (module), 1014, 1052
- email.mime (module), 1061
- email.parser (module), 1022
- EmailPolicy (class in email.policy), 1033
- email.policy (module), 1029
- email.utils (module), 1069
- EMFILE (in module errno), 712
- emit() (logging.FileHandler method), 673
- emit() (logging.Handler method), 651
- emit() (logging.handlers.BufferingHandler method), 681
- emit() (logging.handlers.DatagramHandler method), 678
- emit() (logging.handlers.HTTPHandler method), 682
- emit() (logging.handlers.NTEventLogHandler method), 680
- emit() (logging.handlers.QueueHandler method), 683
- emit() (logging.handlers.RotatingFileHandler method), 675
- emit() (logging.handlers.SMTPHandler method), 681
- emit() (logging.handlers.SocketHandler method), 677
- emit() (logging.handlers.SysLogHandler method), 678
- emit() (logging.handlers.TimedRotatingFileHandler method), 677
- emit() (logging.handlers.WatchedFileHandler method), 674
- emit() (logging.NullHandler method), 673
- emit() (logging.StreamHandler method), 672
- EMLINK (in module errno), 713
- Empty, 833
- empty (inspect.Parameter attribute), 1733
- empty (inspect.Signature attribute), 1732
- empty() (asyncio.Queue method), 871
- empty() (multiprocessing.Queue method), 774
- empty() (multiprocessing.SimpleQueue method), 775
- empty() (queue.Queue method), 834
- empty() (queue.SimpleQueue method), 835
- empty() (sched.scheduler method), 832
- EMPTY_NAMESPACE (in module xml.dom), 1135
- emptyline() (cmd.Cmd method), 1393
- EMSGSIZE (in module errno), 715
- EMULTIHOP (in module errno), 715
- enable (pdb command), 1611

- `enable()` (`bdb.Breakpoint` method), 1601
- `enable()` (`imaplib.IMAP4` method), 1239
- `enable()` (in module `cgitb`), 1182
- `enable()` (in module `faulthandler`), 1606
- `enable()` (in module `gc`), 1723
- `enable()` (`profile.Profile` method), 1617
- `enable_callback_tracebacks()` (in module `sqlite3`), 441
- `enable_interspersed_args()` (`optparse.OptionParser` method), 1881
- `enable_load_extension()` (`sqlite3.Connection` method), 444
- `enable_traversal()` (`tkinter.ttk.Notebook` method), 1422
- `ENABLE_USER_SITE` (in module `site`), 1744
- `EnableReflectionKey()` (in module `winreg`), 1839
- `ENAMETOOLONG` (in module `errno`), 713
- `ENAVAIL` (in module `errno`), 717
- `enclose()` (`curses.window` method), 694
- `encode`
 - Codecs, 156
- `encode` (`codecs.CodecInfo` attribute), 157
- `encode()` (`codecs.Codec` method), 161
- `encode()` (`codecs.IncrementalEncoder` method), 162
- `encode()` (`email.header.Header` method), 1065
- `encode()` (in module `base64`), 1106
- `encode()` (in module `codecs`), 156
- `encode()` (in module `quopri`), 1109
- `encode()` (in module `uu`), 1110
- `encode()` (`json.JSONEncoder` method), 1078
- `encode()` (`str` method), 45
- `encode()` (`xmlrpc.client.Binary` method), 1296
- `encode()` (`xmlrpc.client.DateTime` method), 1295
- `encode_7or8bit()` (in module `email.encoders`), 1068
- `encode_base64()` (in module `email.encoders`), 1068
- `encode_noop()` (in module `email.encoders`), 1069
- `encode_quopri()` (in module `email.encoders`), 1068
- `encode_rfc2231()` (in module `email.utils`), 1071
- `encodebytes()` (in module `base64`), 1106
- `EncodedFile()` (in module `codecs`), 158
- `encodePriority()` (`logging.handlers.SysLogHandler` method), 679
- `encodingstring()` (in module `base64`), 1106
- `encodingstring()` (in module `quopri`), 1109
- `encoding`
 - `base64`, 1103
 - `quoted-printable`, 1109
- `encoding` (`curses.window` attribute), 694
- `ENCODING` (in module `tarfile`), 483
- `ENCODING` (in module `token`), 1795
- `encoding` (`io.TextIOBase` attribute), 597
- `encoding` (`UnicodeError` attribute), 92
- `encodings_map` (in module `mimetypes`), 1102
- `encodings_map` (`mimetypes.MimeTypes` attribute), 1102
- `encodings.idna` (module), 172
- `encodings.mbcx` (module), 173
- `encodings.utf_8_sig` (module), 173
- `end` (`UnicodeError` attribute), 92
- `end()` (`re.Match` method), 121
- `end()` (`xml.etree.ElementTree.TreeBuilder` method), 1131
- `end_fill()` (in module `turtle`), 1372
- `END_FINALLY` (opcode), 1813
- `end_headers()` (`http.server.BaseHTTPRequestHandler` method), 1277
- `end_paragraph()` (`formatter.formatter` method), 1821
- `end_poly()` (in module `turtle`), 1377
- `EndCdataSectionHandler()`
 - (`xml.parsers.expat.xmlparser` method), 1167
- `EndDoctypeDeclHandler()`
 - (`xml.parsers.expat.xmlparser` method), 1166
- `endDocument()`
 - (`xml.sax.handler.ContentHandler` method), 1155
- `endElement()`
 - (`xml.sax.handler.ContentHandler` method), 1156
- `EndElementHandler()`
 - (`xml.parsers.expat.xmlparser` method), 1166
- `endElementNS()`
 - (`xml.sax.handler.ContentHandler` method), 1156
- `endheaders()`
 - (`http.client.HTTPConnection` method), 1226
- `ENDMARKER` (in module `token`), 1794
- `EndNamespaceDeclHandler()`
 - (`xml.parsers.expat.xmlparser` method), 1167
- `endpos` (`re.Match` attribute), 122
- `endPrefixMapping()`
 - (`xml.sax.handler.ContentHandler` method), 1155
- `endswith()` (`bytearray` method), 57
- `endswith()` (`bytes` method), 57
- `endswith()` (`str` method), 45
- `endwin()` (in module `curses`), 687
- `ENETDOWN` (in module `errno`), 716
- `ENETRESET` (in module `errno`), 716
- `ENETUNREACH` (in module `errno`), 716
- `ENFILE` (in module `errno`), 712
- `ENOANO` (in module `errno`), 714
- `ENOBUFFS` (in module `errno`), 716
- `ENOCSS` (in module `errno`), 714
- `ENODATA` (in module `errno`), 714
- `ENODEV` (in module `errno`), 712
- `ENOENT` (in module `errno`), 711
- `ENOEXEC` (in module `errno`), 712

- ENOLCK (in module errno), 713
- ENOLINK (in module errno), 714
- ENOMEM (in module errno), 712
- ENOMSG (in module errno), 713
- ENONET (in module errno), 714
- ENOPKG (in module errno), 714
- ENOPROTOOPT (in module errno), 715
- ENOSPC (in module errno), 713
- ENOSR (in module errno), 714
- ENOSTR (in module errno), 714
- ENOSYS (in module errno), 713
- ENOTBLK (in module errno), 712
- ENOTCONN (in module errno), 716
- ENOTDIR (in module errno), 712
- ENOTEMPTY (in module errno), 713
- ENOTNAM (in module errno), 717
- ENOTSOCK (in module errno), 715
- ENOTTY (in module errno), 712
- ENOTUNIQ (in module errno), 715
- enqueue() (logging.handlers.QueueHandler method), 683
- enqueue_sentinel() (logging.handlers.QueueListener method), 684
- ensure_directories() (venv.EnvBuilder method), 1647
- ensure_future() (in module asyncio), 895
- ensurepip (module), 1641
- enter() (sched.scheduler method), 832
- enter_async_context() (contextlib.AsyncExitStack method), 1702
- enter_context() (contextlib.ExitStack method), 1701
- enterabs() (sched.scheduler method), 832
- entities (xml.dom.DocumentType attribute), 1139
- EntityDeclHandler() (xml.parsers.expat.xmlparser method), 1166
- entitydefs (in module html.entities), 1116
- EntityResolver (class in xml.sax.handler), 1153
- Enum (class in enum), 261
- enum (module), 261
- enum_certificates() (in module ssl), 956
- enum_crls() (in module ssl), 956
- enumerate() (built-in function), 10
- enumerate() (in module threading), 751
- EnumKey() (in module winreg), 1836
- EnumValue() (in module winreg), 1836
- EnvBuilder (class in venv), 1646
- environ (in module os), 542
- environ (in module posix), 1846
- environb (in module os), 542
- environment variable
 - AUDIODEV, 1335
 - BROWSER, 1173, 1174
 - COLS, 691
 - COLUMNS, 692
 - COMSPEC, 581, 818
 - HOME, 386
 - HOMEDRIVE, 386
 - HOMEPATH, 386
 - http_proxy, 1194, 1206
 - IDLESTARTUP, 1445
 - KDEDIR, 1175
 - LANG, 1341, 1343, 1350, 1353
 - LANGUAGE, 1341, 1343
 - LC_ALL, 1341, 1343
 - LC_MESSAGES, 1341, 1343
 - LINES, 687, 691, 692
 - LNAME, 685
 - LOGNAME, 544, 685
 - MIXERDEV, 1336
 - no_proxy, 1196
 - PAGER, 1468
 - PATH, 576, 580, 586, 1173, 1180, 1182
 - POSIXLY_CORRECT, 643
 - PYTHON_DOM, 1135
 - PYTHONASYNCIODEBUG, 889, 924
 - PYTHONBREAKPOINT, 1660
 - PYTHONDEVMODE, 1599
 - PYTHONDOCS, 1468
 - PYTHONDONTWRITEBYTECODE, 1661
 - PYTHONFAULTHANDLER, 1605
 - PYTHONHOME, 1599
 - PYTHONIOENCODING, 1675
 - PYTHONLEGACYWINDOWSFSENCODING, 1674
 - PYTHONNOUSERSITE, 1744
 - PYTHONPATH, 1180, 1599, 1670
 - PYTHONSTARTUP, 149, 1445, 1669, 1743
 - PYTHONTRACEMALLOC, 1630, 1635
 - PYTHONUSERBASE, 1744
 - PYTHONUSERSITE, 1599
 - PYTHONWARNINGS, 1683
 - SOURCE_DATE_EPOCH, 1802, 1804
 - SSL_CERT_FILE, 985
 - SSL_CERT_PATH, 985
 - SystemRoot, 820
 - TEMP, 401
 - TERM, 690, 691
 - TIX_LIBRARY, 1434
 - TMP, 401
 - TMPDIR, 401
 - TZ, 607, 608
 - USER, 685
 - USERNAME, 544, 685
 - USERPROFILE, 386
- environment variables
 - deleting, 547
 - setting, 545
- EnvironmentError, 92

Environments

virtual, 1643

EnvironmentVarGuard (class in test.support), 1597

ENXIO (in module errno), 712

eof (bz2.BZ2Decompressor attribute), 467

eof (lzma.LZMADecompressor attribute), 471

eof (shlex.shlex attribute), 1400

eof (ssl.MemoryBIO attribute), 982

eof (zlib.Decompress attribute), 462

eof_received() (asyncio.BufferedProtocol method), 905

eof_received() (asyncio.Protocol method), 904

EOFError, 88

EOPNOTSUPP (in module errno), 716

EOVERFLOW (in module errno), 715

EPERM (in module errno), 711

EPFNOSUPPORT (in module errno), 716

epilogue (email.message.EmailMessage attribute), 1022

epilogue (email.message.Message attribute), 1060

EPIPE (in module errno), 713

epoch, 600

epoll() (in module select), 986

EpollSelector (class in selectors), 994

EPROTO (in module errno), 714

EPROTONOSUPPORT (in module errno), 715

EPROTOTYPE (in module errno), 715

eq() (in module operator), 360

EQEQUAL (in module token), 1794

EQUAL (in module token), 1794

ERA (in module locale), 1353

ERA_D_FMT (in module locale), 1353

ERA_D_T_FMT (in module locale), 1353

ERA_T_FMT (in module locale), 1353

ERANGE (in module errno), 713

erase() (curses.window method), 694

erasechar() (in module curses), 687

EREMCHG (in module errno), 715

EREMOTE (in module errno), 714

EREMOTEIO (in module errno), 717

ERESTART (in module errno), 715

erf() (in module math), 288

erfc() (in module math), 288

EROFS (in module errno), 713

ERR (in module curses), 698

errcheck (ctypes._FuncPtr attribute), 740

errcode (xmlrpc.client.ProtocolError attribute), 1297

errmsg (xmlrpc.client.ProtocolError attribute), 1298

errno

module, 89

errno (module), 711

errno (OSError attribute), 90

Error, 410, 452, 497, 517, 521, 1099, 1107, 1109, 1110, 1173, 1327, 1330, 1349

error, 118, 151, 253, 433, 434, 436, 459, 541, 644, 686, 836, 930, 985, 1163, 1321, 1857, 1861

error() (argparse.ArgumentParser method), 641

error() (in module logging), 658

error() (logging.Logger method), 648

error() (urllib.request.OpenerDirector method), 1200

error() (xml.sax.handler.ErrorHandler method), 1157

error_body (wsgiref.handlers.BaseHandler attribute), 1191

error_content_type (http.server.BaseHTTPRequestHandler attribute), 1276

error_headers (wsgiref.handlers.BaseHandler attribute), 1191

error_leader() (shlex.shlex method), 1399

error_message_format (http.server.BaseHTTPRequestHandler attribute), 1276

error_output() (wsgiref.handlers.BaseHandler method), 1191

error_perm, 1230

error_proto, 1230, 1234

error_received() (asyncio.DatagramProtocol method), 905

error_reply, 1230

error_status (wsgiref.handlers.BaseHandler attribute), 1191

error_temp, 1230

ErrorByteIndex (xml.parsers.expat.xmlparser attribute), 1165

errorcode (in module errno), 711

ErrorCode (xml.parsers.expat.xmlparser attribute), 1165

ErrorColumnNumber (xml.parsers.expat.xmlparser attribute), 1165

ErrorHandler (class in xml.sax.handler), 1153

ErrorLineNumber (xml.parsers.expat.xmlparser attribute), 1165

Errors

logging, 645

errors (io.TextIOBase attribute), 597

errors (unittest.TestLoader attribute), 1512

errors (unittest.TestResult attribute), 1515

ErrorString() (in module xml.parsers.expat), 1163

ERRORTOKEN (in module token), 1794

escape (shlex.shlex attribute), 1400

escape() (in module cgi), 1180

escape() (in module glob), 403

escape() (in module html), 1111

escape() (in module re), 117

escape() (in module xml.sax.saxutils), 1157

escapechar (csv.Dialect attribute), 497

escapedquotes (shlex.shlex attribute), 1400

ESHUTDOWN (in module errno), 716

ESOCKTNOSUPPORT (in module errno), 716

- ESPIPE (in module errno), 713
- ESRCH (in module errno), 711
- ESRMNT (in module errno), 714
- ESTALE (in module errno), 717
- ESTRPIPE (in module errno), 715
- ETIME (in module errno), 714
- ETIMEDOUT (in module errno), 716
- Etiny() (decimal.Context method), 307
- ETOOMANYREFS (in module errno), 716
- Etop() (decimal.Context method), 307
- ETXTBSY (in module errno), 712
- EUCLEAN (in module errno), 717
- EUNATCH (in module errno), 713
- EUSERS (in module errno), 715
- eval
 - built-in function, 83, 255, 1783
- eval() (built-in function), 10
- Event (class in asyncio), 863
- Event (class in multiprocessing), 779
- Event (class in threading), 760
- event scheduling, 831
- event() (msilib.Control method), 1831
- Event() (multiprocessing.managers.SyncManager method), 786
- events (selectors.SelectorKey attribute), 993
- events (widgets), 1412
- EWouldBlock (in module errno), 713
- EX_CANTCREAT (in module os), 577
- EX_CONFIG (in module os), 578
- EX_DATAERR (in module os), 577
- EX_IOERR (in module os), 577
- EX_NOHOST (in module os), 577
- EX_NOINPUT (in module os), 577
- EX_NOPERM (in module os), 578
- EX_NOTFOUND (in module os), 578
- EX_NOUSER (in module os), 577
- EX_OK (in module os), 576
- EX_OSERR (in module os), 577
- EX_OSFILE (in module os), 577
- EX_PROTOCOL (in module os), 577
- EX_SOFTWARE (in module os), 577
- EX_TEMPFAIL (in module os), 577
- EX_UNAVAILABLE (in module os), 577
- EX_USAGE (in module os), 577
- Example (class in doctest), 1485
- example (doctest.DocTestFailure attribute), 1491
- example (doctest.UnexpectedException attribute), 1491
- examples (doctest.DocTest attribute), 1484
- exc_info (doctest.UnexpectedException attribute), 1491
- exc_info() (in module sys), 1662
- exc_msg (doctest.Example attribute), 1485
- exc_type (traceback.TracebackException attribute), 1718
- excel (class in csv), 496
- excel_tab (class in csv), 496
- except
 - statement, 87
- except (2to3 fixer), 1581
- excepthook() (in module sys), 1182, 1661
- Exception, 88
- EXCEPTION (in module tkinter), 1414
- exception() (asyncio.Future method), 897
- exception() (asyncio.Task method), 854
- exception() (concurrent.futures.Future method), 812
- exception() (in module logging), 658
- exception() (logging.Logger method), 648
- exceptions
 - in CGI scripts, 1182
- EXDEV (in module errno), 712
- exec
 - built-in function, 10, 83, 1783
- exec (2to3 fixer), 1581
- exec() (built-in function), 10
- exec_module() (importlib.abc.InspectLoader method), 1766
- exec_module() (importlib.abc.Loader method), 1763
- exec_module() (importlib.abc.SourceLoader method), 1768
- exec_module() (importlib.machinery.ExtensionFileLoader method), 1773
- exec_prefix (in module sys), 1662
- execfile (2to3 fixer), 1581
- execl() (in module os), 575
- execle() (in module os), 575
- execlp() (in module os), 575
- execlpe() (in module os), 575
- executable (in module sys), 1662
- Executable Zip Files, 1652
- Execute() (msilib.View method), 1828
- execute() (sqlite3.Connection method), 442
- execute() (sqlite3.Cursor method), 447
- executemany() (sqlite3.Connection method), 442
- executemany() (sqlite3.Cursor method), 448
- executescript() (sqlite3.Connection method), 442
- executescript() (sqlite3.Cursor method), 449
- ExecutionLoader (class in importlib.abc), 1766
- Executor (class in concurrent.futures), 807
- execv() (in module os), 575
- execve() (in module os), 575
- execvp() (in module os), 575
- execvpe() (in module os), 575
- ExFileSelectBox (class in tkinter.tix), 1435
- EXFULL (in module errno), 714
- exists() (in module os.path), 386
- exists() (pathlib.Path method), 378

- `exists()` (tkinter.ttk.Treeview method), 1427
 - `exit` (built-in variable), 28
 - `exit()` (argparse.ArgumentParser method), 641
 - `exit()` (in module `_thread`), 836
 - `exit()` (in module `sys`), 1662
 - `exitcode` (multiprocessing.Process attribute), 771
 - `exitfunc` (2to3 fixer), 1581
 - `exitonclick()` (in module `turtle`), 1385
 - `ExitStack` (class in `contextlib`), 1701
 - `exp()` (decimal.Context method), 308
 - `exp()` (decimal.Decimal method), 301
 - `exp()` (in module `cmath`), 290
 - `exp()` (in module `math`), 286
 - `expand()` (re.Match method), 120
 - `expand_tabs` (textwrap.TextWrapper attribute), 141
 - `ExpandEnvironmentStrings()` (in module `winreg`), 1836
 - `expandNode()` (xml.dom.pulldom.DOMEEventStream method), 1150
 - `expandtabs()` (bytearray method), 61
 - `expandtabs()` (bytes method), 61
 - `expandtabs()` (str method), 45
 - `expanduser()` (in module `os.path`), 386
 - `expanduser()` (pathlib.Path method), 379
 - `expandvars()` (in module `os.path`), 386
 - `Expat`, 1162
 - `ExpatError`, 1163
 - `expect()` (telnetlib.Telnet method), 1261
 - `expected` (asyncio.IncompleteReadError attribute), 875
 - `expectedFailure()` (in module `unittest`), 1500
 - `expectedFailures` (unittest.TestResult attribute), 1515
 - `expires` (http.cookiejar.Cookie attribute), 1291
 - `exploded` (ipaddress.IPv4Address attribute), 1308
 - `exploded` (ipaddress.IPv4Network attribute), 1312
 - `exploded` (ipaddress.IPv6Address attribute), 1309
 - `exploded` (ipaddress.IPv6Network attribute), 1315
 - `expm1()` (in module `math`), 286
 - `expovariate()` (in module `random`), 326
 - `expr()` (in module `parser`), 1782
 - `expression`, 1902
 - `expunge()` (imaplib.IMAP4 method), 1239
 - `extend()` (array.array method), 239
 - `extend()` (collections.deque method), 216
 - `extend()` (sequence method), 39
 - `extend()` (xml.etree.ElementTree.Element method), 1128
 - `extend_path()` (in module `pkgutil`), 1753
 - `EXTENDED_ARG` (opcode), 1818
 - `ExtendedContext` (class in `decimal`), 305
 - `ExtendedInterpolation` (class in `configparser`), 504
 - `extendleft()` (collections.deque method), 217
 - `extension` module, 1902
 - `EXTENSION_SUFFIXES` (in module `importlib.machinery`), 1770
 - `ExtensionFileLoader` (class in `importlib.machinery`), 1773
 - `extensions_map` (http.server.SimpleHTTPRequestHandler attribute), 1278
 - `External Data Representation`, 416, 519
 - `external_attr` (zipfile.ZipInfo attribute), 480
 - `ExternalClashError`, 1099
 - `ExternalEntityParserCreate()` (xml.parsers.expat.xmlparser method), 1164
 - `ExternalEntityRefHandler()` (xml.parsers.expat.xmlparser method), 1167
 - `extra` (zipfile.ZipInfo attribute), 480
 - `-extract <tarfile> [<output_dir>]` tarfile command line option, 489
 - `-extract <zipfile> <output_dir>` zipfile command line option, 481
 - `extract()` (tarfile.TarFile method), 486
 - `extract()` (traceback.StackSummary class method), 1718
 - `extract()` (zipfile.ZipFile method), 476
 - `extract_cookies()` (http.cookiejar.CookieJar method), 1285
 - `extract_stack()` (in module `traceback`), 1716
 - `extract_tb()` (in module `traceback`), 1716
 - `extract_version` (zipfile.ZipInfo attribute), 480
 - `extractall()` (tarfile.TarFile method), 485
 - `extractall()` (zipfile.ZipFile method), 477
 - `ExtractError`, 483
 - `extractfile()` (tarfile.TarFile method), 486
 - `extsep` (in module `os`), 586
- ## F
- `-f`
 - compileall command line option, 1803
 - `-f, --failfast`
 - unittest command line option, 1495
 - `-f, --file=<file>`
 - trace command line option, 1628
 - `f_contiguous` (memoryview attribute), 74
 - `F_LOCK` (in module `os`), 550
 - `F_OK` (in module `os`), 558
 - `F_TEST` (in module `os`), 550
 - `F_TLOCK` (in module `os`), 550
 - `F_ULOCK` (in module `os`), 550
 - `fabs()` (in module `math`), 284
 - `factorial()` (in module `math`), 285
 - `factory()` (importlib.util.LazyLoader class method), 1777
 - `fail()` (unittest.TestCase method), 1509
 - `FAIL_FAST` (in module `doctest`), 1478

- failfast (unittest.TestResult attribute), 1515
- failureException (unittest.TestCase attribute), 1509
- failures (unittest.TestResult attribute), 1515
- FakePath (class in test.support), 1598
- False, 29, 84
- false, 29
- False (Built-in object), 29
- False (built-in variable), 27
- family (socket.socket attribute), 945
- FancyURLopener (class in urllib.request), 1209
- fast (pickle.Pickler attribute), 419
- FastChildWatcher (class in asyncio), 914
- fatalError() (xml.sax.handler.ErrorHandler method), 1157
- Fault (class in xmlrpc.client), 1297
- faultCode (xmlrpc.client.Fault attribute), 1297
- faulthandler (module), 1605
- faultString (xmlrpc.client.Fault attribute), 1297
- fchdir() (in module os), 560
- fchmod() (in module os), 548
- fchown() (in module os), 549
- FCICreate() (in module msilib), 1827
- fcntl (module), 1853
- fcntl() (in module fcntl), 1853
- fd (selectors.SelectorKey attribute), 993
- fd() (in module turtle), 1362
- fd_count() (in module test.support), 1589
- fdatasync() (in module os), 549
- fdopen() (in module os), 548
- Feature (class in msilib), 1831
- feature_external_ges (in module xml.sax.handler), 1154
- feature_external_pes (in module xml.sax.handler), 1154
- feature_namespace_prefixes (in module xml.sax.handler), 1153
- feature_namespaces (in module xml.sax.handler), 1153
- feature_string_interning (in module xml.sax.handler), 1153
- feature_validation (in module xml.sax.handler), 1153
- feed() (email.parser.BytesFeedParser method), 1023
- feed() (html.parser.HTMLParser method), 1112
- feed() (xml.etree.ElementTree.XMLParser method), 1132
- feed() (xml.etree.ElementTree.XMLPullParser method), 1133
- feed() (xml.sax.xmlreader.IncrementalParser method), 1160
- FeedParser (class in email.parser), 1024
- fetch() (imaplib.IMAP4 method), 1239
- Fetch() (msilib.View method), 1829
- fetchall() (sqlite3.Cursor method), 450
- fetchmany() (sqlite3.Cursor method), 450
- fetchone() (sqlite3.Cursor method), 449
- fflags (select.kevent attribute), 991
- Field (class in dataclasses), 1691
- field() (in module dataclasses), 1690
- field_size_limit() (in module csv), 494
- fieldnames (csv.csvreader attribute), 498
- fields (uuid.UUID attribute), 1263
- fields() (in module dataclasses), 1691
- file
 - byte-code, 1801, 1890
 - configuration, 499
 - copying, 406
 - debugger configuration, 1610
 - .ini, 499
 - large files, 1845
 - mime.types, 1102
 - modes, 17
 - path configuration, 1742
 - .pdbrc, 1610
 - plist, 521
 - temporary, 398
- file ...
 - compileall command line option, 1803
- file (pyclbr.Class attribute), 1801
- file (pyclbr.Function attribute), 1800
- file control
 - UNIX, 1853
- file name
 - temporary, 398
- file object, **1902**
 - io module, 588
 - open() built-in function, 16
- FILE_ATTRIBUTE_ARCHIVE (in module stat), 396
- FILE_ATTRIBUTE_COMPRESSED (in module stat), 396
- FILE_ATTRIBUTE_DEVICE (in module stat), 396
- FILE_ATTRIBUTE_DIRECTORY (in module stat), 396
- FILE_ATTRIBUTE_ENCRYPTED (in module stat), 396
- FILE_ATTRIBUTE_HIDDEN (in module stat), 396
- FILE_ATTRIBUTE_INTEGRITY_STREAM (in module stat), 396
- FILE_ATTRIBUTE_NO_SCRUB_DATA (in module stat), 396
- FILE_ATTRIBUTE_NORMAL (in module stat), 396
- FILE_ATTRIBUTE_NOT_CONTENT_INDEXED (in module stat), 396
- FILE_ATTRIBUTE_OFFLINE (in module stat), 396

- FILE_ATTRIBUTE_READONLY (in module stat), 396
- FILE_ATTRIBUTE_REPARSE_POINT (in module stat), 396
- FILE_ATTRIBUTE_SPARSE_FILE (in module stat), 396
- FILE_ATTRIBUTE_SYSTEM (in module stat), 396
- FILE_ATTRIBUTE_TEMPORARY (in module stat), 396
- FILE_ATTRIBUTE_VIRTUAL (in module stat), 396
- file_dispatcher (class in asyncore), 998
- file_open() (urllib.request.FileHandler method), 1204
- file_size (zipfile.ZipInfo attribute), 481
- file_wrapper (class in asyncore), 998
- filecmp (module), 396
- fileConfig() (in module logging.config), 662
- FileCookieJar (class in http.cookiejar), 1284
- FileEntry (class in tkinter.tix), 1435
- FileExistsError, 93
- FileFinder (class in importlib.machinery), 1771
- FileHandler (class in logging), 673
- FileHandler (class in urllib.request), 1197
- FileInput (class in fileinput), 391
- fileinput (module), 389
- FileIO (class in io), 594
- file-like object, 1903
- filelineno() (in module fileinput), 390
- FileLoader (class in importlib.abc), 1766
- filemode() (in module stat), 393
- filename (doctest.DocTest attribute), 1485
- filename (http.cookiejar.FileCookieJar attribute), 1287
- filename (OSError attribute), 90
- filename (traceback.TracebackException attribute), 1718
- filename (tracemalloc.Frame attribute), 1636
- filename (zipfile.ZipFile attribute), 478
- filename (zipfile.ZipInfo attribute), 480
- filename() (in module fileinput), 390
- filename2 (OSError attribute), 90
- filename_only (in module tabnanny), 1799
- filename_pattern (tracemalloc.Filter attribute), 1636
- filenames
 - pathname expansion, 403
 - wildcard expansion, 404
- fileno() (http.client.HTTPResponse method), 1226
- fileno() (in module fileinput), 390
- fileno() (io.IOBase method), 591
- fileno() (multiprocessing.connection.Connection method), 777
- fileno() (ossaudiodev.oss_audio_device method), 1336
- fileno() (ossaudiodev.oss_mixer_device method), 1338
- fileno() (select.devpoll method), 987
- fileno() (select.epoll method), 989
- fileno() (select.kqueue method), 990
- fileno() (selectors.DevpollSelector method), 995
- fileno() (selectors.EpollSelector method), 994
- fileno() (selectors.KqueueSelector method), 995
- fileno() (socketserver.BaseServer method), 1268
- fileno() (socket.socket method), 939
- fileno() (telnetlib.Telnet method), 1261
- FileNotFoundError, 93
- fileobj (selectors.SelectorKey attribute), 993
- FileSelectBox (class in tkinter.tix), 1435
- FileType (class in argparse), 637
- FileWrapper (class in wsgiref.util), 1185
- fill() (in module textwrap), 139
- fill() (textwrap.TextWrapper method), 142
- fillcolor() (in module turtle), 1371
- filling() (in module turtle), 1372
- filter (2to3 fixer), 1581
- Filter (class in logging), 652
- Filter (class in tracemalloc), 1636
- filter (select.kevent attribute), 991
- filter() (built-in function), 11
- filter() (in module curses), 687
- filter() (in module fnmatch), 405
- filter() (logging.Filter method), 652
- filter() (logging.Handler method), 650
- filter() (logging.Logger method), 648
- FILTER_DIR (in module unittest.mock), 1552
- filter_traces() (tracemalloc.Snapshot method), 1637
- filterfalse() (in module itertools), 342
- filterwarnings() (in module warnings), 1687
- finalize (class in weakref), 243
- find() (bytearray method), 57
- find() (bytes method), 57
- find() (doctest.DocTestFinder method), 1486
- find() (in module gettext), 1343
- find() (mmap.mmap method), 1011
- find() (str method), 45
- find() (xml.etree.ElementTree.Element method), 1128
- find() (xml.etree.ElementTree.ElementTree method), 1130
- find_class() (pickle protocol), 426
- find_class() (pickle.Unpickler method), 419
- find_library() (in module ctypes.util), 743
- find_loader() (importlib.abc.PathEntryFinder method), 1763
- find_loader() (importlib.machinery.FileFinder method), 1772

- `find_loader()` (in module `importlib`), 1760
- `find_loader()` (in module `pkgutil`), 1754
- `find_longest_match()` (`difflib.SequenceMatcher` method), 133
- `find_module()` (`imp.NullImporter` method), 1894
- `find_module()` (`importlib.abc.Finder` method), 1762
- `find_module()` (`importlib.abc.MetaPathFinder` method), 1762
- `find_module()` (`importlib.abc.PathEntryFinder` method), 1763
- `find_module()` (`importlib.machinery.PathFinder` class method), 1771
- `find_module()` (in module `imp`), 1890
- `find_module()` (`zipimport.zipimporter` method), 1752
- `find_msvrt()` (in module `ctypes.util`), 743
- `find_spec()` (`importlib.abc.MetaPathFinder` method), 1762
- `find_spec()` (`importlib.abc.PathEntryFinder` method), 1763
- `find_spec()` (`importlib.machinery.FileFinder` method), 1771
- `find_spec()` (`importlib.machinery.PathFinder` class method), 1771
- `find_spec()` (in module `importlib.util`), 1775
- `find_unused_port()` (in module `test.support`), 1595
- `find_user_password()` (`urlib.request.HTTPPasswordMgr` method), 1202, 1203
- `findall()` (in module `re`), 116
- `findall()` (`re.Pattern` method), 119
- `findall()` (`xml.etree.ElementTree.Element` method), 1128
- `findall()` (`xml.etree.ElementTree.ElementTree` method), 1130
- `findCaller()` (`logging.Logger` method), 649
- `finder`, 1903
- `Finder` (class in `importlib.abc`), 1762
- `findfactor()` (in module `audioop`), 1322
- `findfile()` (in module `test.support`), 1589
- `findfit()` (in module `audioop`), 1322
- `finditer()` (in module `re`), 116
- `finditer()` (`re.Pattern` method), 119
- `findlabels()` (in module `dis`), 1809
- `findlinestarts()` (in module `dis`), 1809
- `findmatch()` (in module `mailcap`), 1082
- `findmax()` (in module `audioop`), 1322
- `findtext()` (`xml.etree.ElementTree.Element` method), 1128
- `findtext()` (`xml.etree.ElementTree.ElementTree` method), 1130
- `finish()` (`socketserver.BaseRequestHandler` method), 1270
- `finish_request()` (`socketserver.BaseServer` method), 1269
- `firstChild` (`xml.dom.Node` attribute), 1137
- `firstkey()` (`dbm.gnu.gdbm` method), 435
- `firstweekday()` (in module `calendar`), 209
- `fix_missing_locations()` (in module `ast`), 1789
- `fix_sentence_endings` (`textwrap.TextWrapper` attribute), 141
- `Flag` (class in `enum`), 261
- `flag_bits` (`zipfile.ZipInfo` attribute), 480
- `flags` (in module `sys`), 1662
- `flags` (`re.Pattern` attribute), 119
- `flags` (`select.kevent` attribute), 991
- `flash()` (in module `curses`), 687
- `flatten()` (`email.generator.BytesGenerator` method), 1027
- `flatten()` (`email.generator.Generator` method), 1028
- `flattening` objects, 415
- `float`
 - built-in function, 31
- `float` (built-in class), 11
- `float_info` (in module `sys`), 1663
- `float_repr_style` (in module `sys`), 1664
- floating point
 - literals, 31
 - object, 30
- `FloatingPointError`, 88
- `FloatOperation` (class in `decimal`), 313
- `flock()` (in module `fcntl`), 1854
- floor division, 1903
- `floor()` (in module `math`), 31, 285
- `floordiv()` (in module `operator`), 360
- `flush()` (`bz2.BZ2Compressor` method), 467
- `flush()` (`formatter.writer` method), 1823
- `flush()` (`io.BufferedWriter` method), 596
- `flush()` (`io.IOBase` method), 591
- `flush()` (`logging.Handler` method), 650
- `flush()` (`logging.handlers.BufferingHandler` method), 682
- `flush()` (`logging.handlers.MemoryHandler` method), 682
- `flush()` (`logging.StreamHandler` method), 672
- `flush()` (`lzma.LZMACompressor` method), 470
- `flush()` (`mailbox.Mailbox` method), 1085
- `flush()` (`mailbox.Maildir` method), 1087
- `flush()` (`mailbox.MH` method), 1089
- `flush()` (`mmap.mmap` method), 1011
- `flush()` (`zlib.Compress` method), 461
- `flush()` (`zlib.Decompress` method), 462
- `flush_headers()` (`http.server.BaseHTTPRequestHandler` method), 1277
- `flush_softspace()` (`formatter.formatter` method), 1822
- `flushinp()` (in module `curses`), 687

- FlushKey() (in module winreg), 1836
- fma() (decimal.Context method), 308
- fma() (decimal.Decimal method), 301
- fmod() (in module math), 285
- FMT_BINARY (in module plistlib), 523
- FMT_XML (in module plistlib), 523
- fnmatch (module), 404
- fnmatch() (in module fnmatch), 404
- fnmatchcase() (in module fnmatch), 404
- focus() (tkinter.ttk.Treeview method), 1427
- fold (datetime.datetime attribute), 185
- fold (datetime.time attribute), 192
- fold() (email.headerregistry.BaseHeader method), 1038
- fold() (email.policy.Compat32 method), 1036
- fold() (email.policy.EmailPolicy method), 1034
- fold() (email.policy.Policy method), 1033
- fold_binary() (email.policy.Compat32 method), 1036
- fold_binary() (email.policy.EmailPolicy method), 1034
- fold_binary() (email.policy.Policy method), 1033
- FOR_ITER (opcode), 1816
- forget() (in module test.support), 1588
- forget() (tkinter.ttk.Notebook method), 1422
- fork() (in module os), 578
- fork() (in module pty), 1852
- ForkingMixIn (class in socketserver), 1267
- ForkingTCPServer (class in socketserver), 1267
- ForkingUDPServer (class in socketserver), 1267
- forkpty() (in module os), 578
- Form (class in tkinter.tix), 1437
- format (memoryview attribute), 74
- format (struct.Struct attribute), 156
- format() (built-in function), 12
- format() (in module locale), 1354
- format() (logging.Formatter method), 651
- format() (logging.Handler method), 651
- format() (pprint.PrettyPrinter method), 256
- format() (str method), 45
- format() (string.Formatter method), 98
- format() (traceback.StackSummary method), 1719
- format() (traceback.TracebackException method), 1718
- format() (tracemalloc.Traceback method), 1639
- format_datetime() (in module email.utils), 1070
- format_exc() (in module traceback), 1717
- format_exception() (in module traceback), 1717
- format_exception_only() (in module traceback), 1716
- format_exception_only() (traceback.TracebackException method), 1718
- format_field() (string.Formatter method), 99
- format_help() (argparse.ArgumentParser method), 640
- format_list() (in module traceback), 1716
- format_map() (str method), 46
- format_stack() (in module traceback), 1717
- format_stack_entry() (bdb.Bdb method), 1604
- format_string() (in module locale), 1354
- format_tb() (in module traceback), 1717
- format_usage() (argparse.ArgumentParser method), 640
- FORMAT_VALUE (opcode), 1818
- formataddr() (in module email.utils), 1069
- formatargspec() (in module inspect), 1736
- formatargvalues() (in module inspect), 1737
- formatdate() (in module email.utils), 1070
- FormatError, 1099
- FormatError() (in module ctypes), 743
- formatException() (logging.Formatter method), 652
- formatmonth() (calendar.HTMLCalendar method), 207
- formatmonth() (calendar.TextCalendar method), 207
- formatStack() (logging.Formatter method), 652
- Formatter (class in logging), 651
- Formatter (class in string), 98
- formatter (module), 1821
- formatTime() (logging.Formatter method), 651
- formatting
 - bytearray (%), 66
 - bytes (%), 66
- formatting, string (%), 51
- formatwarning() (in module warnings), 1687
- formatyear() (calendar.HTMLCalendar method), 208
- formatyear() (calendar.TextCalendar method), 207
- formatyearpage() (calendar.HTMLCalendar method), 208
- Fortran contiguous, 1901
- forward() (in module turtle), 1362
- found_terminator() (asynchat.async_chat method), 1001
- fpathconf() (in module os), 549
- fqdn (smtpd.SMTPChannel attribute), 1259
- Fraction (class in fractions), 321
- fractions (module), 321
- Frame (class in tracemalloc), 1636
- frame (tkinter.scrolledtext.ScrolledText attribute), 1438
- FrameSummary (class in traceback), 1719
- FrameType (in module types), 250
- freeze() (in module gc), 1725
- freeze_support() (in module multiprocessing), 776
- frexp() (in module math), 285
- from_address() (ctypes._CData method), 745
- from_buffer() (ctypes._CData method), 745
- from_buffer_copy() (ctypes._CData method), 745
- from_bytes() (int class method), 33

- `from_callable()` (`inspect.Signature` class method), 1732
 - `from_decimal()` (`fractions.Fraction` method), 322
 - `from_exception()` (`traceback.TracebackException` class method), 1718
 - `from_file()` (`zipfile.ZipInfo` class method), 479
 - `from_float()` (`decimal.Decimal` method), 301
 - `from_float()` (`fractions.Fraction` method), 322
 - `from_iterable()` (`itertools.chain` class method), 340
 - `from_list()` (`traceback.StackSummary` class method), 1719
 - `from_param()` (`ctypes._CData` method), 745
 - `from_traceback()` (`dis.Bytecode` class method), 1807
 - `frombuf()` (`tarfile.TarInfo` class method), 487
 - `frombytes()` (`array.array` method), 239
 - `fromfd()` (in module `socket`), 934
 - `fromfd()` (`select.epoll` method), 989
 - `fromfd()` (`select.kqueue` method), 990
 - `fromfile()` (`array.array` method), 239
 - `fromhex()` (`bytearray` class method), 55
 - `fromhex()` (`bytes` class method), 54
 - `fromhex()` (`float` class method), 34
 - `fromisoformat()` (`datetime.date` class method), 180
 - `fromisoformat()` (`datetime.datetime` class method), 185
 - `fromisoformat()` (`datetime.time` class method), 193
 - `fromkeys()` (`collections.Counter` method), 214
 - `fromkeys()` (`dict` class method), 78
 - `fromlist()` (`array.array` method), 239
 - `fromordinal()` (`datetime.date` class method), 180
 - `fromordinal()` (`datetime.datetime` class method), 184
 - `fromshare()` (in module `socket`), 934
 - `fromstring()` (`array.array` method), 239
 - `fromstring()` (in module `xml.etree.ElementTree`), 1125
 - `fromstringlist()` (in module `xml.etree.ElementTree`), 1126
 - `fromtarfile()` (`tarfile.TarInfo` class method), 487
 - `fromtimestamp()` (`datetime.date` class method), 179
 - `fromtimestamp()` (`datetime.datetime` class method), 184
 - `fromunicode()` (`array.array` method), 239
 - `fromutc()` (`datetime.timezone` method), 203
 - `fromutc()` (`datetime.tzinfo` method), 197
 - `FrozenImporter` (class in `importlib.machinery`), 1770
 - `FrozenInstanceError`, 1696
 - `frozenset` (built-in class), 75
 - `FrozenSet` (class in `typing`), 1460
 - `fs_is_case_insensitive()` (in module `test.support`), 1596
 - `FS_NONASCII` (in module `test.support`), 1587
 - `fsdecode()` (in module `os`), 543
 - `fsencode()` (in module `os`), 543
 - `fspath()` (in module `os`), 543
 - `fstat()` (in module `os`), 549
 - `fstatvfs()` (in module `os`), 549
 - `f-string`, 1902
 - `fsum()` (in module `math`), 285
 - `fsync()` (in module `os`), 549
 - `FTP`, 1210
 - `ftplib` (standard module), 1228
 - protocol, 1210, 1228
 - `FTP` (class in `ftplib`), 1229
 - `ftp_open()` (`urllib.request.FTPHandler` method), 1204
 - `FTP_TLS` (class in `ftplib`), 1229
 - `FTPHandler` (class in `urllib.request`), 1197
 - `ftplib` (module), 1228
 - `ftruncate()` (in module `os`), 549
 - `Full`, 833
 - `full()` (`asyncio.Queue` method), 871
 - `full()` (`multiprocessing.Queue` method), 774
 - `full()` (`queue.Queue` method), 834
 - `full_url` (`urllib.request.Request` attribute), 1198
 - `fullmatch()` (in module `re`), 115
 - `fullmatch()` (`re.Pattern` method), 119
 - `func` (`functools.partial` attribute), 359
 - `funcattrs` (2to3 fixer), 1581
 - `function`, 1903
 - `Function` (class in `symtable`), 1792
 - `function` annotation, 1903
 - `FunctionTestCase` (class in `unittest`), 1511
 - `FunctionType` (in module `types`), 249
 - `functools` (module), 352
 - `funny_files` (`filecmp.dircmp` attribute), 398
 - `future` (2to3 fixer), 1581
 - `Future` (class in `asyncio`), 896
 - `Future` (class in `concurrent.futures`), 811
 - `FutureWarning`, 94
 - `fwalk()` (in module `os`), 573
- ## G
- `-g, -timing`
 - trace command line option, 1628
 - `G.722`, 1326
 - `gaierror`, 930
 - `gamma()` (in module `math`), 289
 - `gammavariate()` (in module `random`), 326
 - `garbage` (in module `gc`), 1725
 - `garbage` collection, 1903
 - `gather()` (`curses.textpad.Textbox` method), 704
 - `gauss()` (in module `random`), 326
 - `gc` (module), 1723
 - `gc_collect()` (in module `test.support`), 1592
 - `gcd()` (in module `fractions`), 323
 - `gcd()` (in module `math`), 285
 - `ge()` (in module `operator`), 360
 - `gen_uuid()` (in module `msilib`), 1828

- ul style="list-style-type: none; padding-left: 0;">
- generator, [1903](#)
- Generator (class in collections.abc), [229](#)
- Generator (class in email.generator), [1027](#)
- Generator (class in typing), [1461](#)
- generator expression, [1903](#)
- generator iterator, [1903](#)
- GeneratorExit, [88](#)
- GeneratorType (in module types), [249](#)
- Generic (class in typing), [1458](#)
- generic function, [1904](#)
- generic_visit() (ast.NodeVisitor method), [1790](#)
- genops() (in module pickletools), [1820](#)
- get() (asyncio.Queue method), [871](#)
- get() (configparser.ConfigParser method), [515](#)
- get() (contextvars.Context method), [841](#)
- get() (contextvars.ContextVar method), [839](#)
- get() (dict method), [78](#)
- get() (email.message.EmailMessage method), [1017](#)
- get() (email.message.Message method), [1056](#)
- get() (in module webbrowser), [1174](#)
- get() (mailbox.Mailbox method), [1084](#)
- get() (multiprocessing.pool.AsyncResult method), [792](#)
- get() (multiprocessing.Queue method), [774](#)
- get() (multiprocessing.SimpleQueue method), [775](#)
- get() (ossaudiodev.oss_mixer_device method), [1339](#)
- get() (queue.Queue method), [834](#)
- get() (queue.SimpleQueue method), [835](#)
- get() (tkinter.ttk.Combobox method), [1419](#)
- get() (tkinter.ttk.Spinbox method), [1420](#)
- get() (types.MappingProxyType method), [251](#)
- get() (xml.etree.ElementTree.Element method), [1128](#)
- GET_AITER (opcode), [1812](#)
- get_all() (email.message.EmailMessage method), [1017](#)
- get_all() (email.message.Message method), [1056](#)
- get_all() (wsgiref.headers.Headers method), [1186](#)
- get_all_breaks() (bdb.Bdb method), [1604](#)
- get_all_start_methods() (in module multiprocessing), [776](#)
- GET_ANEXT (opcode), [1812](#)
- get_app() (wsgiref.simple_server.WSGIServer method), [1187](#)
- get_archive_formats() (in module shutil), [412](#)
- get_asyncgen_hooks() (in module sys), [1667](#)
- get_attribute() (in module test.support), [1595](#)
- GET_AWAITABLE (opcode), [1812](#)
- get_begidx() (in module readline), [148](#)
- get_blocking() (in module os), [550](#)
- get_body() (email.message.EmailMessage method), [1020](#)
- get_body_encoding() (email.charset.Charset method), [1067](#)
- get_boundary() (email.message.EmailMessage method), [1019](#)
- get_boundary() (email.message.Message method), [1059](#)
- get_bpbynumber() (bdb.Bdb method), [1604](#)
- get_break() (bdb.Bdb method), [1604](#)
- get_breaks() (bdb.Bdb method), [1604](#)
- get_buffer() (asyncio.BufferedProtocol method), [905](#)
- get_buffer() (xdrlib.Packer method), [519](#)
- get_buffer() (xdrlib.Unpacker method), [520](#)
- get_bytes() (mailbox.Mailbox method), [1084](#)
- get_ca_certs() (ssl.SSLContext method), [969](#)
- get_cache_token() (in module abc), [1714](#)
- get_channel_binding() (ssl.SSLSocket method), [966](#)
- get_charset() (email.message.Message method), [1055](#)
- get_charsets() (email.message.EmailMessage method), [1019](#)
- get_charsets() (email.message.Message method), [1059](#)
- get_child_watcher() (asyncio.AbstractEventLoopPolicy method), [913](#)
- get_child_watcher() (in module asyncio), [913](#)
- get_children() (symtable.SymbolTable method), [1792](#)
- get_children() (tkinter.ttk.Treeview method), [1426](#)
- get_ciphers() (ssl.SSLContext method), [969](#)
- get_clock_info() (in module time), [603](#)
- get_close_matches() (in module difflib), [130](#)
- get_code() (importlib.abc.InspectLoader method), [1765](#)
- get_code() (importlib.abc.SourceLoader method), [1768](#)
- get_code() (importlib.machinery.ExtensionFileLoader method), [1773](#)
- get_code() (importlib.machinery.SourcelessFileLoader method), [1772](#)
- get_code() (zipimport.zipimporter method), [1752](#)
- get_completer() (in module readline), [148](#)
- get_completer_delims() (in module readline), [148](#)
- get_completion_type() (in module readline), [148](#)
- get_config_h_filename() (in module sysconfig), [1679](#)
- get_config_var() (in module sysconfig), [1677](#)
- get_config_vars() (in module sysconfig), [1677](#)
- get_content() (email.contentmanager.ContentManager method), [1043](#)
- get_content() (email.message.EmailMessage method), [1021](#)
- get_content() (in module email.contentmanager), [1044](#)
- get_content_charset() (email.message.EmailMessage method), [1019](#)
- get_content_charset() (email.message.Message method), [1059](#)

- method), 1059
- get_content_disposition()
 - (email.message.EmailMessage method), 1019
- get_content_disposition() (email.message.Message method), 1059
- get_content_maintype()
 - (email.message.EmailMessage method), 1018
- get_content_maintype() (email.message.Message method), 1057
- get_content_subtype()
 - (email.message.EmailMessage method), 1018
- get_content_subtype() (email.message.Message method), 1057
- get_content_type() (email.message.EmailMessage method), 1018
- get_content_type() (email.message.Message method), 1057
- get_context() (in module multiprocessing), 776
- get_coroutine_origin_tracking_depth() (in module sys), 1667
- get_coroutine_wrapper() (in module sys), 1667
- get_count() (in module gc), 1724
- get_current_history_length() (in module readline), 147
- get_data() (importlib.abc.FileLoader method), 1767
- get_data() (importlib.abc.ResourceLoader method), 1765
- get_data() (in module pkgutil), 1755
- get_data() (zipimport.zipimporter method), 1752
- get_date() (mailbox.MaildirMessage method), 1092
- get_debug() (asyncio.loop method), 888
- get_debug() (in module gc), 1723
- get_default() (argparse.ArgumentParser method), 640
- get_default_domain() (in module nis), 1861
- get_default_type() (email.message.EmailMessage method), 1018
- get_default_type() (email.message.Message method), 1057
- get_default_verify_paths() (in module ssl), 955
- get_dialect() (in module csv), 494
- get_docstring() (in module ast), 1789
- get_doctest() (doctest.DocTestParser method), 1486
- get_endidx() (in module readline), 148
- get_envron() (wsgiref.simple_server.WSGIRequestHandler method), 1187
- get_errno() (in module ctypes), 743
- get_event_loop()
 - (asyncio.AbstractEventLoopPolicy method), 913
- get_event_loop() (in module asyncio), 875
- get_event_loop_policy() (in module asyncio), 912
- get_examples() (doctest.DocTestParser method), 1487
- get_exception_handler() (asyncio.loop method), 888
- get_exec_path() (in module os), 543
- get_extra_info() (asyncio.BaseTransport method), 900
- get_extra_info() (asyncio.StreamWriter method), 859
- get_field() (string.Formatter method), 98
- get_file() (mailbox.Babyl method), 1090
- get_file() (mailbox.Mailbox method), 1085
- get_file() (mailbox.Maildir method), 1087
- get_file() (mailbox.mbox method), 1088
- get_file() (mailbox.MH method), 1089
- get_file() (mailbox.MMDF method), 1090
- get_file_breaks() (bdb.Bdb method), 1604
- get_filename()
 - (email.message.EmailMessage method), 1018
- get_filename() (email.message.Message method), 1059
- get_filename() (importlib.abc.ExecutionLoader method), 1766
- get_filename() (importlib.abc.FileLoader method), 1767
- get_filename() (importlib.machinery.ExtensionFileLoader method), 1773
- get_filename() (zipimport.zipimporter method), 1752
- get_flags() (mailbox.MaildirMessage method), 1092
- get_flags() (mailbox.mboxMessage method), 1093
- get_flags() (mailbox.MMDFMessage method), 1098
- get_folder() (mailbox.Maildir method), 1086
- get_folder() (mailbox.MH method), 1088
- get_frees() (symtable.Function method), 1792
- get_freeze_count() (in module gc), 1725
- get_from() (mailbox.mboxMessage method), 1093
- get_from() (mailbox.MMDFMessage method), 1097
- get_full_url() (urllib.request.Request method), 1199
- get_globals() (symtable.Function method), 1792
- get_grouped_opcodes() (difflib.SequenceMatcher method), 134
- get_handle_inheritable() (in module os), 556
- get_header() (urllib.request.Request method), 1199
- get_history_item() (in module readline), 147
- get_history_length() (in module readline), 147
- get_id() (symtable.SymbolTable method), 1791
- get_identifier() (in module _thread), 836
- get_ident() (in module threading), 751
- get_identifiers() (symtable.SymbolTable method), 1792
- get_importer() (in module pkgutil), 1754
- get_info() (mailbox.MaildirMessage method), 1092
- get_inheritable() (in module os), 556

- `get_inheritable()` (`socket.socket` method), 939
- `get_instructions()` (in module `dis`), 1809
- `get_interpreter()` (in module `zipapp`), 1654
- `GET_ITER` (opcode), 1810
- `get_key()` (`selectors.BaseSelector` method), 994
- `get_labels()` (`mailbox.Babyl` method), 1090
- `get_labels()` (`mailbox.BabylMessage` method), 1096
- `get_last_error()` (in module `ctypes`), 744
- `get_line_buffer()` (in module `readline`), 146
- `get_lineno()` (`symtable.SymbolTable` method), 1791
- `get_loader()` (in module `pkgutil`), 1754
- `get_locals()` (`symtable.Function` method), 1792
- `get_logger()` (in module `multiprocessing`), 797
- `get_loop()` (`asyncio.Future` method), 897
- `get_loop()` (`asyncio.Server` method), 891
- `get_magic()` (in module `imp`), 1890
- `get_makefile_filename()` (in module `sysconfig`), 1679
- `get_map()` (`selectors.BaseSelector` method), 994
- `get_matching_blocks()` (`difflib.SequenceMatcher` method), 133
- `get_message()` (`mailbox.Mailbox` method), 1084
- `get_method()` (`urllib.request.Request` method), 1198
- `get_methods()` (`symtable.Class` method), 1792
- `get_mixed_type_key()` (in module `ipaddress`), 1319
- `get_name()` (`symtable.Symbol` method), 1792
- `get_name()` (`symtable.SymbolTable` method), 1791
- `get_namespace()` (`symtable.Symbol` method), 1793
- `get_namespaces()` (`symtable.Symbol` method), 1793
- `get_nonstandard_attr()` (`http.cookiejar.Cookie` method), 1291
- `get_nowait()` (`asyncio.Queue` method), 872
- `get_nowait()` (`multiprocessing.Queue` method), 774
- `get_nowait()` (`queue.Queue` method), 834
- `get_nowait()` (`queue.SimpleQueue` method), 836
- `get_object_traceback()` (in module `tracemalloc`), 1634
- `get_objects()` (in module `gc`), 1724
- `get_opcodes()` (`difflib.SequenceMatcher` method), 134
- `get_option()` (`optparse.OptionParser` method), 1881
- `get_option_group()` (`optparse.OptionParser` method), 1872
- `get_original_stdout()` (in module `test.support`), 1591
- `get_osfhandle()` (in module `msvcrt`), 1833
- `get_output_charset()` (`email.charset.Charset` method), 1067
- `get_param()` (`email.message.Message` method), 1057
- `get_parameters()` (`symtable.Function` method), 1792
- `get_params()` (`email.message.Message` method), 1057
- `get_path()` (in module `sysconfig`), 1678
- `get_path_names()` (in module `sysconfig`), 1678
- `get_paths()` (in module `sysconfig`), 1678
- `get_payload()` (`email.message.Message` method), 1054
- `get_pid()` (`asyncio.SubprocessTransport` method), 902
- `get_pipe_transport()` (`asyncio.SubprocessTransport` method), 902
- `get_platform()` (in module `sysconfig`), 1678
- `get_poly()` (in module `turtle`), 1377
- `get_position()` (`xdrlib.Unpacker` method), 520
- `get_protocol()` (`asyncio.BaseTransport` method), 901
- `get_python_version()` (in module `sysconfig`), 1678
- `get_recsrc()` (`ossaudiodev.oss_mixer_device` method), 1339
- `get_referents()` (in module `gc`), 1724
- `get_referrers()` (in module `gc`), 1724
- `get_request()` (`socketserver.BaseServer` method), 1269
- `get_returncode()` (`asyncio.SubprocessTransport` method), 902
- `get_running_loop()` (in module `asyncio`), 875
- `get_scheme()` (`wsgiref.handlers.BaseHandler` method), 1190
- `get_scheme_names()` (in module `sysconfig`), 1678
- `get_sequences()` (`mailbox.MH` method), 1089
- `get_sequences()` (`mailbox.MHMessage` method), 1095
- `get_server()` (`multiprocessing.managers.BaseManager` method), 784
- `get_server_certificate()` (in module `ssl`), 955
- `get_shapepoly()` (in module `turtle`), 1376
- `get_socket()` (`telnetlib.Telnet` method), 1261
- `get_source()` (`importlib.abc.InspectLoader` method), 1766
- `get_source()` (`importlib.abc.SourceLoader` method), 1768
- `get_source()` (`importlib.machinery.ExtensionFileLoader` method), 1773
- `get_source()` (`importlib.machinery.SourcelessFileLoader` method), 1772
- `get_source()` (`zipimport.zipimporter` method), 1752
- `get_stack()` (`asyncio.Task` method), 855
- `get_stack()` (`bdb.Bdb` method), 1604
- `get_start_method()` (in module `multiprocessing`), 776
- `get_starttag_text()` (`html.parser.HTMLParser` method), 1113
- `get_stats()` (in module `gc`), 1724
- `get_stderr()` (`wsgiref.handlers.BaseHandler` method), 1190
- `get_stderr()` (`wsgiref.simple_server.WSGIRequestHandler` method), 1187
- `get_stdin()` (`wsgiref.handlers.BaseHandler` method), 1190

- `get_string()` (mailbox.Mailbox method), 1085
- `get_subdir()` (mailbox.MaildirMessage method), 1092
- `get_suffices()` (in module `imp`), 1890
- `get_symbols()` (symtable.SymbolTable method), 1792
- `get_tag()` (in module `imp`), 1893
- `get_task_factory()` (asyncio.loop method), 879
- `get_terminal_size()` (in module `os`), 556
- `get_terminal_size()` (in module `shutil`), 413
- `get_terminator()` (asynchat.async_chat method), 1001
- `get_threshold()` (in module `gc`), 1724
- `get_token()` (shlex.shlex method), 1398
- `get_traceback_limit()` (in module `tracemalloc`), 1634
- `get_traced_memory()` (in module `tracemalloc`), 1635
- `get_tracemalloc_memory()` (in module `tracemalloc`), 1635
- `get_type()` (symtable.SymbolTable method), 1791
- `get_type_hints()` (in module `typing`), 1464
- `get_unixfrom()` (email.message.EmailMessage method), 1016
- `get_unixfrom()` (email.message.Message method), 1054
- `get_unpack_formats()` (in module `shutil`), 413
- `get_usage()` (optparse.OptionParser method), 1883
- `get_value()` (string.Formatter method), 98
- `get_version()` (optparse.OptionParser method), 1872
- `get_visible()` (mailbox.BabylMessage method), 1096
- `get_wch()` (curses.window method), 694
- `get_write_buffer_limits()` (asyncio.WriteTransport method), 901
- `get_write_buffer_size()` (asyncio.WriteTransport method), 901
- `GET_YIELD_FROM_ITER` (opcode), 1810
- `getacl()` (imaplib.IMAP4 method), 1239
- `getaddresses()` (in module `email.utils`), 1070
- `getaddrinfo()` (asyncio.loop method), 885
- `getaddrinfo()` (in module `socket`), 934
- `getallocatedblocks()` (in module `sys`), 1664
- `getandroidapilevel()` (in module `sys`), 1665
- `getannotation()` (imaplib.IMAP4 method), 1239
- `getargspec()` (in module `inspect`), 1735
- `getargvalues()` (in module `inspect`), 1736
- `getatime()` (in module `os.path`), 386
- `getattr()` (built-in function), 12
- `getattr_static()` (in module `inspect`), 1739
- `getAttribute()` (xml.dom.Element method), 1140
- `getAttributeNode()` (xml.dom.Element method), 1140
- `getAttributeNodeNS()` (xml.dom.Element method), 1140
- `getAttributeNS()` (xml.dom.Element method), 1140
- `GetBase()` (xml.parsers.expat.xmlparser method), 1164
- `getbegyx()` (curses.window method), 694
- `getbkgd()` (curses.window method), 694
- `getblocking()` (socket.socket method), 940
- `getboolean()` (configparser.ConfigParser method), 515
- `getbuffer()` (io.BytesIO method), 595
- `getByteStream()` (xml.sax.xmlreader.InputSource method), 1161
- `getcallargs()` (in module `inspect`), 1737
- `getcanvas()` (in module `turtle`), 1384
- `getcapabilities()` (nntplib.NNTP method), 1245
- `getcaps()` (in module `mailcap`), 1082
- `getch()` (curses.window method), 694
- `getch()` (in module `msvcrt`), 1833
- `getCharacterStream()` (xml.sax.xmlreader.InputSource method), 1162
- `getche()` (in module `msvcrt`), 1833
- `getcheckinterval()` (in module `sys`), 1665
- `getChild()` (logging.Logger method), 647
- `getchildren()` (xml.etree.ElementTree.Element method), 1129
- `getclasstree()` (in module `inspect`), 1735
- `getclosurevars()` (in module `inspect`), 1737
- `GetColumnInfo()` (msilib.View method), 1828
- `getColumnNumber()` (xml.sax.xmlreader.Locator method), 1161
- `getcomments()` (in module `inspect`), 1730
- `getcompname()` (aifc.aifc method), 1325
- `getcompname()` (sunau.AU_read method), 1328
- `getcompname()` (wave.Wave_read method), 1330
- `getcomptype()` (aifc.aifc method), 1325
- `getcomptype()` (sunau.AU_read method), 1328
- `getcomptype()` (wave.Wave_read method), 1330
- `getContentHandler()` (xml.sax.xmlreader.XMLReader method), 1160
- `getcontext()` (in module `decimal`), 305
- `getcoroutinelocals()` (in module `inspect`), 1741
- `getcoroutinestate()` (in module `inspect`), 1740
- `getctime()` (in module `os.path`), 386
- `getcwd()` (in module `os`), 560
- `getcwdb()` (in module `os`), 560
- `getcwdu` (2to3 fixer), 1581
- `getdecoder()` (in module `codecs`), 157
- `getdefaultencoding()` (in module `sys`), 1665
- `getdefaultlocale()` (in module `locale`), 1353
- `getdefaulttimeout()` (in module `socket`), 938
- `getdlopenflags()` (in module `sys`), 1665
- `getdoc()` (in module `inspect`), 1730
- `getDOMImplementation()` (in module `xml.dom`), 1135
- `getDTDHandler()` (xml.sax.xmlreader.XMLReader method), 1160

`getEffectiveLevel()` (`logging.Logger` method), 647
`getegid()` (in module `os`), 543
`getElementsByTagName()` (`xml.dom.Document` method), 1139
`getElementsByTagName()` (`xml.dom.Element` method), 1140
`getElementsByTagNameNS()` (`xml.dom.Document` method), 1139
`getElementsByTagNameNS()` (`xml.dom.Element` method), 1140
`getencoder()` (in module `codecs`), 157
`getEncoding()` (`xml.sax.xmlreader.InputSource` method), 1161
`getEntityResolver()` (`xml.sax.xmlreader.XMLReader` method), 1160
`getenv()` (in module `os`), 543
`getenvb()` (in module `os`), 543
`getErrorHandler()` (`xml.sax.xmlreader.XMLReader` method), 1160
`geteuid()` (in module `os`), 544
`getEvent()` (`xml.dom.pulldom.DOMEventStream` method), 1150
`getEventCategory()` (`logging.handlers.NTEventLogHandler` method), 681
`getEventType()` (`logging.handlers.NTEventLogHandler` method), 681
`getException()` (`xml.sax.SAXException` method), 1152
`getFeature()` (`xml.sax.xmlreader.XMLReader` method), 1160
`GetFieldCount()` (`msilib.Record` method), 1829
`getfile()` (in module `inspect`), 1730
`getfilesystemencodeerrors()` (in module `sys`), 1665
`getfilesystemencoding()` (in module `sys`), 1665
`getfirst()` (`cgi.FieldStorage` method), 1178
`getfloat()` (`configparser.ConfigParser` method), 515
`getfmts()` (`ossaudiodev.oss_audio_device` method), 1337
`getfqdn()` (in module `socket`), 935
`getframeinfo()` (in module `inspect`), 1738
`getframerate()` (`aifc.aifc` method), 1325
`getframerate()` (`sunau.AU_read` method), 1328
`getframerate()` (`wave.Wave_read` method), 1330
`getfullargspec()` (in module `inspect`), 1736
`getgeneratorlocals()` (in module `inspect`), 1741
`getgeneratorstate()` (in module `inspect`), 1740
`getgid()` (in module `os`), 544
`getgrall()` (in module `grp`), 1848
`getgrgid()` (in module `grp`), 1848
`getgrnam()` (in module `grp`), 1848
`getgrouplist()` (in module `os`), 544
`getgroups()` (in module `os`), 544
`getheader()` (`http.client.HTTPResponse` method), 1226
`getheaders()` (`http.client.HTTPResponse` method), 1226
`gethostbyaddr()` (in module `socket`), 547, 935
`gethostbyname()` (in module `socket`), 935
`gethostbyname_ex()` (in module `socket`), 935
`gethostname()` (in module `socket`), 547, 935
`getincrementaldecoder()` (in module `codecs`), 157
`getincrementalencoder()` (in module `codecs`), 157
`getinfo()` (`zipfile.ZipFile` method), 476
`getinnerframes()` (in module `inspect`), 1739
`GetInputContext()` (`xml.parsers.expat.xmlparser` method), 1164
`getint()` (`configparser.ConfigParser` method), 515
`GetInteger()` (`msilib.Record` method), 1829
`getitem()` (in module `operator`), 362
`getiterator()` (`xml.etree.ElementTree.Element` method), 1129
`getiterator()` (`xml.etree.ElementTree.ElementTree` method), 1130
`getitimer()` (in module `signal`), 1006
`getkey()` (`curses.window` method), 694
`GetLastError()` (in module `ctypes`), 743
`getLength()` (`xml.sax.xmlreader.Attributes` method), 1162
`getLevelName()` (in module `logging`), 658
`getline()` (in module `linecache`), 405
`getLineNumber()` (`xml.sax.xmlreader.Locator` method), 1161
`getlist()` (`cgi.FieldStorage` method), 1179
`getloadavg()` (in module `os`), 586
`getlocale()` (in module `locale`), 1353
`getLogger()` (in module `logging`), 656
`getLoggerClass()` (in module `logging`), 656
`getlogin()` (in module `os`), 544
`getLogRecordFactory()` (in module `logging`), 656
`getmark()` (`aifc.aifc` method), 1325
`getmark()` (`sunau.AU_read` method), 1328
`getmark()` (`wave.Wave_read` method), 1330
`getmarkers()` (`aifc.aifc` method), 1325
`getmarkers()` (`sunau.AU_read` method), 1328
`getmarkers()` (`wave.Wave_read` method), 1330
`getmaxyx()` (`curses.window` method), 695
`getmember()` (`tarfile.TarFile` method), 485
`getmembers()` (in module `inspect`), 1728
`getmembers()` (`tarfile.TarFile` method), 485
`getMessage()` (`logging.LogRecord` method), 653
`getMessage()` (`xml.sax.SAXException` method), 1152
`getMessageID()` (`logging.handlers.NTEventLogHandler` method), 681
`getmodule()` (in module `inspect`), 1730
`getmodulename()` (in module `inspect`), 1728
`getmouse()` (in module `curses`), 687

- getmro() (in module inspect), 1737
- getmtime() (in module os.path), 386
- getname() (chunk.Chunk method), 1332
- getName() (threading.Thread method), 754
- getNameByQName() (xml.sax.xmlreader.AttributesNS method), 1162
- getnameinfo() (asyncio.loop method), 885
- getnameinfo() (in module socket), 936
- getnames() (tarfile.TarFile method), 485
- getNames() (xml.sax.xmlreader.Attributes method), 1162
- getnchannels() (aifc.aifc method), 1325
- getnchannels() (sunau.AU_read method), 1328
- getnchannels() (wave.Wave_read method), 1330
- getnframes() (aifc.aifc method), 1325
- getnframes() (sunau.AU_read method), 1328
- getnframes() (wave.Wave_read method), 1330
- getnode, 1264
- getnode() (in module uuid), 1264
- getopt (module), 643
- getopt() (in module getopt), 643
- GetoptError, 643
- getouterframes() (in module inspect), 1738
- getoutput() (in module subprocess), 830
- getpagesize() (in module resource), 1860
- getparams() (aifc.aifc method), 1325
- getparams() (sunau.AU_read method), 1328
- getparams() (wave.Wave_read method), 1330
- getparyx() (curses.window method), 695
- getpass (module), 684
- getpass() (in module getpass), 684
- GetPassWarning, 685
- getpeercert() (ssl.SSLSocket method), 964
- getpeername() (socket.socket method), 940
- getpen() (in module turtle), 1378
- getpgid() (in module os), 544
- getpgrp() (in module os), 544
- getpid() (in module os), 544
- getpos() (html.parser.HTMLParser method), 1113
- getppid() (in module os), 544
- getpreferredencoding() (in module locale), 1353
- getpriority() (in module os), 545
- getprofile() (in module sys), 1666
- GetProperty() (msilib.SummaryInformation method), 1829
- getProperty() (xml.sax.xmlreader.XMLReader method), 1160
- GetPropertyCount() (msilib.SummaryInformation method), 1829
- getprotobyname() (in module socket), 936
- getproxies() (in module urllib.request), 1194
- getPublicId() (xml.sax.xmlreader.InputSource method), 1161
- getPublicId() (xml.sax.xmlreader.Locator method), 1161
- getpwall() (in module pwd), 1847
- getpwnam() (in module pwd), 1847
- getpwuid() (in module pwd), 1846
- getQNameByName() (xml.sax.xmlreader.AttributesNS method), 1162
- getQNames() (xml.sax.xmlreader.AttributesNS method), 1162
- getquota() (imaplib.IMAP4 method), 1239
- getquotaroot() (imaplib.IMAP4 method), 1239
- getrandbits() (in module random), 324
- getrandom() (in module os), 587
- getreader() (in module codecs), 158
- getrecursionlimit() (in module sys), 1665
- getrefcount() (in module sys), 1665
- getresgid() (in module os), 545
- getresponse() (http.client.HTTPConnection method), 1225
- getresuid() (in module os), 545
- getrlimit() (in module resource), 1857
- getroot() (xml.etree.ElementTree.ElementTree method), 1130
- getrusage() (in module resource), 1859
- getsample() (in module audioop), 1322
- getsampwidth() (aifc.aifc method), 1325
- getsampwidth() (sunau.AU_read method), 1328
- getsampwidth() (wave.Wave_read method), 1330
- getscreen() (in module turtle), 1378
- getservbyname() (in module socket), 936
- getservbyport() (in module socket), 936
- GetSetDescriptorType (in module types), 251
- getshapes() (in module turtle), 1384
- getsid() (in module os), 547
- getsignal() (in module signal), 1004
- getsitpackages() (in module site), 1744
- getsize() (chunk.Chunk method), 1332
- getsize() (in module os.path), 387
- getsizeof() (in module sys), 1665
- getsockname() (socket.socket method), 940
- getsockopt() (socket.socket method), 940
- getsource() (in module inspect), 1731
- getsourcefile() (in module inspect), 1731
- getsourcelines() (in module inspect), 1731
- getspall() (in module spwd), 1847
- getspnam() (in module spwd), 1847
- getstate() (codecs.IncrementalDecoder method), 163
- getstate() (codecs.IncrementalEncoder method), 162
- getstate() (in module random), 324
- getstatusoutput() (in module subprocess), 830
- getstr() (curses.window method), 695
- GetString() (msilib.Record method), 1829
- getSubject() (logging.handlers.SMTPHandler method), 681

- GetSummaryInformation() (msilib.Database method), 1828
 - getswitchinterval() (in module sys), 1666
 - getSystemId() (xml.sax.xmlreader.InputSource method), 1161
 - getSystemId() (xml.sax.xmlreader.Locator method), 1161
 - getsyx() (in module curses), 687
 - gettarinfo() (tarfile.TarFile method), 486
 - gettempdir() (in module tempfile), 401
 - gettempdirb() (in module tempfile), 401
 - gettempprefix() (in module tempfile), 401
 - gettempprefixb() (in module tempfile), 401
 - getTestCaseNames() (unittest.TestLoader method), 1513
 - gettext (module), 1341
 - gettext() (gettext.GNUTranslations method), 1345
 - gettext() (gettext.NullTranslations method), 1344
 - gettext() (in module gettext), 1342
 - gettext() (in module locale), 1356
 - gettimeout() (socket.socket method), 940
 - gettrace() (in module sys), 1666
 - getturtle() (in module turtle), 1378
 - getType() (xml.sax.xmlreader.Attributes method), 1162
 - getuid() (in module os), 545
 - geturl() (urllib.parse.urlib.parse.SplitResult method), 1215
 - getuser() (in module getpass), 685
 - getuserbase() (in module site), 1744
 - getusersitepackages() (in module site), 1744
 - getvalue() (io.BytesIO method), 595
 - getvalue() (io.StringIO method), 599
 - getValue() (xml.sax.xmlreader.Attributes method), 1162
 - getValueByQName() (xml.sax.xmlreader.AttributesNS method), 1162
 - getwch() (in module msvcrt), 1833
 - getwche() (in module msvcrt), 1833
 - getweakrefcount() (in module weakref), 242
 - getweakrefs() (in module weakref), 242
 - getwelcome() (ftplib.FTP method), 1231
 - getwelcome() (nntplib.NNTP method), 1245
 - getwelcome() (poplib.POP3 method), 1235
 - getwin() (in module curses), 687
 - getwindowsversion() (in module sys), 1666
 - getwriter() (in module codecs), 158
 - getxattr() (in module os), 574
 - getyx() (curses.window method), 695
 - gid (tarfile.TarInfo attribute), 487
 - GIL, 1904
 - glob
 - module, 404
 - glob (module), 403
 - glob() (in module glob), 403
 - glob() (msilib.Directory method), 1831
 - glob() (pathlib.Path method), 379
 - global interpreter lock, 1904
 - globals() (built-in function), 12
 - globs (doctest.DocTest attribute), 1485
 - gmtime() (in module time), 603
 - gname (tarfile.TarInfo attribute), 488
 - GNOME, 1346
 - GNU_FORMAT (in module tarfile), 484
 - gnu_getopt() (in module getopt), 643
 - GNUTranslations (class in gettext), 1345
 - got (doctest.DocTestFailure attribute), 1491
 - goto() (in module turtle), 1363
 - Graphical User Interface, 1403
 - GREATER (in module token), 1794
 - GREATEREQUAL (in module token), 1794
 - Greenwich Mean Time, 601
 - GRND_NONBLOCK (in module os), 588
 - GRND_RANDOM (in module os), 588
 - Group (class in email.headerregistry), 1042
 - group() (nntplib.NNTP method), 1247
 - group() (pathlib.Path method), 379
 - group() (re.Match method), 120
 - groupby() (in module itertools), 343
 - groupdict() (re.Match method), 121
 - groupindex (re.Pattern attribute), 119
 - groups (email.headerregistry.AddressHeader attribute), 1039
 - groups (re.Pattern attribute), 119
 - groups() (re.Match method), 121
 - grp (module), 1848
 - gt() (in module operator), 360
 - guess_all_extensions() (in module mimetypes), 1101
 - guess_all_extensions() (mimetypes.MimeTypes method), 1103
 - guess_extension() (in module mimetypes), 1101
 - guess_extension() (mimetypes.MimeTypes method), 1103
 - guess_scheme() (in module wsgiref.util), 1183
 - guess_type() (in module mimetypes), 1101
 - guess_type() (mimetypes.MimeTypes method), 1103
 - GUI, 1403
 - gzip (module), 463
 - GzipFile (class in gzip), 463
- ## H
- h, -help
 - json.tool command line option, 1081
 - timeit command line option, 1625
 - tokenize command line option, 1797
 - zipapp command line option, 1653
 - halfdelay() (in module curses), 688
 - Handle (class in asyncio), 890

- `handle()` (`http.server.BaseHTTPRequestHandler` method), 1276
- `handle()` (`logging.Handler` method), 650
- `handle()` (`logging.handlers.QueueListener` method), 684
- `handle()` (`logging.Logger` method), 649
- `handle()` (`logging.NullHandler` method), 673
- `handle()` (`socketserver.BaseRequestHandler` method), 1270
- `handle()` (`wsgiref.simple_server.WSGIRequestHandler` method), 1187
- `handle_accept()` (`asyncore.dispatcher` method), 997
- `handle_accepted()` (`asyncore.dispatcher` method), 997
- `handle_charref()` (`html.parser.HTMLParser` method), 1113
- `handle_close()` (`asyncore.dispatcher` method), 997
- `handle_comment()` (`html.parser.HTMLParser` method), 1113
- `handle_connect()` (`asyncore.dispatcher` method), 997
- `handle_data()` (`html.parser.HTMLParser` method), 1113
- `handle_decl()` (`html.parser.HTMLParser` method), 1114
- `handle_defect()` (`email.policy.Policy` method), 1032
- `handle_endtag()` (`html.parser.HTMLParser` method), 1113
- `handle_entityref()` (`html.parser.HTMLParser` method), 1113
- `handle_error()` (`asyncore.dispatcher` method), 997
- `handle_error()` (`socketserver.BaseServer` method), 1269
- `handle_expect_100()` (`http.server.BaseHTTPRequestHandler` method), 1276
- `handle_expt()` (`asyncore.dispatcher` method), 997
- `handle_one_request()` (`http.server.BaseHTTPRequestHandler` method), 1276
- `handle_pi()` (`html.parser.HTMLParser` method), 1114
- `handle_read()` (`asyncore.dispatcher` method), 997
- `handle_request()` (`socketserver.BaseServer` method), 1268
- `handle_request()` (`xmlrpc.server.CGIXMLRPCRequestHandler` method), 1305
- `handle_startendtag()` (`html.parser.HTMLParser` method), 1113
- `handle_starttag()` (`html.parser.HTMLParser` method), 1113
- `handle_timeout()` (`socketserver.BaseServer` method), 1270
- `handle_write()` (`asyncore.dispatcher` method), 997
- `handleError()` (`logging.Handler` method), 650
- `handleError()` (`logging.handlers.SocketHandler` method), 677
- `Handler` (class in `logging`), 649
- `handler()` (in module `cgitb`), 1183
- `harmonic_mean()` (in module `statistics`), 331
- `HAS_ALPN` (in module `ssl`), 960
- `has_children()` (`symtable.SymbolTable` method), 1791
- `has_colors()` (in module `curses`), 687
- `HAS_ECDH` (in module `ssl`), 961
- `has_exec()` (`symtable.SymbolTable` method), 1792
- `has_extn()` (`smtplib.SMTP` method), 1253
- `has_header()` (`csv.Sniffer` method), 496
- `has_header()` (`urllib.request.Request` method), 1199
- `has_ic()` (in module `curses`), 687
- `has_il()` (in module `curses`), 687
- `has_ipv6` (in module `socket`), 932
- `has_key` (2to3 fixer), 1581
- `has_key()` (in module `curses`), 688
- `has_location` (`importlib.machinery.ModuleSpec` attribute), 1774
- `HAS_NEVER_CHECK_COMMON_NAME` (in module `ssl`), 960
- `has_nonstandard_attr()` (`http.cookiejar.Cookie` method), 1291
- `HAS_NPN` (in module `ssl`), 961
- `has_option()` (`configparser.ConfigParser` method), 514
- `has_option()` (`optparse.OptionParser` method), 1881
- `has_section()` (`configparser.ConfigParser` method), 514
- `HAS_SNI` (in module `ssl`), 961
- `HAS_SSLv2` (in module `ssl`), 961
- `HAS_SSLv3` (in module `ssl`), 961
- `has_ticket` (`ssl.SSLSession` attribute), 983
- `HAS_TLSv1` (in module `ssl`), 961
- `has_tls1_1` (in module `ssl`), 961
- `HAS_TLSv1_1` (in module `ssl`), 961
- `HAS_TLSv1_2` (in module `ssl`), 961
- `HAS_TLSv1_3` (in module `ssl`), 961
- `hasattr()` (built-in function), 12
- `hasAttribute()` (`xml.dom.Element` method), 1140
- `hasAttributeNS()` (`xml.dom.Element` method), 1140
- `hasAttributes()` (`xml.dom.Node` method), 1137
- `hasChildNodes()` (`xml.dom.Node` method), 1137
- `hascompare` (in module `dis`), 1819
- `hasconst` (in module `dis`), 1819
- `hasFeature()` (`xml.dom.DOMImplementation` method), 1136
- `hasfree` (in module `dis`), 1819
- `hash`
 - built-in function, 39
- `hash()` (built-in function), 13
- `hash_info` (in module `sys`), 1667
- `hashable`, 1904
- `Hashable` (class in `collections.abc`), 228

- Hashable (class in typing), 1459
- hasHandlers() (logging.Logger method), 649
- hash-based pyc, 1904
- hash.block_size (in module hashlib), 527
- hash.digest_size (in module hashlib), 526
- hashlib (module), 525
- hasjabs (in module dis), 1819
- hasjrel (in module dis), 1819
- haslocal (in module dis), 1819
- hasname (in module dis), 1819
- HAVE_ARGUMENT (opcode), 1818
- HAVE_DOCSTRINGS (in module test.support), 1588
- HAVE_THREADS (in module decimal), 311
- HCI_DATA_DIR (in module socket), 933
- HCI_FILTER (in module socket), 933
- HCI_TIME_STAMP (in module socket), 933
- head() (nntplib.NNTP method), 1248
- Header (class in email.header), 1064
- header_encode() (email.charset.Charset method), 1067
- header_encode_lines() (email.charset.Charset method), 1067
- header_encoding (email.charset.Charset attribute), 1066
- header_factory (email.policy.EmailPolicy attribute), 1034
- header_fetch_parse() (email.policy.Compat32 method), 1036
- header_fetch_parse() (email.policy.EmailPolicy method), 1034
- header_fetch_parse() (email.policy.Policy method), 1033
- header_items() (urllib.request.Request method), 1199
- header_max_count() (email.policy.EmailPolicy method), 1034
- header_max_count() (email.policy.Policy method), 1032
- header_offset (zipfile.ZipInfo attribute), 480
- header_source_parse() (email.policy.Compat32 method), 1035
- header_source_parse() (email.policy.EmailPolicy method), 1034
- header_source_parse() (email.policy.Policy method), 1032
- header_store_parse() (email.policy.Compat32 method), 1036
- header_store_parse() (email.policy.EmailPolicy method), 1034
- header_store_parse() (email.policy.Policy method), 1032
- HeaderError, 483
- HeaderParseError, 1036
- HeaderParser (class in email.parser), 1025
- HeaderRegistry (class in email.headerregistry), 1041
- headers
 - MIME, 1101, 1175
- Headers (class in wsgiref.headers), 1185
- headers (http.server.BaseHTTPRequestHandler attribute), 1276
- headers (urllib.error.HTTPError attribute), 1218
- headers (xmlrpc.client.ProtocolError attribute), 1298
- heading() (in module turtle), 1367
- heading() (tkinter.ttk.Treeview method), 1427
- heapify() (in module heapq), 232
- heapmin() (in module msvcrt), 1834
- heappop() (in module heapq), 232
- heappush() (in module heapq), 231
- heappushpop() (in module heapq), 232
- heapq (module), 231
- heapreplace() (in module heapq), 232
- helo() (smtplib.SMTP method), 1252
- help
 - online, 1467
- help
 - trace command line option, 1627
- help (optparse.Option attribute), 1877
- help (pdb command), 1610
- help() (built-in function), 13
- help() (nntplib.NNTP method), 1248
- herror, 930
- hex (uuid.UUID attribute), 1264
- hex() (built-in function), 13
- hex() (bytearray method), 55
- hex() (bytes method), 54
- hex() (float method), 34
- hex() (memoryview method), 70
- hexadecimal
 - literals, 31
- hexbin() (in module binhex), 1106
- hexdigest() (hashlib.hash method), 527
- hexdigest() (hashlib.shake method), 527
- hexdigest() (hmac.HMAC method), 536
- hexdigits (in module string), 97
- hexlify() (in module binascii), 1108
- hexversion (in module sys), 1668
- hidden() (curses.panel.Panel method), 707
- hide() (curses.panel.Panel method), 707
- hide() (tkinter.ttk.Notebook method), 1422
- hide_cookie2 (http.cookiejar.CookiePolicy attribute), 1288
- hideturtle() (in module turtle), 1373
- HierarchyRequestErr, 1142
- HIGH_PRIORITY_CLASS (in module subprocess), 824
- HIGHEST_PROTOCOL (in module pickle), 417
- HKEY_CLASSES_ROOT (in module winreg), 1839

- HKEY_CURRENT_CONFIG (in module winreg), 1839
 HKEY_CURRENT_USER (in module winreg), 1839
 HKEY_DYN_DATA (in module winreg), 1839
 HKEY_LOCAL_MACHINE (in module winreg), 1839
 HKEY_PERFORMANCE_DATA (in module winreg), 1839
 HKEY_USERS (in module winreg), 1839
 hline() (curses.window method), 695
 HList (class in tkinter.tix), 1436
 hls_to_rgb() (in module colorsys), 1333
 hmac (module), 535
 HOME, 386
 home() (in module turtle), 1364
 home() (pathlib.Path class method), 378
 HOMEDRIVE, 386
 HOMEPATH, 386
 hook_compressed() (in module fileinput), 391
 hook_encoded() (in module fileinput), 391
 host (urllib.request.Request attribute), 1198
 hostmask (ipaddress.IPv4Network attribute), 1312
 hostmask (ipaddress.IPv6Network attribute), 1315
 hostname_checks_common_name (ssl.SSLContext attribute), 974
 hosts (netrc.netrc attribute), 518
 hosts() (ipaddress.IPv4Network method), 1313
 hosts() (ipaddress.IPv6Network method), 1315
 hour (datetime.datetime attribute), 185
 hour (datetime.time attribute), 192
 HRESULT (class in ctypes), 748
 hStdError (subprocess.STARTUPINFO attribute), 823
 hStdInput (subprocess.STARTUPINFO attribute), 823
 hStdOutput (subprocess.STARTUPINFO attribute), 823
 hsv_to_rgb() (in module colorsys), 1333
 ht() (in module turtle), 1373
 HTML, 1111, 1210
 html (module), 1111
 html() (in module cgitb), 1183
 html5 (in module html.entities), 1116
 HTMLCalendar (class in calendar), 207
 HtmlDiff (class in difflib), 128
 html.entities (module), 1116
 HTMLParser (class in html.parser), 1111
 html.parser (module), 1111
 htonl() (in module socket), 936
 htons() (in module socket), 936
 HTTP
 http (standard module), 1220
 http.client (standard module), 1222
 protocol, 1175, 1210, 1220, 1222, 1274
 HTTP (in module email.policy), 1035
 http (module), 1220
 http_error_301() (url-
 lib.request.HTTPRedirectHandler
 method), 1202
 http_error_302() (url-
 lib.request.HTTPRedirectHandler
 method), 1202
 http_error_303() (url-
 lib.request.HTTPRedirectHandler
 method), 1202
 http_error_307() (url-
 lib.request.HTTPRedirectHandler
 method), 1202
 http_error_401() (url-
 lib.request.HTTPBasicAuthHandler
 method), 1203
 http_error_401() (url-
 lib.request.HTTPDigestAuthHandler
 method), 1203
 http_error_407() (url-
 lib.request.ProxyBasicAuthHandler
 method), 1203
 http_error_407() (url-
 lib.request.ProxyDigestAuthHandler
 method), 1204
 http_error_auth_reqd() (url-
 lib.request.AbstractBasicAuthHandler
 method), 1203
 http_error_auth_reqd() (url-
 lib.request.AbstractDigestAuthHandler
 method), 1203
 http_error_default() (urllib.request.BaseHandler
 method), 1201
 http_error_nnn() (urllib.request.BaseHandler
 method), 1201
 http_open() (urllib.request.HTTPHandler method),
 1204
 HTTP_PORT (in module http.client), 1224
 http_proxy, 1194, 1206
 http_response() (url-
 lib.request.HTTPErrorProcessor method),
 1205
 http_version (wsgiref.handlers.BaseHandler at-
 tribute), 1192
 HTTPBasicAuthHandler (class in urllib.request),
 1197
 http.client (module), 1222
 HTTPConnection (class in http.client), 1222
 http.cookiejar (module), 1284
 HTTPCookieProcessor (class in urllib.request), 1196
 http.cookies (module), 1280
 httpd, 1274

- HTTPDefaultErrorHandler (class in urllib.request), 1196
- HTTPDigestAuthHandler (class in urllib.request), 1197
- HTTPError, 1218
- HTTPErrorProcessor (class in urllib.request), 1198
- HTTPException, 1223
- HTTPHandler (class in logging.handlers), 682
- HTTPHandler (class in urllib.request), 1197
- HTTPPasswordMgr (class in urllib.request), 1196
- HTTPPasswordMgrWithDefaultRealm (class in urllib.request), 1196
- HTTPPasswordMgrWithPriorAuth (class in urllib.request), 1196
- HTTPRedirectHandler (class in urllib.request), 1196
- HTTPResponse (class in http.client), 1223
- https_open() (urllib.request.HTTPSHandler method), 1204
- HTTPS_PORT (in module http.client), 1224
- https_response() (urllib.request.HTTPErrorProcessor method), 1205
- HTTPSConnection (class in http.client), 1222
- HTTPServer (class in http.server), 1275
- http.server (module), 1274
- HTTPSHandler (class in urllib.request), 1197
- HTTPStatus (class in http), 1220
- hypot() (in module math), 288
- I**
- I (in module re), 114
- i list
 - compileall command line option, 1803
- I/O control
 - buffering, 18, 940
 - POSIX, 1850
 - tty, 1850
 - UNIX, 1853
- iadd() (in module operator), 365
- iand() (in module operator), 365
- iconcat() (in module operator), 365
- id (ssl.SSLSession attribute), 982
- id() (built-in function), 13
- id() (unittest.TestCase method), 1510
- idcok() (curses.window method), 695
- ident (select.kevent attribute), 990
- ident (threading.Thread attribute), 754
- identchars (cmd.Cmd attribute), 1394
- identify() (tkinter.ttk.Notebook method), 1422
- identify() (tkinter.ttk.Treeview method), 1427
- identify() (tkinter.ttk.Widget method), 1418
- identify_column() (tkinter.ttk.Treeview method), 1427
- identify_element() (tkinter.ttk.Treeview method), 1428
- identify_region() (tkinter.ttk.Treeview method), 1428
- identify_row() (tkinter.ttk.Treeview method), 1427
- idioms (2to3 fixer), 1581
- IDLE, 1438, 1904
- IDLE_PRIORITY_CLASS (in module subprocess), 824
- IDLESTARTUP, 1445
- idlok() (curses.window method), 695
- if
 - statement, 29
- if_indextoname() (in module socket), 938
- if_nameindex() (in module socket), 938
- if_nametoindex() (in module socket), 938
- ifloordiv() (in module operator), 365
- iglob() (in module glob), 403
- ignorableWhitespace() (xml.sax.handler.ContentHandler method), 1156
- ignore (pdb command), 1611
- ignore_errors() (in module codecs), 161
- IGNORE_EXCEPTION_DETAIL (in module doctest), 1476
- ignore_patterns() (in module shutil), 408
- IGNORECASE (in module re), 114
- ignore-dir=<dir>
 - trace command line option, 1628
- ignore-module=<mod>
 - trace command line option, 1628
- ihave() (nntplib.NNTP method), 1249
- IISCGIHandler (class in wsgiref.handlers), 1189
- ilshift() (in module operator), 365
- imag (numbers.Complex attribute), 281
- imap() (multiprocessing.pool.Pool method), 792
- IMAP4
 - protocol, 1236
- IMAP4 (class in imaplib), 1236
- IMAP4_SSL
 - protocol, 1236
- IMAP4_SSL (class in imaplib), 1237
- IMAP4_stream
 - protocol, 1236
- IMAP4_stream (class in imaplib), 1237
- IMAP4.abort, 1237
- IMAP4.error, 1237
- IMAP4.readonly, 1237
- imap_unordered() (multiprocessing.pool.Pool method), 792
- imaplib (module), 1236
- imatmul() (in module operator), 365
- imghdr (module), 1334
- immedok() (curses.window method), 695
- immutable, 1904

- sequence types, 39
- imod() (in module operator), 365
- imp
 - module, 25
- imp (module), 1890
- ImpImporter (class in pkgutil), 1753
- impl_detail() (in module test.support), 1594
- implementation (in module sys), 1668
- ImpLoader (class in pkgutil), 1754
- import
 - statement, 25, 1742, 1890
- import (2to3 fixer), 1582
- import path, 1904
- import_fresh_module() (in module test.support), 1594
- IMPORT_FROM (opcode), 1816
- import_module() (in module importlib), 1760
- import_module() (in module test.support), 1594
- IMPORT_NAME (opcode), 1815
- IMPORT_STAR (opcode), 1813
- importer, 1904
- ImportError, 88
- importing, 1904
- importlib (module), 1759
- importlib.abc (module), 1762
- importlib.machinery (module), 1770
- importlib.resources (module), 1768
- importlib.util (module), 1774
- imports (2to3 fixer), 1582
- imports2 (2to3 fixer), 1582
- ImportWarning, 94
- ImproperConnectionState, 1223
- imul() (in module operator), 365
- in
 - operator, 30, 37
- in_dll() (ctypes._CData method), 745
- in_table_a1() (in module stringprep), 144
- in_table_b1() (in module stringprep), 144
- in_table_c3() (in module stringprep), 145
- in_table_c4() (in module stringprep), 145
- in_table_c5() (in module stringprep), 145
- in_table_c6() (in module stringprep), 145
- in_table_c7() (in module stringprep), 145
- in_table_c8() (in module stringprep), 145
- in_table_c9() (in module stringprep), 145
- in_table_c11() (in module stringprep), 145
- in_table_c11_c12() (in module stringprep), 145
- in_table_c12() (in module stringprep), 145
- in_table_c21() (in module stringprep), 145
- in_table_c21_c22() (in module stringprep), 145
- in_table_c22() (in module stringprep), 145
- in_table_d1() (in module stringprep), 145
- in_table_d2() (in module stringprep), 145
- in_transaction (sqlite3.Connection attribute), 441
- inch() (curses.window method), 695
- inclusive (tracemalloc.DomainFilter attribute), 1635
- inclusive (tracemalloc.Filter attribute), 1636
- Incomplete, 1109
- IncompleteRead, 1223
- IncompleteReadError, 874
- increment_lineno() (in module ast), 1789
- IncrementalDecoder (class in codecs), 162
- incrementaldecoder (codecs.CodecInfo attribute), 157
- IncrementalEncoder (class in codecs), 162
- incrementalencoder (codecs.CodecInfo attribute), 157
- IncrementalNewlineDecoder (class in io), 599
- IncrementalParser (class in xml.sax.xmlreader), 1159
- indent (doctest.Example attribute), 1485
- INDENT (in module token), 1794
- indent() (in module textwrap), 140
- IndentationError, 91
- index() (array.array method), 239
- index() (bytearray method), 57
- index() (bytes method), 57
- index() (collections.deque method), 217
- index() (in module operator), 360
- index() (sequence method), 37
- index() (str method), 46
- index() (tkinter.ttk.Notebook method), 1422
- index() (tkinter.ttk.Treeview method), 1428
- IndexError, 89
- indexOf() (in module operator), 362
- IndexSizeErr, 1142
- inet_aton() (in module socket), 936
- inet_ntoa() (in module socket), 937
- inet_ntop() (in module socket), 937
- inet_pton() (in module socket), 937
- Inexact (class in decimal), 312
- inf (in module cmath), 292
- inf (in module math), 289
- infile
 - json.tool command line option, 1081
- infile (shlex.shlex attribute), 1400
- Infinity, 11
- infj (in module cmath), 292
- info
 - zipapp command line option, 1653
- info() (dis.Bytecode method), 1807
- info() (gettext.NullTranslations method), 1344
- info() (in module logging), 657
- info() (logging.Logger method), 648
- infolist() (zipfile.ZipFile method), 476
- .ini
 - file, 499
- ini file, 499
- init() (in module mimetypes), 1101

- `init_color()` (in module `curses`), 688
- `init_database()` (in module `msilib`), 1827
- `init_pair()` (in module `curses`), 688
- `inited` (in module `mimetypes`), 1101
- `initgroups()` (in module `os`), 545
- `initial_indent` (`textwrap.TextWrapper` attribute), 141
- `initscr()` (in module `curses`), 688
- `inode()` (`os.DirEntry` method), 566
- `INPLACE_ADD` (opcode), 1811
- `INPLACE_AND` (opcode), 1812
- `INPLACE_FLOOR_DIVIDE` (opcode), 1811
- `INPLACE_LSHIFT` (opcode), 1812
- `INPLACE_MATRIX_MULTIPLY` (opcode), 1811
- `INPLACE_MODULO` (opcode), 1811
- `INPLACE_MULTIPLY` (opcode), 1811
- `INPLACE_OR` (opcode), 1812
- `INPLACE_POWER` (opcode), 1811
- `INPLACE_RSHIFT` (opcode), 1812
- `INPLACE_SUBTRACT` (opcode), 1812
- `INPLACE_TRUE_DIVIDE` (opcode), 1811
- `INPLACE_XOR` (opcode), 1812
- `input` (2to3 fixer), 1582
- `input()` (built-in function), 13
- `input()` (in module `fileinput`), 390
- `input_charset` (`email.charset.Charset` attribute), 1066
- `input_codec` (`email.charset.Charset` attribute), 1066
- `InputOnly` (class in `tkinter.tix`), 1437
- `InputSource` (class in `xml.sax.xmlreader`), 1159
- `insch()` (`curses.window` method), 695
- `insdelln()` (`curses.window` method), 695
- `insert()` (`array.array` method), 239
- `insert()` (`collections.deque` method), 217
- `insert()` (sequence method), 39
- `insert()` (`tkinter.ttk.Notebook` method), 1422
- `insert()` (`tkinter.ttk.Treeview` method), 1428
- `insert()` (`xml.etree.ElementTree.Element` method), 1129
- `insert_text()` (in module `readline`), 146
- `insertBefore()` (`xml.dom.Node` method), 1137
- `insertln()` (`curses.window` method), 695
- `insnstr()` (`curses.window` method), 695
- `insort()` (in module `bisect`), 236
- `insort_left()` (in module `bisect`), 236
- `insort_right()` (in module `bisect`), 236
- `inspect` (module), 1726
- `inspect` command line option
 - details, 1742
- `InspectLoader` (class in `importlib.abc`), 1765
- `insstr()` (`curses.window` method), 695
- `install()` (`gettext.NullTranslations` method), 1344
- `install()` (in module `gettext`), 1343
- `install_opener()` (in module `urllib.request`), 1194
- `install_scripts()` (`venv.EnvBuilder` method), 1647
- `installHandler()` (in module `unittest`), 1521
- `instate()` (`tkinter.ttk.Widget` method), 1418
- `instr()` (`curses.window` method), 696
- `istream` (`shlex.shlex` attribute), 1400
- `Instruction` (class in `dis`), 1809
- `Instruction.arg` (in module `dis`), 1809
- `Instruction.argrepr` (in module `dis`), 1809
- `Instruction.argval` (in module `dis`), 1809
- `Instruction.is_jump_target` (in module `dis`), 1810
- `Instruction.offset` (in module `dis`), 1809
- `Instruction.opcode` (in module `dis`), 1809
- `Instruction.opname` (in module `dis`), 1809
- `Instruction.starts_line` (in module `dis`), 1810
- `int`
 - built-in function, 31
- `int` (built-in class), 14
- `int` (`uuid.UUID` attribute), 1264
- `Int2AP()` (in module `imaplib`), 1238
- `int_info` (in module `sys`), 1668
- `integer`
 - literals, 31
 - object, 30
 - types, operations on, 32
- `Integral` (class in `numbers`), 282
- `Integrated Development Environment`, 1438
- `IntegrityError`, 452
- `Intel/DVI ADPCM`, 1321
- `IntEnum` (class in `enum`), 261
- `interact` (`pdb` command), 1613
- `interact()` (`code.InteractiveConsole` method), 1748
- `interact()` (in module `code`), 1747
- `interact()` (`telnetlib.Telnet` method), 1261
- `interactive`, 1904
- `InteractiveConsole` (class in `code`), 1747
- `InteractiveInterpreter` (class in `code`), 1747
- `intern` (2to3 fixer), 1582
- `intern()` (in module `sys`), 1669
- `internal_attr` (`zipfile.ZipInfo` attribute), 480
- `Internaldate2tuple()` (in module `imaplib`), 1237
- `internalSubset` (`xml.dom.DocumentType` attribute), 1138
- `Internet`, 1173
- `interpolation`
 - `bytearray` (%), 66
 - `bytes` (%), 66
- `interpolation`, string (%), 51
- `InterpolationDepthError`, 517
- `InterpolationError`, 517
- `InterpolationMissingOptionError`, 517
- `InterpolationSyntaxError`, 517
- `interpreted`, 1905
- `interpreter` prompts, 1671
- `interpreter` shutdown, 1905

- `interpreter_requires_environment()` (in module `test.support.script_helper`), 1598
- `interrupt()` (`sqlite3.Connection` method), 443
- `interrupt_main()` (in module `_thread`), 836
- `InterruptedError`, 93
- `intersection()` (`frozenset` method), 75
- `intersection_update()` (`frozenset` method), 76
- `IntFlag` (class in `enum`), 261
- `intro` (`cmd.Cmd` attribute), 1394
- `InuseAttributeErr`, 1142
- `inv()` (in module `operator`), 361
- `InvalidAccessErr`, 1142
- `invalidate_caches()` (`importlib.abc.MetaPathFinder` method), 1762
- `invalidate_caches()` (`importlib.abc.PathEntryFinder` method), 1763
- `invalidate_caches()` (`importlib.machinery.FileFinder` method), 1772
- `invalidate_caches()` (`importlib.machinery.PathFinder` class method), 1771
- `invalidate_caches()` (in module `importlib`), 1761
- `-invalidation-mode` [`timestamp|checked-hash|unchecked-hash`] `compileall` command line option, 1804
- `InvalidCharacterErr`, 1142
- `InvalidModificationErr`, 1142
- `InvalidOperation` (class in `decimal`), 312
- `InvalidStateErr`, 1142
- `InvalidStateError`, 874
- `InvalidURL`, 1223
- `invert()` (in module `operator`), 361
- `IO` (class in `typing`), 1463
- `io` (module), 588
- `IOBase` (class in `io`), 590
- `ioctl()` (in module `fcntl`), 1854
- `ioctl()` (`socket.socket` method), 940
- `IOCTL_VM_SOCKETS_GET_LOCAL_CID` (in module `socket`), 932
- `IOError`, 92
- `ior()` (in module `operator`), 366
- `io.StringIO`
 - object, 44
- `ip` (`ipaddress.IPv4Interface` attribute), 1317
- `ip` (`ipaddress.IPv6Interface` attribute), 1317
- `ip_address()` (in module `ipaddress`), 1307
- `ip_interface()` (in module `ipaddress`), 1307
- `ip_network()` (in module `ipaddress`), 1307
- `ipaddress` (module), 1306
- `ipow()` (in module `operator`), 366
- `ipv4_mapped` (`ipaddress.IPv6Address` attribute), 1310
- `IPv4Address` (class in `ipaddress`), 1307
- `IPv4Interface` (class in `ipaddress`), 1317
- `IPv4Network` (class in `ipaddress`), 1311
- `IPV6_ENABLED` (in module `test.support`), 1587
- `IPv6Address` (class in `ipaddress`), 1309
- `IPv6Interface` (class in `ipaddress`), 1317
- `IPv6Network` (class in `ipaddress`), 1314
- `irshift()` (in module `operator`), 366
- `is`
 - `operator`, 30
- `is not`
 - `operator`, 30
- `is_()` (in module `operator`), 360
- `is_absolute()` (`pathlib.PurePath` method), 375
- `is_alive()` (`multiprocessing.Process` method), 771
- `is_alive()` (`threading.Thread` method), 754
- `is_android` (in module `test.support`), 1587
- `is_assigned()` (`symtable.Symbol` method), 1792
- `is_attachment()` (`email.message.EmailMessage` method), 1019
- `is_authenticated()` (`url-lib.request.HTTPPasswordMgrWithPriorAuth` method), 1203
- `is_block_device()` (`pathlib.Path` method), 380
- `is_blocked()` (`http.cookiejar.DefaultCookiePolicy` method), 1289
- `is_canonical()` (`decimal.Context` method), 308
- `is_canonical()` (`decimal.Decimal` method), 301
- `is_char_device()` (`pathlib.Path` method), 380
- `IS_CHARACTER_JUNK()` (in module `diffib`), 132
- `is_check_supported()` (in module `lzma`), 472
- `is_closed()` (`asyncio.loop` method), 877
- `is_closing()` (`asyncio.BaseTransport` method), 900
- `is_closing()` (`asyncio.StreamWriter` method), 859
- `is_dataclass()` (in module `dataclasses`), 1693
- `is_declared_global()` (`symtable.Symbol` method), 1792
- `is_dir()` (`os.DirEntry` method), 566
- `is_dir()` (`pathlib.Path` method), 379
- `is_dir()` (`zipfile.ZipInfo` method), 480
- `is_enabled()` (in module `faulthandler`), 1606
- `is_expired()` (`http.cookiejar.Cookie` method), 1291
- `is_fifo()` (`pathlib.Path` method), 380
- `is_file()` (`os.DirEntry` method), 566
- `is_file()` (`pathlib.Path` method), 380
- `is_finalizing()` (in module `sys`), 1669
- `is_finite()` (`decimal.Context` method), 308
- `is_finite()` (`decimal.Decimal` method), 301
- `is_free()` (`symtable.Symbol` method), 1792
- `is_global` (`ipaddress.IPv4Address` attribute), 1308
- `is_global` (`ipaddress.IPv6Address` attribute), 1309
- `is_global()` (`symtable.Symbol` method), 1792
- `is_hop_by_hop()` (in module `wsgiref.util`), 1185
- `is_imported()` (`symtable.Symbol` method), 1792
- `is_infinite()` (`decimal.Context` method), 308
- `is_infinite()` (`decimal.Decimal` method), 301

- `is_integer()` (float method), 34
- `is_jython` (in module `test.support`), 1587
- `IS_LINE_JUNK()` (in module `difflib`), 132
- `is_linetouched()` (`curses.window` method), 696
- `is_link_local` (`ipaddress.IPv4Address` attribute), 1309
- `is_link_local` (`ipaddress.IPv4Network` attribute), 1312
- `is_link_local` (`ipaddress.IPv6Address` attribute), 1309
- `is_link_local` (`ipaddress.IPv6Network` attribute), 1315
- `is_local()` (`symtable.Symbol` method), 1792
- `is_loopback` (`ipaddress.IPv4Address` attribute), 1309
- `is_loopback` (`ipaddress.IPv4Network` attribute), 1312
- `is_loopback` (`ipaddress.IPv6Address` attribute), 1309
- `is_loopback` (`ipaddress.IPv6Network` attribute), 1315
- `is_mount()` (`pathlib.Path` method), 380
- `is_multicast` (`ipaddress.IPv4Address` attribute), 1308
- `is_multicast` (`ipaddress.IPv4Network` attribute), 1312
- `is_multicast` (`ipaddress.IPv6Address` attribute), 1309
- `is_multicast` (`ipaddress.IPv6Network` attribute), 1315
- `is_multipart()` (`email.message.EmailMessage` method), 1015
- `is_multipart()` (`email.message.Message` method), 1054
- `is_namespace()` (`symtable.Symbol` method), 1792
- `is_nan()` (`decimal.Context` method), 308
- `is_nan()` (`decimal.Decimal` method), 301
- `is_nested()` (`symtable.SymbolTable` method), 1791
- `is_normal()` (`decimal.Context` method), 308
- `is_normal()` (`decimal.Decimal` method), 301
- `is_not()` (in module `operator`), 360
- `is_not_allowed()` (`http.cookiejar.DefaultCookiePolicy` method), 1289
- `is_optimized()` (`symtable.SymbolTable` method), 1791
- `is_package()` (`importlib.abc.InspectLoader` method), 1766
- `is_package()` (`importlib.abc.SourceLoader` method), 1768
- `is_package()` (`importlib.machinery.ExtensionFileLoader` method), 1773
- `is_package()` (`importlib.machinery.SourceFileLoader` method), 1772
- `is_package()` (`importlib.machinery.SourcelessFileLoader` method), 1772
- `is_package()` (`zipimport.zipimporter` method), 1752
- `is_parameter()` (`symtable.Symbol` method), 1792
- `is_private` (`ipaddress.IPv4Address` attribute), 1308
- `is_private` (`ipaddress.IPv4Network` attribute), 1312
- `is_private` (`ipaddress.IPv6Address` attribute), 1309
- `is_private` (`ipaddress.IPv6Network` attribute), 1315
- `is_python_build()` (in module `sysconfig`), 1679
- `is_qnan()` (`decimal.Context` method), 308
- `is_qnan()` (`decimal.Decimal` method), 302
- `is_reading()` (`asyncio.ReadTransport` method), 901
- `is_referenced()` (`symtable.Symbol` method), 1792
- `is_reserved` (`ipaddress.IPv4Address` attribute), 1309
- `is_reserved` (`ipaddress.IPv4Network` attribute), 1312
- `is_reserved` (`ipaddress.IPv6Address` attribute), 1309
- `is_reserved` (`ipaddress.IPv6Network` attribute), 1315
- `is_reserved()` (`pathlib.PurePath` method), 375
- `is_resource()` (`importlib.abc.ResourceReader` method), 1765
- `is_resource()` (in module `importlib.resources`), 1769
- `is_resource_enabled()` (in module `test.support`), 1588
- `is_running()` (`asyncio.loop` method), 877
- `is_safe` (`uuid.UUID` attribute), 1264
- `is_serving()` (`asyncio.Server` method), 891
- `is_set()` (`asyncio.Event` method), 864
- `is_set()` (`threading.Event` method), 760
- `is_signed()` (`decimal.Context` method), 308
- `is_signed()` (`decimal.Decimal` method), 302
- `is_site_local` (`ipaddress.IPv6Address` attribute), 1310
- `is_site_local` (`ipaddress.IPv6Network` attribute), 1315
- `is_snan()` (`decimal.Context` method), 309
- `is_snan()` (`decimal.Decimal` method), 302
- `is_socket()` (`pathlib.Path` method), 380
- `is_subnormal()` (`decimal.Context` method), 309
- `is_subnormal()` (`decimal.Decimal` method), 302
- `is_symlink()` (`os.DirEntry` method), 566
- `is_symlink()` (`pathlib.Path` method), 380
- `is_tarfile()` (in module `tarfile`), 483
- `is_term_resized()` (in module `curses`), 688
- `is_tracing()` (in module `tracemalloc`), 1635
- `is_tracked()` (in module `gc`), 1724
- `is_unspecified` (`ipaddress.IPv4Address` attribute), 1309
- `is_unspecified` (`ipaddress.IPv4Network` attribute), 1312
- `is_unspecified` (`ipaddress.IPv6Address` attribute), 1309
- `is_unspecified` (`ipaddress.IPv6Network` attribute), 1315
- `is_wintouched()` (`curses.window` method), 696
- `is_zero()` (`decimal.Context` method), 309
- `is_zero()` (`decimal.Decimal` method), 302
- `is_zipfile()` (in module `zipfile`), 474
- `isabs()` (in module `os.path`), 387
- `isabstract()` (in module `inspect`), 1730

- IsADirectoryError, 93
- isalnum() (bytearray method), 62
- isalnum() (bytes method), 62
- isalnum() (in module curses.ascii), 705
- isalnum() (str method), 46
- isalpha() (bytearray method), 62
- isalpha() (bytes method), 62
- isalpha() (in module curses.ascii), 705
- isalpha() (str method), 46
- isascii() (bytearray method), 62
- isascii() (bytes method), 62
- isascii() (in module curses.ascii), 705
- isascii() (str method), 46
- isasyncgen() (in module inspect), 1729
- isasyncgenfunction() (in module inspect), 1729
- isatty() (chunk.Chunk method), 1332
- isatty() (in module os), 550
- isatty() (io.IOBBase method), 591
- isawaitable() (in module inspect), 1729
- isblank() (in module curses.ascii), 705
- isblk() (tarfile.TarInfo method), 488
- isbuiltin() (in module inspect), 1729
- ischr() (tarfile.TarInfo method), 488
- isclass() (in module inspect), 1728
- isclose() (in module cmath), 292
- isclose() (in module math), 285
- isctrl() (in module curses.ascii), 705
- iscode() (in module inspect), 1729
- iscoroutine() (in module asyncio), 856
- iscoroutine() (in module inspect), 1729
- iscoroutinefunction() (in module asyncio), 856
- iscoroutinefunction() (in module inspect), 1729
- isctrl() (in module curses.ascii), 706
- isDaemon() (threading.Thread method), 754
- isdatadescriptor() (in module inspect), 1730
- isdecimal() (str method), 46
- isdev() (tarfile.TarInfo method), 488
- isdigit() (bytearray method), 62
- isdigit() (bytes method), 62
- isdigit() (in module curses.ascii), 705
- isdigit() (str method), 46
- isdir() (in module os.path), 387
- isdir() (tarfile.TarInfo method), 488
- isdisjoint() (frozenset method), 75
- isdown() (in module turtle), 1370
- iselement() (in module xml.etree.ElementTree), 1126
- isEnabled() (in module gc), 1723
- isEnabledFor() (logging.Logger method), 647
- isendwin() (in module curses), 688
- ISEOF() (in module token), 1794
- isexpr() (in module parser), 1783
- isexpr() (parser.ST method), 1784
- isfifo() (tarfile.TarInfo method), 488
- isfile() (in module os.path), 387
- isfile() (tarfile.TarInfo method), 488
- isfinite() (in module cmath), 292
- isfinite() (in module math), 286
- isfirstline() (in module fileinput), 390
- isframe() (in module inspect), 1729
- isfunction() (in module inspect), 1728
- isfuture() (in module asyncio), 895
- isgenerator() (in module inspect), 1729
- isgeneratorfunction() (in module inspect), 1729
- isgetsetdescriptor() (in module inspect), 1730
- isgraph() (in module curses.ascii), 705
- isidentifier() (str method), 47
- isinf() (in module cmath), 292
- isinf() (in module math), 286
- isinstance (2to3 fixer), 1582
- isinstance() (built-in function), 14
- iskeyword() (in module keyword), 1795
- isleap() (in module calendar), 209
- islice() (in module itertools), 343
- islink() (in module os.path), 387
- islnk() (tarfile.TarInfo method), 488
- islower() (bytearray method), 62
- islower() (bytes method), 62
- islower() (in module curses.ascii), 706
- islower() (str method), 47
- ismemberdescriptor() (in module inspect), 1730
- ismeta() (in module curses.ascii), 706
- ismethod() (in module inspect), 1728
- ismethoddescriptor() (in module inspect), 1730
- ismodule() (in module inspect), 1728
- ismount() (in module os.path), 387
- isnan() (in module cmath), 292
- isnan() (in module math), 286
- ISNONTERMINAL() (in module token), 1793
- isnumeric() (str method), 47
- isocalendar() (datetime.date method), 181
- isocalendar() (datetime.datetime method), 189
- isoformat() (datetime.date method), 181
- isoformat() (datetime.datetime method), 189
- isoformat() (datetime.time method), 193
- isolation_level (sqlite3.Connection attribute), 441
- isweekday() (datetime.date method), 181
- isweekday() (datetime.datetime method), 189
- isprint() (in module curses.ascii), 706
- isprintable() (str method), 47
- ispunct() (in module curses.ascii), 706
- isreadable() (in module pprint), 255
- isreadable() (pprint.PrettyPrinter method), 255
- isrecursive() (in module pprint), 255
- isrecursive() (pprint.PrettyPrinter method), 255
- isreg() (tarfile.TarInfo method), 488
- isReservedKey() (http.cookies.Morsel method), 1282
- isroutine() (in module inspect), 1729
- isSameNode() (xml.dom.Node method), 1137

- isspace() (bytearray method), 63
 - isspace() (bytes method), 63
 - isspace() (in module curses.ascii), 706
 - isspace() (str method), 47
 - isstdin() (in module fileinput), 390
 - issubclass() (built-in function), 14
 - issubset() (frozenset method), 75
 - issuite() (in module parser), 1783
 - issuite() (parser.ST method), 1784
 - issuperset() (frozenset method), 75
 - issym() (tarfile.TarInfo method), 488
 - ISTERMINAL() (in module token), 1793
 - istitle() (bytearray method), 63
 - istitle() (bytes method), 63
 - istitle() (str method), 47
 - istraceback() (in module inspect), 1729
 - isub() (in module operator), 366
 - isupper() (bytearray method), 63
 - isupper() (bytes method), 63
 - isupper() (in module curses.ascii), 706
 - isupper() (str method), 47
 - isvisible() (in module turtle), 1373
 - isxdigit() (in module curses.ascii), 706
 - item() (tkinter.ttk.Treeview method), 1428
 - item() (xml.dom.NamedNodeMap method), 1141
 - item() (xml.dom.NodeList method), 1138
 - itemgetter() (in module operator), 363
 - items() (configparser.ConfigParser method), 515
 - items() (contextvars.Context method), 842
 - items() (dict method), 78
 - items() (email.message.EmailMessage method), 1017
 - items() (email.message.Message method), 1056
 - items() (mailbox.Mailbox method), 1084
 - items() (types.MappingProxyType method), 251
 - items() (xml.etree.ElementTree.Element method), 1128
 - itemsizes (array.array attribute), 239
 - itemsizes (memoryview attribute), 74
 - ItemsView (class in collections.abc), 229
 - ItemsView (class in typing), 1460
 - iter() (built-in function), 14
 - iter() (xml.etree.ElementTree.Element method), 1129
 - iter() (xml.etree.ElementTree.ElementTree method), 1130
 - iter_attachments() (email.message.EmailMessage method), 1021
 - iter_child_nodes() (in module ast), 1790
 - iter_fields() (in module ast), 1790
 - iter_importers() (in module pkgutil), 1754
 - iter_modules() (in module pkgutil), 1754
 - iter_parts() (email.message.EmailMessage method), 1021
 - iter_unpack() (in module struct), 152
 - iter_unpack() (struct.Struct method), 156
 - iterable, **1905**
 - Iterable (class in collections.abc), 228
 - Iterable (class in typing), 1459
 - iterator, **1905**
 - Iterator (class in collections.abc), 229
 - Iterator (class in typing), 1459
 - iterator protocol, 36
 - iterdecode() (in module codecs), 159
 - iterdir() (pathlib.Path method), 380
 - iterdump() (sqlite3.Connection method), 446
 - iterencode() (in module codecs), 158
 - iterencode() (json.JSONEncoder method), 1078
 - iterfind() (xml.etree.ElementTree.Element method), 1129
 - iterfind() (xml.etree.ElementTree.ElementTree method), 1130
 - iteritems() (mailbox.Mailbox method), 1084
 - iterkeys() (mailbox.Mailbox method), 1084
 - itermonthdates() (calendar.Calendar method), 206
 - itermonthdays() (calendar.Calendar method), 206
 - itermonthdays2() (calendar.Calendar method), 206
 - itermonthdays3() (calendar.Calendar method), 206
 - itermonthdays4() (calendar.Calendar method), 207
 - iterparse() (in module xml.etree.ElementTree), 1126
 - itertext() (xml.etree.ElementTree.Element method), 1129
 - itertools (2to3 fixer), 1582
 - itertools (module), 337
 - itertools_imports (2to3 fixer), 1582
 - itervalues() (mailbox.Mailbox method), 1084
 - iterweekdays() (calendar.Calendar method), 206
 - ITIMER_PROF (in module signal), 1004
 - ITIMER_REAL (in module signal), 1004
 - ITIMER_VIRTUAL (in module signal), 1004
 - ItimerError, 1004
 - itruediv() (in module operator), 366
 - ixor() (in module operator), 366
- J**
- j N compileall command line option, 1804
 - Jansen, Jack, 1110
 - java_ver() (in module platform), 710
 - join() (asyncio.Queue method), 872
 - join() (bytearray method), 57
 - join() (bytes method), 57
 - join() (in module os.path), 387
 - join() (multiprocessing.JoinableQueue method), 775
 - join() (multiprocessing.pool.Pool method), 792
 - join() (multiprocessing.Process method), 770
 - join() (queue.Queue method), 834
 - join() (str method), 47
 - join() (threading.Thread method), 754

- `join_thread()` (in module `test.support`), 1595
 - `join_thread()` (`multiprocessing.Queue` method), 774
 - `JoinableQueue` (class in `multiprocessing`), 775
 - `joinpath()` (`pathlib.PurePath` method), 375
 - `js_output()` (`http.cookies.BaseCookie` method), 1281
 - `js_output()` (`http.cookies.Morsel` method), 1282
 - `json` (module), 1072
 - `JSONDecodeError`, 1079
 - `JSONDecoder` (class in `json`), 1076
 - `JSONEncoder` (class in `json`), 1077
 - `json.tool` (module), 1081
 - `json.tool` command line option
 - `-h, --help`, 1081
 - `infile`, 1081
 - `outfile`, 1081
 - `--sort-keys`, 1081
 - `jump` (`pdb` command), 1612
 - `JUMP_ABSOLUTE` (opcode), 1816
 - `JUMP_FORWARD` (opcode), 1816
 - `JUMP_IF_FALSE_OR_POP` (opcode), 1816
 - `JUMP_IF_TRUE_OR_POP` (opcode), 1816
- ## K
- `-k`
 - `unittest` command line option, 1495
 - `kbhit()` (in module `msvcrt`), 1833
 - `KDEDIR`, 1175
 - `kevent()` (in module `select`), 986
 - `key` (`http.cookies.Morsel` attribute), 1282
 - `key` function, **1905**
 - `KEY_ALL_ACCESS` (in module `winreg`), 1840
 - `KEY_CREATE_LINK` (in module `winreg`), 1840
 - `KEY_CREATE_SUB_KEY` (in module `winreg`), 1840
 - `KEY_ENUMERATE_SUB_KEYS` (in module `winreg`), 1840
 - `KEY_EXECUTE` (in module `winreg`), 1840
 - `KEY_NOTIFY` (in module `winreg`), 1840
 - `KEY_QUERY_VALUE` (in module `winreg`), 1840
 - `KEY_READ` (in module `winreg`), 1840
 - `KEY_SET_VALUE` (in module `winreg`), 1840
 - `KEY_WOW64_32KEY` (in module `winreg`), 1840
 - `KEY_WOW64_64KEY` (in module `winreg`), 1840
 - `KEY_WRITE` (in module `winreg`), 1840
 - `KeyboardInterrupt`, 89
 - `KeyError`, 89
 - `keyname()` (in module `curses`), 688
 - `keypad()` (`curses.window` method), 696
 - `keyrefs()` (`weakref.WeakKeyDictionary` method), 242
 - `keys()` (`contextvars.Context` method), 841
 - `keys()` (`dict` method), 78
 - `keys()` (`email.message.EmailMessage` method), 1017
 - `keys()` (`email.message.Message` method), 1056
 - `keys()` (`mailbox.Mailbox` method), 1084
 - `keys()` (`sqlite3.Row` method), 451
 - `keys()` (`types.MappingProxyType` method), 251
 - `keys()` (`xml.etree.ElementTree.Element` method), 1128
 - `KeysView` (class in `collections.abc`), 229
 - `KeysView` (class in `typing`), 1460
 - `keyword` (module), 1795
 - `keyword` argument, **1905**
 - `keywords` (`functools.partial` attribute), 359
 - `kill()` (`asyncio.asyncio.subprocess.Process` method), 869
 - `kill()` (`asyncio.SubprocessTransport` method), 902
 - `kill()` (in module `os`), 578
 - `kill()` (`multiprocessing.Process` method), 772
 - `kill()` (`subprocess.Popen` method), 822
 - `kill_python()` (in module `test.support.script_helper`), 1599
 - `killchar()` (in module `curses`), 688
 - `killpg()` (in module `os`), 578
 - `kind` (`inspect.Parameter` attribute), 1733
 - `knownfiles` (in module `mimetypes`), 1101
 - `kqueue()` (in module `select`), 986
 - `KqueueSelector` (class in `selectors`), 995
 - `kwargs` (`inspect.BoundArguments` attribute), 1735
 - `kwlist` (in module `keyword`), 1795
- ## L
- `-l`
 - `compileall` command line option, 1803
 - `L` (in module `re`), 114
 - `-l <tarfile>`
 - `tarfile` command line option, 489
 - `-l <zipfile>`
 - `zipfile` command line option, 481
 - `-l, --indentlevel=<num>`
 - `pickletools` command line option, 1820
 - `-l, --listfuncs`
 - `trace` command line option, 1628
 - `LabelEntry` (class in `tkinter.tix`), 1434
 - `LabelFrame` (class in `tkinter.tix`), 1434
 - `lambda`, **1905**
 - `LambdaType` (in module `types`), 249
 - `LANG`, 1341, 1343, 1350, 1353
 - `LANGUAGE`, 1341, 1343
 - `language`
 - `C`, 30, 31
 - `large files`, 1845
 - `LargeZipFile`, 474
 - `last()` (`nntplib.NNTP` method), 1248
 - `last_accepted` (`multiprocessing.connection.Listener` attribute), 794
 - `last_traceback` (in module `sys`), 1669
 - `last_type` (in module `sys`), 1669
 - `last_value` (in module `sys`), 1669

- lastChild (xml.dom.Node attribute), 1137
- lastcmd (cmd.Cmd attribute), 1394
- lastgroup (re.Match attribute), 122
- lastindex (re.Match attribute), 122
- lastResort (in module logging), 660
- lastrowid (sqlite3.Cursor attribute), 450
- layout() (tkinter.ttk.Style method), 1431
- lazycache() (in module linecache), 405
- LazyLoader (class in importlib.util), 1776
- LBRACE (in module token), 1794
- LBYL, **1906**
- LC_ALL, 1341, 1343
- LC_ALL (in module locale), 1355
- LC_COLLATE (in module locale), 1355
- LC_CTYPE (in module locale), 1355
- LC_MESSAGES, 1341, 1343
- LC_MESSAGES (in module locale), 1355
- LC_MONETARY (in module locale), 1355
- LC_NUMERIC (in module locale), 1355
- LC_TIME (in module locale), 1355
- lchflags() (in module os), 560
- lchmod() (in module os), 560
- lchmod() (pathlib.Path method), 381
- lchown() (in module os), 560
- ldexp() (in module math), 286
- ldgettext() (in module gettext), 1342
- ldngettext() (in module gettext), 1342
- le() (in module operator), 360
- leapdays() (in module calendar), 209
- leaveok() (curses.window method), 696
- left (filecmp.dircmp attribute), 397
- left() (in module turtle), 1362
- left_list (filecmp.dircmp attribute), 397
- left_only (filecmp.dircmp attribute), 398
- LEFTSHIFT (in module token), 1794
- LEFTSHIFTEQUAL (in module token), 1794
- len
 - built-in function, 37, 77
- len() (built-in function), 15
- length (xml.dom.NamedNodeMap attribute), 1141
- length (xml.dom.NodeList attribute), 1138
- length_hint() (in module operator), 362
- LESS (in module token), 1794
- LESSEQUAL (in module token), 1794
- lexists() (in module os.path), 386
- lgamma() (in module math), 289
- gettext() (gettext.GNUTranslations method), 1345
- gettext() (gettext.NullTranslations method), 1344
- gettext() (in module gettext), 1342
- lib2to3 (module), 1584
- libc_ver() (in module platform), 711
- library (in module dbm.ndbm), 436
- library (ssl.SSLError attribute), 952
- LibraryLoader (class in ctypes), 738
- license (built-in variable), 28
- LifoQueue (class in asyncio), 872
- LifoQueue (class in queue), 833
- light-weight processes, 836
- limit_denominator() (fractions.Fraction method), 322
- LimitOverrunError, 875
- lin2adpcm() (in module audioop), 1322
- lin2alaw() (in module audioop), 1322
- lin2lin() (in module audioop), 1322
- lin2ulaw() (in module audioop), 1323
- line() (msilib.Dialog method), 1832
- line_buffering (io.TextIOWrapper attribute), 598
- line_num (csv.csvreader attribute), 498
- line-buffered I/O, 18
- linecache (module), 405
- lineno (ast.AST attribute), 1786
- lineno (doctest.DocTest attribute), 1485
- lineno (doctest.Example attribute), 1485
- lineno (json.JSONDecodeError attribute), 1079
- lineno (pyclbr.Class attribute), 1801
- lineno (pyclbr.Function attribute), 1800
- lineno (re.error attribute), 118
- lineno (shlex.shlex attribute), 1400
- lineno (traceback.TracebackException attribute), 1718
- lineno (tracemalloc.Filter attribute), 1636
- lineno (tracemalloc.Frame attribute), 1636
- lineno (xml.parsers.expat.ExpatError attribute), 1168
- lineno() (in module fileinput), 390
- LINES, 687, 691, 692
- lines (os.terminal_size attribute), 556
- linesep (email.policy.Policy attribute), 1031
- linesep (in module os), 586
- lineterminator (csv.Dialect attribute), 497
- LineTooLong, 1223
- link() (in module os), 560
- linkname (tarfile.TarInfo attribute), 487
- linux_distribution() (in module platform), 711
- list, **1906**
 - object, 39, 40
 - type, operations on, 39
- list (built-in class), 40
- List (class in typing), 1460
- list (pdb command), 1612
- list <tarfile>
 - tarfile command line option, 489
- list <zipfile>
 - zipfile command line option, 481
- list comprehension, **1906**
- list() (imaplib.IMAP4 method), 1239
- list() (multiprocessing.managers.SyncManager method), 786

- `list()` (nntplib.NNTP method), 1246
- `list()` (poplib.POP3 method), 1235
- `list()` (tarfile.TarFile method), 485
- `LIST_APPEND` (opcode), 1813
- `list_dialects()` (in module csv), 494
- `list_folders()` (mailbox.Maildir method), 1086
- `list_folders()` (mailbox.MH method), 1088
- `listdir()` (in module os), 561
- `listen()` (asyncore.dispatcher method), 998
- `listen()` (in module logging.config), 662
- `listen()` (in module turtle), 1381
- `listen()` (socket.socket method), 940
- `Listener` (class in multiprocessing.connection), 794
- `listMethods()` (xmlrpc.client.ServerProxy.system method), 1294
- `ListNoteBook` (class in tkinter.tix), 1436
- `listxattr()` (in module os), 575
- `literal_eval()` (in module ast), 1789
- literals
 - binary, 31
 - complex number, 31
 - floating point, 31
 - hexadecimal, 31
 - integer, 31
 - numeric, 31
 - octal, 31
- `LittleEndianStructure` (class in ctypes), 748
- `ljust()` (bytearray method), 59
- `ljust()` (bytes method), 59
- `ljust()` (str method), 47
- `LK_LOCK` (in module msvcrt), 1833
- `LK_NBLCK` (in module msvcrt), 1833
- `LK_NBRLCK` (in module msvcrt), 1833
- `LK_RLCK` (in module msvcrt), 1833
- `LK_UNLCK` (in module msvcrt), 1833
- `ll` (pdb command), 1612
- `LMTP` (class in smtplib), 1251
- `ln()` (decimal.Context method), 309
- `ln()` (decimal.Decimal method), 302
- `LNAME`, 685
- `lngettext()` (gettext.GNUTranslations method), 1345
- `lngettext()` (gettext.NullTranslations method), 1344
- `lngettext()` (in module gettext), 1342
- `load()` (http.cookiejar.FileCookieJar method), 1286
- `load()` (http.cookies.BaseCookie method), 1281
- `load()` (in module json), 1075
- `load()` (in module marshal), 432
- `load()` (in module pickle), 417
- `load()` (in module plistlib), 522
- `load()` (pickle.Unpickler method), 419
- `load()` (tracemalloc.Snapshot class method), 1637
- `LOAD_ATTR` (opcode), 1815
- `LOAD_BUILD_CLASS` (opcode), 1813
- `load_cert_chain()` (ssl.SSLContext method), 968
- `LOAD_CLASSDEREF` (opcode), 1817
- `LOAD_CLOSURE` (opcode), 1816
- `LOAD_CONST` (opcode), 1814
- `load_default_certs()` (ssl.SSLContext method), 968
- `LOAD_DEREF` (opcode), 1817
- `load_dh_params()` (ssl.SSLContext method), 971
- `load_extension()` (sqlite3.Connection method), 445
- `LOAD_FAST` (opcode), 1816
- `LOAD_GLOBAL` (opcode), 1816
- `LOAD_METHOD` (opcode), 1817
- `load_module()` (importlib.abc.FileLoader method), 1767
- `load_module()` (importlib.abc.InspectLoader method), 1766
- `load_module()` (importlib.abc.Loader method), 1764
- `load_module()` (importlib.abc.SourceLoader method), 1768
- `load_module()` (importlib.machinery.SourceFileLoader method), 1772
- `load_module()` (importlib.machinery.SourcelessFileLoader method), 1773
- `load_module()` (in module imp), 1891
- `load_module()` (zipimport.zipimporter method), 1752
- `LOAD_NAME` (opcode), 1814
- `load_package_tests()` (in module test.support), 1596
- `load_verify_locations()` (ssl.SSLContext method), 968
- `loader`, 1906
- `Loader` (class in importlib.abc), 1763
- `loader` (importlib.machinery.ModuleSpec attribute), 1773
- `loader_state` (importlib.machinery.ModuleSpec attribute), 1774
- `LoadError`, 1284
- `LoadKey()` (in module winreg), 1836
- `LoadLibrary()` (ctypes.LibraryLoader method), 739
- `loads()` (in module json), 1076
- `loads()` (in module marshal), 433
- `loads()` (in module pickle), 418
- `loads()` (in module plistlib), 522
- `loads()` (in module xmlrpc.client), 1299
- `loadTestsFromModule()` (unittest.TestLoader method), 1513
- `loadTestsFromName()` (unittest.TestLoader method), 1513
- `loadTestsFromNames()` (unittest.TestLoader method), 1513
- `loadTestsFromTestCase()` (unittest.TestLoader method), 1513
- `local` (class in threading), 752
- `localcontext()` (in module decimal), 305
- `LOCALE` (in module re), 114
- `locale` (module), 1349

- localeconv() (in module locale), 1350
- LocaleHTMLCalendar (class in calendar), 209
- LocaleTextCalendar (class in calendar), 209
- localName (xml.dom.Attr attribute), 1141
- localName (xml.dom.Node attribute), 1137
- locals
 - unittest command line option, 1496
- locals() (built-in function), 15
- localtime() (in module email.utils), 1069
- localtime() (in module time), 603
- Locator (class in xml.sax.xmlreader), 1159
- Lock (class in asyncio), 863
- Lock (class in multiprocessing), 779
- Lock (class in threading), 755
- lock() (mailbox.Babyl method), 1090
- lock() (mailbox.Mailbox method), 1086
- lock() (mailbox.Maildir method), 1087
- lock() (mailbox.mbox method), 1088
- lock() (mailbox.MH method), 1089
- lock() (mailbox.MMDF method), 1090
- Lock() (multiprocessing.managers.SyncManager method), 786
- lock_held() (in module imp), 1893
- locked() (_thread.lock method), 837
- locked() (asyncio.Condition method), 865
- locked() (asyncio.Lock method), 863
- locked() (asyncio.Semaphore method), 866
- lockf() (in module fcntl), 1854
- lockf() (in module os), 550
- locking() (in module msvcrt), 1833
- LockType (in module _thread), 836
- log() (in module cmath), 290
- log() (in module logging), 658
- log() (in module math), 287
- log() (logging.Logger method), 648
- log1p() (in module math), 287
- log2() (in module math), 287
- log10() (decimal.Context method), 309
- log10() (decimal.Decimal method), 302
- log10() (in module cmath), 291
- log10() (in module math), 287
- log_date_time_string()
 - (http.server.BaseHTTPRequestHandler method), 1278
- log_error() (http.server.BaseHTTPRequestHandler method), 1277
- log_exception() (wsgiref.handlers.BaseHandler method), 1191
- log_message() (http.server.BaseHTTPRequestHandler method), 1278
- log_request() (http.server.BaseHTTPRequestHandler method), 1277
- log_to_stderr() (in module multiprocessing), 797
- logb() (decimal.Context method), 309
- logb() (decimal.Decimal method), 302
- Logger (class in logging), 646
- LoggerAdapter (class in logging), 656
- logging
 - Errors, 645
- logging (module), 645
- logging.config (module), 661
- logging.handlers (module), 672
- logical_and() (decimal.Context method), 309
- logical_and() (decimal.Decimal method), 302
- logical_invert() (decimal.Context method), 309
- logical_invert() (decimal.Decimal method), 302
- logical_or() (decimal.Context method), 309
- logical_or() (decimal.Decimal method), 302
- logical_xor() (decimal.Context method), 309
- logical_xor() (decimal.Decimal method), 302
- login() (ftplib.FTP method), 1231
- login() (imaplib.IMAP4 method), 1239
- login() (nnplib.NNTP method), 1246
- login() (smtplib.SMTP method), 1253
- login_cram_md5() (imaplib.IMAP4 method), 1239
- LOGNAME, 544, 685
- lognormvariate() (in module random), 326
- logout() (imaplib.IMAP4 method), 1240
- LogRecord (class in logging), 653
- long (2to3 fixer), 1582
- longMessage (unittest.TestCase attribute), 1510
- longname() (in module curses), 688
- lookup() (in module codecs), 157
- lookup() (in module unicodedata), 142
- lookup() (symtable.SymbolTable method), 1792
- lookup() (tkinter.ttk.Style method), 1431
- lookup_error() (in module codecs), 160
- LookupError, 88
- loop() (in module asyncore), 996
- lower() (bytearray method), 63
- lower() (bytes method), 63
- lower() (str method), 47
- LPAR (in module token), 1794
- lpAttributeList (subprocess.STARTUPINFO attribute), 823
- lru_cache() (in module functools), 352
- lseek() (in module os), 550
- lshift() (in module operator), 361
- LSQB (in module token), 1794
- lstat() (in module os), 561
- lstat() (pathlib.Path method), 381
- lstrip() (bytearray method), 59
- lstrip() (bytes method), 59
- lstrip() (str method), 47
- lsub() (imaplib.IMAP4 method), 1240
- lt() (in module operator), 360
- lt() (in module turtle), 1362
- LWPCookieJar (class in http.cookiejar), 1287

lzma (module), 468
 LZMACCompressor (class in lzma), 469
 LZMADecompressor (class in lzma), 470
 LZMAError, 468
 LZMAFile (class in lzma), 469

M

M (in module re), 114
 -m <mainfn>, -main=<mainfn>
 zipapp command line option, 1653
 -m, -memo
 pickletools command line option, 1820
 -m, -missing
 trace command line option, 1628
 mac_ver() (in module platform), 710
 machine() (in module platform), 708
 macpath (module), 414
 macros (netrc.netrc attribute), 518
 MAGIC_NUMBER (in module importlib.util), 1774
 MagicMock (class in unittest.mock), 1548
 Mailbox (class in mailbox), 1083
 mailbox (module), 1083
 mailcap (module), 1082
 Maildir (class in mailbox), 1086
 MaildirMessage (class in mailbox), 1091
 mailfrom (smtpd.SMTPChannel attribute), 1259
 MailmanProxy (class in smtpd), 1258
 main() (in module py_compile), 1803
 main() (in module site), 1744
 main() (in module unittest), 1517
 main_thread() (in module threading), 751
 mainloop() (in module turtle), 1382
 maintype (email.headerregistry.ContentTypeHeader attribute), 1040
 major (email.headerregistry.MIMEVersionHeader attribute), 1040
 major() (in module os), 562
 make_alternative() (email.message.EmailMessage method), 1021
 make_archive() (in module shutil), 411
 make_bad_fd() (in module test.support), 1594
 make_cookies() (http.cookiejar.CookieJar method), 1286
 make_dataclass() (in module dataclasses), 1692
 make_file() (difflib.HtmlDiff method), 129
 MAKE_FUNCTION (opcode), 1818
 make_header() (in module email.header), 1065
 make_legacy_pyc() (in module test.support), 1588
 make_mixed() (email.message.EmailMessage method), 1021
 make_msgid() (in module email.utils), 1069
 make_parser() (in module xml.sax), 1151
 make_pkg() (in module test.support.script_helper), 1599
 make_related() (email.message.EmailMessage method), 1021
 make_script() (in module test.support.script_helper), 1599
 make_server() (in module wsgiref.simple_server), 1186
 make_table() (difflib.HtmlDiff method), 129
 make_zip_pkg() (in module test.support.script_helper), 1599
 make_zip_script() (in module test.support.script_helper), 1599
 makedev() (in module os), 563
 makedirs() (in module os), 562
 makeelement() (xml.etree.ElementTree.Element method), 1129
 makefile() (socket.socket method), 940
 makeLogRecord() (in module logging), 659
 makePickle() (logging.handlers.SocketHandler method), 677
 makeRecord() (logging.Logger method), 649
 makeSocket() (logging.handlers.DatagramHandler method), 678
 makeSocket() (logging.handlers.SocketHandler method), 677
 maketrans() (bytearray static method), 57
 maketrans() (bytes static method), 57
 maketrans() (str static method), 48
 mangle_from_ (email.policy.Compat32 attribute), 1035
 mangle_from_ (email.policy.Policy attribute), 1031
 map (2to3 fixer), 1582
 map() (built-in function), 15
 map() (concurrent.futures.Executor method), 808
 map() (multiprocessing.pool.Pool method), 791
 map() (tkinter.ttk.Style method), 1430
 MAP_ADD (opcode), 1813
 map_async() (multiprocessing.pool.Pool method), 791
 map_table_b2() (in module stringprep), 145
 map_table_b3() (in module stringprep), 145
 map_to_type() (email.headerregistry.HeaderRegistry method), 1041
 mapLogRecord() (logging.handlers.HTTPHandler method), 682
 mapping, **1906**
 object, 77
 types, operations on, 77
 Mapping (class in collections.abc), 229
 Mapping (class in typing), 1460
 mapping() (msilib.Control method), 1831
 MappingProxyType (class in types), 251
 MappingView (class in collections.abc), 229
 MappingView (class in typing), 1460

- ul style="list-style-type: none; padding-left: 0;">
- mapPriority() (logging.handlers.SysLogHandler method), 680
- maps (collections.ChainMap attribute), 211
- maps() (in module nis), 1861
- marshal (module), 432
- marshalling
 - objects, 415
- masking
 - operations, 32
- Match (class in typing), 1463
- match() (in module nis), 1860
- match() (in module re), 115
- match() (pathlib.PurePath method), 376
- match() (re.Pattern method), 118
- match_hostname() (in module ssl), 954
- match_test() (in module test.support), 1589
- match_value() (test.support.Matcher method), 1598
- Matcher (class in test.support), 1598
- matches() (test.support.Matcher method), 1598
- math
 - module, 31, 293
- math (module), 284
- matmul() (in module operator), 361
- max
 - built-in function, 37
- max (datetime.date attribute), 180
- max (datetime.datetime attribute), 185
- max (datetime.time attribute), 192
- max (datetime.timedelta attribute), 177
- max() (built-in function), 15
- max() (decimal.Context method), 309
- max() (decimal.Decimal method), 302
- max() (in module audioop), 1323
- max_count (email.headerregistry.BaseHeader attribute), 1038
- MAX_EMAX (in module decimal), 311
- MAX_INTERPOLATION_DEPTH (in module configparser), 516
- max_line_length (email.policy.Policy attribute), 1031
- max_lines (textwrap.TextWrapper attribute), 142
- max_mag() (decimal.Context method), 309
- max_mag() (decimal.Decimal method), 302
- max_memuse (in module test.support), 1588
- MAX_PREC (in module decimal), 311
- max_prefixlen (ipaddress.IPv4Address attribute), 1308
- max_prefixlen (ipaddress.IPv4Network attribute), 1312
- max_prefixlen (ipaddress.IPv6Address attribute), 1309
- max_prefixlen (ipaddress.IPv6Network attribute), 1315
- MAX_Py_ssize_t (in module test.support), 1588
- maxarray (reprlib.Repr attribute), 260
- maxdeque (reprlib.Repr attribute), 260
- maxdict (reprlib.Repr attribute), 260
- maxDiff (unittest.TestCase attribute), 1510
- maxfrozenset (reprlib.Repr attribute), 260
- MAXIMUM_SUPPORTED (ssl.TLSVersion attribute), 962
- maximum_version (ssl.SSLContext attribute), 973
- maxlen (collections.deque attribute), 217
- maxlevel (reprlib.Repr attribute), 260
- maxlist (reprlib.Repr attribute), 260
- maxlength (reprlib.Repr attribute), 260
- maxother (reprlib.Repr attribute), 260
- maxpp() (in module audioop), 1323
- maxset (reprlib.Repr attribute), 260
- maxsize (asyncio.Queue attribute), 871
- maxsize (in module sys), 1669
- maxstring (reprlib.Repr attribute), 260
- maxtuple (reprlib.Repr attribute), 260
- maxunicode (in module sys), 1669
- MAXYEAR (in module datetime), 175
- MB_ICONASTERISK (in module winsound), 1843
- MB_ICONEXCLAMATION (in module winsound), 1843
- MB_ICONHAND (in module winsound), 1843
- MB_ICONQUESTION (in module winsound), 1844
- MB_OK (in module winsound), 1844
- mbox (class in mailbox), 1087
- mboxMessage (class in mailbox), 1093
- mean() (in module statistics), 330
- median() (in module statistics), 331
- median_grouped() (in module statistics), 332
- median_high() (in module statistics), 332
- median_low() (in module statistics), 331
- MemberDescriptorType (in module types), 251
- memmove() (in module ctypes), 744
- MemoryBIO (class in ssl), 982
- MemoryError, 89
- MemoryHandler (class in logging.handlers), 682
- memoryview
 - object, 53
- memoryview (built-in class), 68
- memset() (in module ctypes), 744
- merge() (in module heapq), 232
- Message (class in email.message), 1053
- Message (class in mailbox), 1091
- message digest, MD5, 525
- message_factory (email.policy.Policy attribute), 1031
- message_from_binary_file() (in module email), 1025
- message_from_bytes() (in module email), 1025
- message_from_file() (in module email), 1025
- message_from_string() (in module email), 1025
- MessageBeep() (in module winsound), 1842

- MessageClass (http.server.BaseHTTPRequestHandler attribute), 1276
- MessageError, 1036
- MessageParseError, 1036
- messages (in module xml.parsers.expat.errors), 1169
- meta path finder, 1906
- meta() (in module curses), 688
- meta_path (in module sys), 1669
- metaclass, 1906
- metaclass (2to3 fixer), 1582
- MetaPathFinder (class in importlib.abc), 1762
- metavar (optparse.Option attribute), 1877
- MetavarTypeHelpFormatter (class in argparse), 615
- Meter (class in tkinter.tix), 1435
- method, 1906
- object, 82
- method (urllib.request.Request attribute), 1198
- method resolution order, 1906
- METHOD_BLOWFISH (in module crypt), 1849
- method_calls (unittest.mock.Mock attribute), 1530
- METHOD_CRYPT (in module crypt), 1849
- METHOD_MD5 (in module crypt), 1849
- METHOD_SHA256 (in module crypt), 1849
- METHOD_SHA512 (in module crypt), 1849
- methodattrs (2to3 fixer), 1582
- methodcaller() (in module operator), 363
- MethodDescriptorType (in module types), 250
- methodHelp() (xmlrpc.client.ServerProxy.system method), 1295
- methods
- bytearray, 56
 - bytes, 56
 - string, 44
- methods (in module crypt), 1849
- methods (pyclbr.Class attribute), 1801
- methodSignature() (xmlrpc.client.ServerProxy.system method), 1294
- MethodType (in module types), 250
- MethodWrapperType (in module types), 250
- MH (class in mailbox), 1088
- MHMessage (class in mailbox), 1095
- microsecond (datetime.datetime attribute), 185
- microsecond (datetime.time attribute), 192
- MIME
- base64 encoding, 1103
 - content type, 1100
 - headers, 1101, 1175
 - quoted-printable encoding, 1109
- MIMEApplication (class in email.mime.application), 1062
- MIMEAudio (class in email.mime.audio), 1062
- MIMEBase (class in email.mime.base), 1061
- MIMEImage (class in email.mime.image), 1062
- MIMEMessage (class in email.mime.message), 1063
- MIMEMultipart (class in email.mime.multipart), 1061
- MIMENonMultipart (class in email.mime.nonmultipart), 1061
- MIMEPart (class in email.mime), 1022
- MIMEText (class in email.mime.text), 1063
- MimeTypes (class in mimetypes), 1102
- mimetypes (module), 1100
- MIMEVersionHeader (class in email.headerregistry), 1040
- min
- built-in function, 37
- min (datetime.date attribute), 180
- min (datetime.datetime attribute), 185
- min (datetime.time attribute), 192
- min (datetime.timedelta attribute), 177
- min() (built-in function), 15
- min() (decimal.Context method), 309
- min() (decimal.Decimal method), 302
- MIN_EMIN (in module decimal), 311
- MIN_ETINY (in module decimal), 311
- min_mag() (decimal.Context method), 309
- min_mag() (decimal.Decimal method), 302
- MINEQUAL (in module token), 1794
- MINIMUM_SUPPORTED (ssl.TLSVersion attribute), 962
- minimum_version (ssl.SSLContext attribute), 974
- minmax() (in module audioop), 1323
- minor (email.headerregistry.MIMEVersionHeader attribute), 1040
- minor() (in module os), 562
- MINUS (in module token), 1794
- minus() (decimal.Context method), 309
- minute (datetime.datetime attribute), 185
- minute (datetime.time attribute), 192
- MINYEAR (in module datetime), 175
- mirrored() (in module unicodedata), 143
- misc_header (cmd.Cmd attribute), 1394
- MISSING (contextvars.contextvars.Token.Token attribute), 840
- MISSING_C_DOCSTRINGS (in module test.support), 1588
- missing_compiler_executable() (in module test.support), 1596
- MissingSectionHeaderError, 517
- MIXERDEV, 1336
- mkd() (ftplib.FTP method), 1233
- mkdir() (in module os), 561
- mkdir() (pathlib.Path method), 381
- mkdtemp() (in module tempfile), 400
- mkfifo() (in module os), 562
- mknod() (in module os), 562
- mksalt() (in module crypt), 1849

- mkstemp() (in module tempfile), 400
- mktemp() (in module tempfile), 402
- mktime() (in module time), 603
- mktime_tz() (in module email.utils), 1070
- mlsd() (ftplib.FTP method), 1232
- mmap (class in mmap), 1009
- mmap (module), 1009
- MMDF (class in mailbox), 1090
- MMDFMessage (class in mailbox), 1097
- Mock (class in unittest.mock), 1524
- mock_add_spec() (unittest.mock.Mock method), 1527
- mock_calls (unittest.mock.Mock attribute), 1531
- mock_open() (in module unittest.mock), 1553
- mod() (in module operator), 361
- mode (io.FileIO attribute), 595
- mode (ossaudiodev.oss_audio_device attribute), 1338
- mode (tarfile.TarInfo attribute), 487
- mode() (in module statistics), 332
- mode() (in module turtle), 1383
- modes
 - file, 17
- modf() (in module math), 286
- modified() (urllib.robotparser.RobotFileParser method), 1219
- Modify() (msilib.View method), 1829
- modify() (select.devpoll method), 988
- modify() (select.epoll method), 989
- modify() (selectors.BaseSelector method), 994
- modify() (select.poll method), 990
- module, **1906**
 - __main__, 1757, 1758
 - __locale__, 1349
 - array, 53
 - base64, 1107
 - bdb, 1608
 - binhex, 1107
 - cmd, 1608
 - copy, 428
 - crypt, 1846
 - dbm.gnu, 430
 - dbm.ndbm, 430
 - errno, 89
 - glob, 404
 - imp, 25
 - math, 31, 293
 - os, 1845
 - pickle, 253, 428, 429, 432
 - pty, 552
 - pwd, 386
 - pyexpat, 1163
 - re, 44, 404
 - search path, 405, 1670, 1742
 - shelve, 432
 - signal, 837
 - sitecustomize, 1743
 - socket, 1173
 - stat, 567
 - string, 1355
 - struct, 945
 - sys, 18
 - types, 83
 - urllib.request, 1222
 - usercustomize, 1743
 - uu, 1107
- module (pyclbr.Class attribute), 1801
- module (pyclbr.Function attribute), 1800
- module spec, **1906**
- module_for_loader() (in module importlib.util), 1776
- module_from_spec() (in module importlib.util), 1775
- module_repr() (importlib.abc.Loader method), 1764
- ModuleFinder (class in modulefinder), 1756
- modulefinder (module), 1755
- ModuleInfo (class in pkgutil), 1753
- ModuleNotFoundError, 89
- modules (in module sys), 1670
- modules (modulefinder.ModuleFinder attribute), 1756
- modules_cleanup() (in module test.support), 1595
- modules_setup() (in module test.support), 1595
- ModuleSpec (class in importlib.machinery), 1773
- ModuleType (class in types), 250
- monotonic() (in module time), 603
- monotonic_ns() (in module time), 603
- month (datetime.date attribute), 180
- month (datetime.datetime attribute), 185
- month() (in module calendar), 210
- month_abbr (in module calendar), 210
- month_name (in module calendar), 210
- monthcalendar() (in module calendar), 210
- monthdatescalendar() (calendar.Calendar method), 207
- monthdays2calendar() (calendar.Calendar method), 207
- monthdayscalendar() (calendar.Calendar method), 207
- monthrange() (in module calendar), 209
- Morsel (class in http.cookies), 1281
- most_common() (collections.Counter method), 214
- mouseinterval() (in module curses), 688
- mousemask() (in module curses), 689
- move() (curses.panel.Panel method), 707
- move() (curses.window method), 696
- move() (in module shutil), 409
- move() (mmap.mmap method), 1011

- move() (tkinter.ttk.Treeview method), 1428
 move_to_end() (collections.OrderedDict method), 225
 MozillaCookieJar (class in http.cookiejar), 1287
 MRO, 1906
 mro() (class method), 84
 msg (http.client.HTTPResponse attribute), 1226
 msg (json.JSONDecodeError attribute), 1079
 msg (re.error attribute), 118
 msg (traceback.TracebackException attribute), 1718
 msg() (telnetlib.Telnet method), 1261
 msi, 1827
 msilib (module), 1827
 msvcr (module), 1832
 mt_interact() (telnetlib.Telnet method), 1261
 mtime (gzip.GzipFile attribute), 464
 mtime (tarfile.TarInfo attribute), 487
 mtime() (urllib.robotparser.RobotFileParser method), 1219
 mul() (in module audioop), 1323
 mul() (in module operator), 361
 MultiCall (class in xmlrpc.client), 1298
 MULTILINE (in module re), 114
 MultipartConversionError, 1036
 multiply() (decimal.Context method), 309
 multiprocessing (module), 763
 multiprocessing.connection (module), 793
 multiprocessing.dummy (module), 797
 multiprocessing.Manager() (in module multiprocessing.sharedctypes), 784
 multiprocessing.managers (module), 784
 multiprocessing.pool (module), 790
 multiprocessing.sharedctypes (module), 782
 mutable, 1906
 sequence types, 39
 MutableMapping (class in collections.abc), 229
 MutableMapping (class in typing), 1460
 MutableSequence (class in collections.abc), 229
 MutableSequence (class in typing), 1460
 MutableSet (class in collections.abc), 229
 MutableSet (class in typing), 1460
 mvderwin() (curses.window method), 696
 mvwin() (curses.window method), 696
 myrights() (imaplib.IMAP4 method), 1240
- ## N
- n N, --number=N
 timeit command line option, 1625
 N_TOKENS (in module token), 1794
 n_waiting (threading.Barrier attribute), 762
 name (codecs.CodecInfo attribute), 157
 name (contextvars.ContextVar attribute), 839
 name (doctest.DocTest attribute), 1485
 name (email.headerregistry.BaseHeader attribute), 1038
 name (hashlib.hash attribute), 527
 name (hmac.HMAC attribute), 537
 name (http.cookiejar.Cookie attribute), 1290
 name (importlib.abc.FileLoader attribute), 1767
 name (importlib.machinery.ExtensionFileLoader attribute), 1773
 name (importlib.machinery.ModuleSpec attribute), 1773
 name (importlib.machinery.SourceFileLoader attribute), 1772
 name (importlib.machinery.SourcelessFileLoader attribute), 1772
 name (in module os), 541
 NAME (in module token), 1794
 name (inspect.Parameter attribute), 1733
 name (io.FileIO attribute), 595
 name (multiprocessing.Process attribute), 770
 name (os.DirEntry attribute), 565
 name (ossaudiodev.oss_audio_device attribute), 1338
 name (pyclbr.Class attribute), 1801
 name (pyclbr.Function attribute), 1800
 name (tarfile.TarInfo attribute), 487
 name (threading.Thread attribute), 754
 name (xml.dom.Attr attribute), 1141
 name (xml.dom.DocumentType attribute), 1139
 name() (in module unicodedata), 142
 name2codepoint (in module html.entities), 1116
 named tuple, 1906
 NamedTemporaryFile() (in module tempfile), 399
 NamedTuple (class in typing), 1463
 namedtuple() (in module collections), 221
 NameError, 89
 namelist() (zipfile.ZipFile method), 476
 nameprep() (in module encodings.idna), 173
 namer (logging.handlers.BaseRotatingHandler attribute), 674
 namereplace_errors() (in module codecs), 161
 namespace, 1907
 Namespace (class in argparse), 634
 Namespace (class in multiprocessing.managers), 786
 namespace package, 1907
 namespace() (imaplib.IMAP4 method), 1240
 Namespace() (multiprocessing.managers.SyncManager method), 786
 NAMESPACE_DNS (in module uuid), 1265
 NAMESPACE_OID (in module uuid), 1265
 NAMESPACE_URL (in module uuid), 1265
 NAMESPACE_X500 (in module uuid), 1265
 NamespaceErr, 1143
 namespaceURI (xml.dom.Node attribute), 1137

- NaN, 11
- nan (in module cmath), 292
- nan (in module math), 289
- nanj (in module cmath), 293
- NannyNag, 1800
- napms() (in module curses), 689
- nargs (optparse.Option attribute), 1876
- nbytes (memoryview attribute), 73
- ndiff() (in module difflib), 130
- ndim (memoryview attribute), 74
- ne (2to3 fixer), 1582
- ne() (in module operator), 360
- needs_input (bz2.BZ2Decompressor attribute), 467
- needs_input (lzma.LZMADecompressor attribute), 471
- neg() (in module operator), 361
- nested scope, 1907
- netmask (ipaddress.IPv4Network attribute), 1312
- netmask (ipaddress.IPv6Network attribute), 1315
- NetmaskValueError, 1319
- netrc (class in netrc), 518
- netrc (module), 518
- NetrcParseError, 518
- netscape (http.cookiejar.CookiePolicy attribute), 1288
- network (ipaddress.IPv4Interface attribute), 1317
- network (ipaddress.IPv6Interface attribute), 1317
- Network News Transfer Protocol, 1243
- network_address (ipaddress.IPv4Network attribute), 1312
- network_address (ipaddress.IPv6Network attribute), 1315
- new() (in module hashlib), 526
- new() (in module hmac), 535
- new_alignment() (formatter.writer method), 1823
- new_child() (collections.ChainMap method), 211
- new_class() (in module types), 248
- new_event_loop() (asynchronousio.AbstractEventLoopPolicy method), 913
- new_event_loop() (in module asyncio), 875
- new_font() (formatter.writer method), 1823
- new_margin() (formatter.writer method), 1824
- new_module() (in module imp), 1891
- new_panel() (in module curses.panel), 707
- new_spacing() (formatter.writer method), 1824
- new_styles() (formatter.writer method), 1824
- newgroups() (nntplib.NNTP method), 1246
- NEWLINE (in module token), 1794
- newlines (io.TextIOBase attribute), 597
- newnews() (nntplib.NNTP method), 1246
- newpad() (in module curses), 689
- new-style class, 1907
- NewType() (in module typing), 1464
- newwin() (in module curses), 689
- next (2to3 fixer), 1582
- next (pdb command), 1612
- next() (built-in function), 16
- next() (nntplib.NNTP method), 1248
- next() (tarfile.TarFile method), 485
- next() (tkinter.ttk.Treeview method), 1428
- next_minus() (decimal.Context method), 309
- next_minus() (decimal.Decimal method), 302
- next_plus() (decimal.Context method), 309
- next_plus() (decimal.Decimal method), 303
- next_toward() (decimal.Context method), 309
- next_toward() (decimal.Decimal method), 303
- nextfile() (in module fileinput), 390
- nextkey() (dbm.gnu.gdbm method), 435
- nextSibling (xml.dom.Node attribute), 1137
- ngettext() (gettext.GNUTranslations method), 1345
- ngettext() (gettext.NullTranslations method), 1344
- ngettext() (in module gettext), 1342
- nice() (in module os), 578
- nis (module), 1860
- NL (in module token), 1795
- nl() (in module curses), 689
- nl_langinfo() (in module locale), 1351
- nlargest() (in module heapq), 232
- nlst() (ftplib.FTP method), 1232
- NNTP
 - protocol, 1243
- NNTP (class in nntplib), 1244
- nntp_implementation (nntplib.NNTP attribute), 1245
- NNTP_SSL (class in nntplib), 1244
- nntp_version (nntplib.NNTP attribute), 1245
- NNTPDataError, 1245
- NNTPError, 1244
- nntplib (module), 1243
- NNTPPermanentError, 1244
- NNTPProtocolError, 1245
- NNTPReplyError, 1244
- NNTPTemporaryError, 1244
- no_proxy, 1196
- no_tracing() (in module test.support), 1594
- no_type_check() (in module typing), 1465
- no_type_check_decorator() (in module typing), 1465
- nocbreak() (in module curses), 689
- NoDataAllowedErr, 1143
- node() (in module platform), 708
- nodelay() (curses.window method), 696
- nodeName (xml.dom.Node attribute), 1137
- NodeTransformer (class in ast), 1790
- nodeType (xml.dom.Node attribute), 1136
- nodeValue (xml.dom.Node attribute), 1137
- NodeVisitor (class in ast), 1790

- noecho() (in module curses), 689
 NOEXPR (in module locale), 1352
 NoModificationAllowedErr, 1143
 nonblock() (ossaudiodev.oss_audio_device method), 1337
 NonCallableMagicMock (class in unittest.mock), 1548
 NonCallableMock (class in unittest.mock), 1532
 None (Built-in object), 29
 None (built-in variable), 27
 nonl() (in module curses), 689
 nonzero (2to3 fixer), 1582
 noop() (imaplib.IMAP4 method), 1240
 noop() (poplib.POP3 method), 1235
 NoOptionError, 517
 NOP (opcode), 1810
 noqiflush() (in module curses), 689
 noraw() (in module curses), 689
 NoReturn (in module typing), 1465
 NORMAL_PRIORITY_CLASS (in module subprocess), 825
 normalize() (decimal.Context method), 309
 normalize() (decimal.Decimal method), 303
 normalize() (in module locale), 1354
 normalize() (in module unicodedata), 143
 normalize() (xml.dom.Node method), 1138
 NORMALIZE_WHITESPACE (in module doctest), 1476
 normalvariate() (in module random), 326
 normcase() (in module os.path), 387
 normpath() (in module os.path), 388
 NoSectionError, 517
 NoSuchMailboxError, 1099
 not
 operator, 29
 not in
 operator, 30, 37
 not_() (in module operator), 360
 NotADirectoryError, 93
 notationDecl() (xml.sax.handler.DTDHandler method), 1157
 NotationDeclHandler() (xml.parsers.expat.xmlparser method), 1166
 notations (xml.dom.DocumentType attribute), 1139
 NotConnected, 1223
 Notebook (class in tkinter.tix), 1436
 Notebook (class in tkinter.ttk), 1422
 NotEmptyError, 1099
 NOTEQUAL (in module token), 1794
 NotFoundErr, 1143
 notify() (asyncio.Condition method), 865
 notify() (threading.Condition method), 758
 notify_all() (asyncio.Condition method), 865
 notify_all() (threading.Condition method), 758
 notimeout() (curses.window method), 696
 NotImplemented (built-in variable), 27
 NotImplementedError, 89
 NotStandaloneHandler()
 (xml.parsers.expat.xmlparser method), 1167
 NotSupportedErr, 1143
 NotSupportedError, 452
 noutrefresh() (curses.window method), 696
 now() (datetime.datetime class method), 183
 NSIG (in module signal), 1004
 nsmallest() (in module heapq), 232
 NT_OFFSET (in module token), 1794
 NTEventLogHandler (class in logging.handlers), 680
 ntohl() (in module socket), 936
 ntohs() (in module socket), 936
 ntransfercmd() (ftplib.FTP method), 1232
 nullcontext() (in module contextlib), 1698
 NullFormatter (class in formatter), 1823
 NullHandler (class in logging), 673
 NullImporter (class in imp), 1894
 NullTranslations (class in gettext), 1343
 NullWriter (class in formatter), 1824
 num_addresses (ipaddress.IPv4Network attribute), 1312
 num_addresses (ipaddress.IPv6Network attribute), 1315
 Number (class in numbers), 281
 NUMBER (in module token), 1794
 number_class() (decimal.Context method), 309
 number_class() (decimal.Decimal method), 303
 numbers (module), 281
 numerator (fractions.Fraction attribute), 322
 numerator (numbers.Rational attribute), 282
 numeric
 conversions, 31
 literals, 31
 object, 30
 types, operations on, 31
 numeric() (in module unicodedata), 143
 Numerical Python, 22
 numinput() (in module turtle), 1383
 numliterals (2to3 fixer), 1582
- ## O
- o <output>, -output=<output>
 zipapp command line option, 1652
 -o, -output=<file>
 pickletools command line option, 1820
 O_APPEND (in module os), 551
 O_ASYNC (in module os), 551
 O_BINARY (in module os), 551
 O_CLOEXEC (in module os), 551
 O_CREAT (in module os), 551

- `O_DIRECT` (in module `os`), 551
- `O_DIRECTORY` (in module `os`), 551
- `O_DSYNC` (in module `os`), 551
- `O_EXCL` (in module `os`), 551
- `O_EXLOCK` (in module `os`), 551
- `O_NDELAY` (in module `os`), 551
- `O_NOATIME` (in module `os`), 551
- `O_NOCTTY` (in module `os`), 551
- `O_NOFOLLOW` (in module `os`), 551
- `O_NOINHERIT` (in module `os`), 551
- `O_NONBLOCK` (in module `os`), 551
- `O_PATH` (in module `os`), 551
- `O_RANDOM` (in module `os`), 551
- `O_RDONLY` (in module `os`), 551
- `O_RDWR` (in module `os`), 551
- `O_RSYNC` (in module `os`), 551
- `O_SEQUENTIAL` (in module `os`), 551
- `O_SHLOCK` (in module `os`), 551
- `O_SHORT_LIVED` (in module `os`), 551
- `O_SYNC` (in module `os`), 551
- `O_TEMPORARY` (in module `os`), 551
- `O_TEXT` (in module `os`), 551
- `O_TMPFILE` (in module `os`), 551
- `O_TRUNC` (in module `os`), 551
- `O_WRONLY` (in module `os`), 551
- `obj` (memoryview attribute), 73
- `object`, 1907
 - Boolean, 30
 - bytearray, 39, 53, 55
 - bytes, 53, 54
 - code, 83, 432
 - complex number, 30
 - dictionary, 77
 - floating point, 30
 - integer, 30
 - `io.StringIO`, 44
 - list, 39, 40
 - mapping, 77
 - memoryview, 53
 - method, 82
 - numeric, 30
 - range, 42
 - sequence, 37
 - set, 74
 - socket, 927
 - string, 43
 - traceback, 1662, 1715
 - tuple, 39, 41
 - type, 24
- `object` (built-in class), 16
- `object` (`UnicodeError` attribute), 92
- `objects`
 - comparing, 30
 - flattening, 415
 - marshalling, 415
 - persistent, 415
 - pickling, 415
 - serializing, 415
- `obufcount()` (`ossaudiodev.oss_audio_device` method), 1338
- `obuffree()` (`ossaudiodev.oss_audio_device` method), 1338
- `oct()` (built-in function), 16
- `octal`
 - literals, 31
- `octdigits` (in module `string`), 97
- `offset` (`traceback.TracebackException` attribute), 1718
- `offset` (`xml.parsers.expat.ExpatError` attribute), 1168
- `OK` (in module `curses`), 698
- `old_value` (`contextvars.contextvars.Token.Token` attribute), 840
- `OleDLL` (class in `ctypes`), 737
- `onclick()` (in module `turtle`), 1376, 1382
- `ondrag()` (in module `turtle`), 1377
- `onecmd()` (`cmd.Cmd` method), 1393
- `onkey()` (in module `turtle`), 1381
- `onkeypress()` (in module `turtle`), 1381
- `onkeyrelease()` (in module `turtle`), 1381
- `onrelease()` (in module `turtle`), 1376
- `onscreenclick()` (in module `turtle`), 1382
- `ontimer()` (in module `turtle`), 1382
- `OP` (in module `token`), 1794
- `OP_ALL` (in module `ssl`), 959
- `OP_CIPHER_SERVER_PREFERENCE` (in module `ssl`), 960
- `OP_ENABLE_MIDDLEBOX_COMPAT` (in module `ssl`), 960
- `OP_NO_COMPRESSION` (in module `ssl`), 960
- `OP_NO_RENEGOTIATION` (in module `ssl`), 960
- `OP_NO_SSLv2` (in module `ssl`), 959
- `OP_NO_SSLv3` (in module `ssl`), 959
- `OP_NO_TICKET` (in module `ssl`), 960
- `OP_NO_TLSv1` (in module `ssl`), 959
- `OP_NO_TLSv1_1` (in module `ssl`), 959
- `OP_NO_TLSv1_2` (in module `ssl`), 959
- `OP_NO_TLSv1_3` (in module `ssl`), 959
- `OP_SINGLE_DH_USE` (in module `ssl`), 960
- `OP_SINGLE_ECDH_USE` (in module `ssl`), 960
- `open()` (built-in function), 16
- `open()` (`imaplib.IMAP4` method), 1240
- `open()` (in module `aifc`), 1324
- `open()` (in module `bz2`), 465
- `open()` (in module `codecs`), 158
- `open()` (in module `dbm`), 433
- `open()` (in module `dbm.dumb`), 437
- `open()` (in module `dbm.gnu`), 435
- `open()` (in module `dbm.ndbm`), 436

- open() (in module gzip), 463
- open() (in module io), 589
- open() (in module lzma), 468
- open() (in module os), 550
- open() (in module ossaudiodev), 1335
- open() (in module shelve), 429
- open() (in module sunau), 1327
- open() (in module tarfile), 482
- open() (in module tokenize), 1796
- open() (in module wave), 1329
- open() (in module webbrowser), 1173
- open() (pathlib.Path method), 381
- open() (pipes.Template method), 1856
- open() (tarfile.TarFile class method), 485
- open() (telnetlib.Telnet method), 1261
- open() (urllib.request.OpenerDirector method), 1199
- open() (urllib.request.URLOpener method), 1209
- open() (webbrowser.controller method), 1175
- open() (zipfile.ZipFile method), 476
- open_binary() (in module importlib.resources), 1769
- open_connection() (in module asyncio), 857
- open_new() (in module webbrowser), 1174
- open_new() (webbrowser.controller method), 1175
- open_new_tab() (in module webbrowser), 1174
- open_new_tab() (webbrowser.controller method), 1175
- open_oshandle() (in module msvcrt), 1833
- open_resource() (importlib.abc.ResourceReader method), 1765
- open_text() (in module importlib.resources), 1769
- open_unix_connection() (in module asyncio), 857
- open_unknown() (urllib.request.URLOpener method), 1209
- open_urlresource() (in module test.support), 1594
- OpenDatabase() (in module msilib), 1827
- OpenerDirector (class in urllib.request), 1196
- openfp() (in module sunau), 1327
- openfp() (in module wave), 1330
- OpenKey() (in module winreg), 1837
- OpenKeyEx() (in module winreg), 1837
- openlog() (in module syslog), 1861
- openmixer() (in module ossaudiodev), 1336
- openpty() (in module os), 551
- openpty() (in module pty), 1852
- OpenSSL
 - (use in module hashlib), 525
 - (use in module ssl), 950
- OPENSSL_VERSION (in module ssl), 961
- OPENSSL_VERSION_INFO (in module ssl), 962
- OPENSSL_VERSION_NUMBER (in module ssl), 962
- OpenView() (msilib.Database method), 1828
- operation
 - concatenation, 37
 - repetition, 37
 - slice, 37
 - subscript, 37
- OperationalError, 452
- operations
 - bitwise, 32
 - Boolean, 29
 - masking, 32
 - shifting, 32
- operations on
 - dictionary type, 77
 - integer types, 32
 - list type, 39
 - mapping types, 77
 - numeric types, 31
 - sequence types, 37, 39
- operator
 - (minus), 31
 - % (percent), 31
 - & (ampersand), 32
 - * (asterisk), 31
 - **, 31
 - + (plus), 31
 - / (slash), 31
 - //, 31
 - < (less), 30
 - <<, 32
 - <=, 30
 - !=, 30
 - ==, 30
 - > (greater), 30
 - >=, 30
 - >>, 32
 - ^ (caret), 32
 - | (vertical bar), 32
 - ~ (tilde), 32
 - and, 29
 - comparison, 30
 - in, 30, 37
 - is, 30
 - is not, 30
 - not, 29
 - not in, 30, 37
 - or, 29
- operator (2to3 fixer), 1583
- operator (module), 359
- opmap (in module dis), 1819
- opname (in module dis), 1819
- optim_args_from_interpreter_flags() (in module test.support), 1591
- optimize() (in module pickletools), 1820
- OPTIMIZED_BYTECODE_SUFFIXES (in module importlib.machinery), 1770
- Optional (in module typing), 1465

OptionGroup (class in optparse), 1870
OptionMenu (class in tkinter.tix), 1435
OptionParser (class in optparse), 1874
Options (class in ssl), 960
options (doctest.Example attribute), 1485
options (ssl.SSLContext attribute), 974
options() (configparser.ConfigParser method), 514
optionxform() (configparser.ConfigParser method), 510, 516
optparse (module), 1863
or
 operator, 29
or_() (in module operator), 361
ord() (built-in function), 19
ordered_attributes (xml.parsers.expat.xmlparser attribute), 1165
OrderedDict (class in collections), 224
OrderedDict (class in typing), 1461
origin (importlib.machinery.ModuleSpec attribute), 1774
origin_req_host (urllib.request.Request attribute), 1198
origin_server (wsgiref.handlers.BaseHandler attribute), 1191
os
 module, 1845
os (module), 541
os_environ (wsgiref.handlers.BaseHandler attribute), 1190
OSError, 89
os.path (module), 384
ossaudiodev (module), 1335
OSSAudioError, 1335
outfile
 json.tool command line option, 1081
output (subprocess.CalledProcessError attribute), 816
output (subprocess.TimeoutExpired attribute), 816
output (unittest.TestCase attribute), 1507
output() (http.cookies.BaseCookie method), 1281
output() (http.cookies.Morsel method), 1282
output_charset (email.charset.Charset attribute), 1066
output_charset() (gettext.NullTranslations method), 1344
output_codec (email.charset.Charset attribute), 1067
output_difference() (doctest.OutputChecker method), 1488
OutputChecker (class in doctest), 1488
OutputString() (http.cookies.Morsel method), 1282
over() (nntplib.NNTP method), 1247
Overflow (class in decimal), 312
OverflowError, 90

overlaps() (ipaddress.IPv4Network method), 1313
overlaps() (ipaddress.IPv6Network method), 1315
overlay() (curses.window method), 696
overload() (in module typing), 1464
overwrite() (curses.window method), 696
owner() (pathlib.Path method), 381

P

p (pdb command), 1612
-p <interpreter>, -python=<interpreter>
 zipapp command line option, 1653
-p, -pattern pattern
 unittest-discover command line option, 1496
-p, -preamble=<preamble>
 pickletools command line option, 1820
-p, -process
 timeit command line option, 1625
P_ALL (in module os), 582
P_DETACH (in module os), 580
P_NOWAIT (in module os), 580
P_NOWAITO (in module os), 580
P_OVERLAY (in module os), 580
P_PGID (in module os), 582
P_PID (in module os), 582
P_WAIT (in module os), 580
pack() (in module struct), 151
pack() (mailbox.MH method), 1089
pack() (struct.Struct method), 156
pack_array() (xdrlib.Packer method), 520
pack_bytes() (xdrlib.Packer method), 520
pack_double() (xdrlib.Packer method), 519
pack_farray() (xdrlib.Packer method), 520
pack_float() (xdrlib.Packer method), 519
pack_fopaque() (xdrlib.Packer method), 519
pack_fstring() (xdrlib.Packer method), 519
pack_into() (in module struct), 152
pack_into() (struct.Struct method), 156
pack_list() (xdrlib.Packer method), 520
pack_opaque() (xdrlib.Packer method), 519
pack_string() (xdrlib.Packer method), 519
package, 1742, 1907
Package (in module importlib.resources), 1768
packed (ipaddress.IPv4Address attribute), 1308
packed (ipaddress.IPv6Address attribute), 1309
Packer (class in xdrlib), 519
packing
 binary data, 151
packing (widgets), 1409
PAGER, 1468
pair_content() (in module curses), 689
pair_number() (in module curses), 690
PanedWindow (class in tkinter.tix), 1436
parameter, 1907
Parameter (class in inspect), 1733

- ParameterizedMIMEHeader (class in email.headerregistry), 1040
- parameters (inspect.Signature attribute), 1732
- params (email.headerregistry.ParameterizedMIMEHeader attribute), 1040
- pardir (in module os), 586
- paren (2to3 fixer), 1583
- parent (importlib.machinery.ModuleSpec attribute), 1774
- parent (pyclbr.Class attribute), 1801
- parent (pyclbr.Function attribute), 1800
- parent (urllib.request.BaseHandler attribute), 1200
- parent() (tkinter.ttk.Treeview method), 1428
- parentNode (xml.dom.Node attribute), 1136
- parents (collections.ChainMap attribute), 211
- paretovariate() (in module random), 326
- parse() (doctest.DocTestParser method), 1487
- parse() (email.parser.BytesParser method), 1024
- parse() (email.parser.Parser method), 1025
- parse() (in module ast), 1789
- parse() (in module cgi), 1179
- parse() (in module xml.dom.minidom), 1145
- parse() (in module xml.dom.pulldom), 1150
- parse() (in module xml.etree.ElementTree), 1126
- parse() (in module xml.sax), 1151
- parse() (string.Formatter method), 98
- parse() (urllib.robotparser.RobotFileParser method), 1219
- parse() (xml.etree.ElementTree.ElementTree method), 1130
- Parse() (xml.parsers.expat.xmlparser method), 1164
- parse() (xml.sax.xmlreader.XMLReader method), 1159
- parse_and_bind() (in module readline), 146
- parse_args() (argparse.ArgumentParser method), 631
- PARSE_COLNAMES (in module sqlite3), 439
- parse_config_h() (in module sysconfig), 1679
- PARSE_DECLTYPES (in module sqlite3), 439
- parse_header() (in module cgi), 1179
- parse_intermixed_args() (argparse.ArgumentParser method), 641
- parse_known_args() (argparse.ArgumentParser method), 640
- parse_known_intermixed_args() (argparse.ArgumentParser method), 641
- parse_multipart() (in module cgi), 1179
- parse_qs() (in module cgi), 1179
- parse_qs() (in module urllib.parse), 1212
- parse_qsl() (in module cgi), 1179
- parse_qsl() (in module urllib.parse), 1213
- parseaddr() (in module email.utils), 1069
- parsebytes() (email.parser.BytesParser method), 1024
- parsedate() (in module email.utils), 1070
- parsedate_to_datetime() (in module email.utils), 1070
- parsedate_tz() (in module email.utils), 1070
- ParseError (class in xml.etree.ElementTree), 1133
- ParseFile() (xml.parsers.expat.xmlparser method), 1164
- ParseFlags() (in module imaplib), 1238
- Parser (class in email.parser), 1024
- parser (module), 1781
- ParserCreate() (in module xml.parsers.expat), 1163
- ParserError, 1784
- ParseResult (class in urllib.parse), 1215
- ParseResultBytes (class in urllib.parse), 1216
- parsestr() (email.parser.Parser method), 1025
- parseString() (in module xml.dom.minidom), 1145
- parseString() (in module xml.dom.pulldom), 1150
- parseString() (in module xml.sax), 1151
- parsing
- Python source code, 1781
 - URL, 1211
- ParsingError, 517
- partial (asyncio.IncompleteReadError attribute), 875
- partial() (imaplib.IMAP4 method), 1240
- partial() (in module functools), 354
- partialmethod (class in functools), 355
- parties (threading.Barrier attribute), 762
- partition() (bytearray method), 57
- partition() (bytes method), 57
- partition() (str method), 48
- pass__() (poplib.POP3 method), 1235
- Paste, 1442
- patch() (in module test.support), 1596
- patch() (in module unittest.mock), 1537
- patch.dict() (in module unittest.mock), 1541
- patch.multiple() (in module unittest.mock), 1542
- patch.object() (in module unittest.mock), 1540
- patch.stopall() (in module unittest.mock), 1544
- PATH, 576, 580, 586, 1173, 1180, 1182
- path
- configuration file, 1742
 - module search, 405, 1670, 1742
 - operations, 367, 384
- Path (class in pathlib), 377
- path (http.cookiejar.Cookie attribute), 1291
- path (http.server.BaseHTTPRequestHandler attribute), 1275
- path (importlib.abc.FileLoader attribute), 1767
- path (importlib.machinery.ExtensionFileLoader attribute), 1773
- path (importlib.machinery.FileFinder attribute), 1771
- path (importlib.machinery.SourceFileLoader attribute), 1772

- ul style="list-style-type: none; padding-left: 0;">
- path (importlib.machinery.SourcelessFileLoader attribute), 1772
- path (in module sys), 1670
- path (os.DirEntry attribute), 566
- path based finder, **1908**
- Path browser, 1439
- path entry, **1908**
- path entry finder, **1908**
- path entry hook, **1908**
- path() (in module importlib.resources), 1769
- path_hook() (importlib.machinery.FileFinder class method), 1772
- path_hooks (in module sys), 1670
- path_importer_cache (in module sys), 1670
- path_mtime() (importlib.abc.SourceLoader method), 1767
- path_return_ok() (http.cookiejar.CookiePolicy method), 1288
- path_stats() (importlib.abc.SourceLoader method), 1767
- path_stats() (importlib.machinery.SourceFileLoader method), 1772
- pathconf() (in module os), 563
- pathconf_names (in module os), 563
- PathEntryFinder (class in importlib.abc), 1763
- PathFinder (class in importlib.machinery), 1771
- pathlib (module), 367
- PathLike (class in os), 543
- path-like object, **1908**
- pathname2url() (in module urllib.request), 1194
- pathsep (in module os), 586
- Pattern (class in typing), 1463
- pattern (re.error attribute), 118
- pattern (re.Pattern attribute), 119
- pause() (in module signal), 1005
- pause_reading() (asyncio.ReadTransport method), 901
- pause_writing() (asyncio.BaseProtocol method), 904
- PAX_FORMAT (in module tarfile), 484
- pax_headers (tarfile.TarFile attribute), 487
- pax_headers (tarfile.TarInfo attribute), 488
- pbkdf2_hmac() (in module hashlib), 527
- pd() (in module turtle), 1368
- Pdb (class in pdb), 1608, 1609
- pdb (module), 1607
- .pdbrc
 - file, 1610
- peek() (bz2.BZ2File method), 466
- peek() (gzip.GzipFile method), 464
- peek() (io.BufferedReader method), 596
- peek() (lzma.LZMAFile method), 469
- peek() (weakref.finalize method), 244
- peer (smtpd.SMTPChannel attribute), 1259
- PEM_cert_to_DER_cert() (in module ssl), 955
- pen() (in module turtle), 1369
- pencolor() (in module turtle), 1370
- pending (ssl.MemoryBIO attribute), 982
- pending() (ssl.SSLSocket method), 966
- PendingDeprecationWarning, 94
- pendown() (in module turtle), 1368
- pensize() (in module turtle), 1369
- penup() (in module turtle), 1369
- PEP, **1908**
- PERCENT (in module token), 1794
- PERCENTEQUAL (in module token), 1794
- perf_counter() (in module time), 603
- perf_counter_ns() (in module time), 604
- Performance, 1622
- PermissionError, 93
- permutations() (in module itertools), 344
- Persist() (msilib.SummaryInformation method), 1829
- persistence, 415
- persistent
 - objects, 415
- persistent_id (pickle protocol), 422
- persistent_id() (pickle.Pickler method), 418
- persistent_load (pickle protocol), 422
- persistent_load() (pickle.Unpickler method), 419
- PF_CAN (in module socket), 931
- PF_PACKET (in module socket), 932
- PF_RDS (in module socket), 932
- pformat() (in module pprint), 254
- pformat() (pprint.PrettyPrinter method), 255
- PGO (in module test.support), 1587
- phase() (in module cmath), 290
- pi (in module cmath), 292
- pi (in module math), 289
- pickle
 - module, 253, 428, 429, 432
- pickle (module), 415
- pickle() (in module copyreg), 428
- PickleError, 418
- Pickler (class in pickle), 418
- pickletools (module), 1819
- pickletools command line option
 - a, -annotate, 1820
 - l, -indentlevel=<num>, 1820
 - m, -memo, 1820
 - o, -output=<file>, 1820
 - p, -preamble=<preamble>, 1820
- pickling
 - objects, 415
- PicklingError, 418
- pid (asyncio.asyncio.subprocess.Process attribute), 870
- pid (multiprocessing.Process attribute), 771
- pid (subprocess.Popen attribute), 823

- PIPE (in module subprocess), 815
- Pipe() (in module multiprocessing), 773
- pipe() (in module os), 552
- pipe2() (in module os), 552
- PIPE_BUF (in module select), 987
- pipe_connection_lost() (asyncio.SubprocessProtocol method), 906
- pipe_data_received() (asyncio.SubprocessProtocol method), 906
- PIPE_MAX_SIZE (in module test.support), 1588
- pipes (module), 1855
- PKG_DIRECTORY (in module imp), 1894
- pkgutil (module), 1753
- placeholder (textwrap.TextWrapper attribute), 142
- platform (in module sys), 1670
- platform (module), 708
- platform() (in module platform), 708
- PlaySound() (in module winsound), 1842
- plist
 - file, 521
- plistlib (module), 521
- plock() (in module os), 578
- PLUS (in module token), 1794
- plus() (decimal.Context method), 309
- PLUSEQUAL (in module token), 1794
- pm() (in module pdb), 1609
- POINTER() (in module ctypes), 744
- pointer() (in module ctypes), 744
- polar() (in module cmath), 290
- Policy (class in email.policy), 1031
- poll() (in module select), 986
- poll() (multiprocessing.connection.Connection method), 777
- poll() (select.devpoll method), 988
- poll() (select.epoll method), 989
- poll() (select.poll method), 990
- poll() (subprocess.Popen method), 821
- PollSelector (class in selectors), 994
- Pool (class in multiprocessing.pool), 790
- pop() (array.array method), 240
- pop() (collections.deque method), 217
- pop() (dict method), 79
- pop() (frozenset method), 76
- pop() (mailbox.Mailbox method), 1085
- pop() (sequence method), 39
- POP3
 - protocol, 1234
- POP3 (class in poplib), 1234
- POP3_SSL (class in poplib), 1234
- pop_alignment() (formatter.formatter method), 1822
- pop_all() (contextlib.ExitStack method), 1702
- POP_BLOCK (opcode), 1813
- POP_EXCEPT (opcode), 1813
- pop_font() (formatter.formatter method), 1822
- POP_JUMP_IF_FALSE (opcode), 1816
- POP_JUMP_IF_TRUE (opcode), 1816
- pop_margin() (formatter.formatter method), 1823
- pop_source() (shlex.shlex method), 1399
- pop_style() (formatter.formatter method), 1823
- POP_TOP (opcode), 1810
- Popen (class in subprocess), 817
- popen() (in module os), 579, 987
- popen() (in module platform), 710
- popitem() (collections.OrderedDict method), 225
- popitem() (dict method), 79
- popitem() (mailbox.Mailbox method), 1085
- popleft() (collections.deque method), 217
- poplib (module), 1234
- PopupMenu (class in tkinter.tix), 1435
- port (http.cookiejar.Cookie attribute), 1291
- port_specified (http.cookiejar.Cookie attribute), 1291
- portion, 1908
- pos (json.JSONDecodeError attribute), 1079
- pos (re.error attribute), 118
- pos (re.Match attribute), 122
- pos() (in module operator), 361
- pos() (in module turtle), 1367
- position (xml.etree.ElementTree.ParseError attribute), 1134
- position() (in module turtle), 1367
- positional argument, 1908
- POSIX
 - I/O control, 1850
 - threads, 836
- posix (module), 1845
- POSIX_FADV_DONTNEED (in module os), 552
- POSIX_FADV_NOREUSE (in module os), 552
- POSIX_FADV_NORMAL (in module os), 552
- POSIX_FADV_RANDOM (in module os), 552
- POSIX_FADV_SEQUENTIAL (in module os), 552
- POSIX_FADV_WILLNEED (in module os), 552
- posix_fadvise() (in module os), 552
- posix_fallocate() (in module os), 552
- POSIXLY_CORRECT, 643
- PosixPath (class in pathlib), 377
- post() (nntplib.NNTP method), 1249
- post() (ossaudiodev.oss_audio_device method), 1337
- post_handshake_auth (ssl.SSLContext attribute), 974
- post_mortem() (in module pdb), 1609
- post_setup() (venv.EnvBuilder method), 1647
- postcmd() (cmd.Cmd method), 1393
- postloop() (cmd.Cmd method), 1393
- pow() (built-in function), 19
- pow() (in module math), 287

- `pow()` (in module `operator`), 361
- `power()` (`decimal.Context` method), 310
- `pp` (`pdb` command), 1612
- `pprint` (module), 253
- `pprint()` (in module `pprint`), 254
- `pprint()` (`pprint.PrettyPrinter` method), 255
- `prcal()` (in module `calendar`), 210
- `pread()` (in module `os`), 552
- `preadv()` (in module `os`), 552
- `preamble` (`email.message.EmailMessage` attribute), 1022
- `preamble` (`email.message.Message` attribute), 1060
- `precmd()` (`cmd.Cmd` method), 1393
- `prefix` (in module `sys`), 1671
- `prefix` (`xml.dom.Attr` attribute), 1141
- `prefix` (`xml.dom.Node` attribute), 1137
- `prefix` (`zipimport.zipimporter` attribute), 1752
- `PREFIXES` (in module `site`), 1744
- `prefixlen` (`ipaddress.IPv4Network` attribute), 1312
- `prefixlen` (`ipaddress.IPv6Network` attribute), 1315
- `preloop()` (`cmd.Cmd` method), 1393
- `prepare()` (`logging.handlers.QueueHandler` method), 683
- `prepare()` (`logging.handlers.QueueListener` method), 684
- `prepare_class()` (in module `types`), 248
- `prepare_input_source()` (in module `xml.sax.saxutils`), 1158
- `prepend()` (`pipes.Template` method), 1856
- `PrettyPrinter` (class in `pprint`), 254
- `prev()` (`tkinter.ttk.Treeview` method), 1428
- `previousSibling` (`xml.dom.Node` attribute), 1136
- `print` (2to3 fixer), 1583
- `print()` (built-in function), 19
- `print_callees()` (`pstats.Stats` method), 1620
- `print_callers()` (`pstats.Stats` method), 1620
- `print_directory()` (in module `cgi`), 1179
- `print_enviro()` (in module `cgi`), 1179
- `print_enviro_usage()` (in module `cgi`), 1180
- `print_exc()` (in module `traceback`), 1716
- `print_exc()` (`timeit.Timer` method), 1624
- `print_exception()` (in module `traceback`), 1716
- `PRINT_EXPR` (opcode), 1812
- `print_form()` (in module `cgi`), 1179
- `print_help()` (`argparse.ArgumentParser` method), 640
- `print_last()` (in module `traceback`), 1716
- `print_stack()` (`asyncio.Task` method), 855
- `print_stack()` (in module `traceback`), 1716
- `print_stats()` (`profile.Profile` method), 1617
- `print_stats()` (`pstats.Stats` method), 1619
- `print_tb()` (in module `traceback`), 1715
- `print_usage()` (`argparse.ArgumentParser` method), 640
- `print_usage()` (`optparse.OptionParser` method), 1883
- `print_version()` (`optparse.OptionParser` method), 1872
- `printable` (in module `string`), 97
- `printdir()` (`zipfile.ZipFile` method), 477
- `printf-style formatting`, 51, 66
- `PRIOPGRP` (in module `os`), 545
- `PRIOPROCESS` (in module `os`), 545
- `PRIOUSER` (in module `os`), 545
- `PriorityQueue` (class in `asyncio`), 872
- `PriorityQueue` (class in `queue`), 833
- `prlimit()` (in module `resource`), 1857
- `prmonth()` (`calendar.TextCalendar` method), 207
- `prmonth()` (in module `calendar`), 210
- `ProactorEventLoop` (class in `asyncio`), 892
- `process`
 - `group`, 544
 - `id`, 544
 - `id of parent`, 544
 - `killing`, 578
 - `scheduling priority`, 545, 546
 - `signalling`, 578
- `Process` (class in `multiprocessing`), 770
- `process()` (`logging.LoggerAdapter` method), 656
- `process_exited()` (`asyncio.SubprocessProtocol` method), 906
- `process_message()` (`smtpd.SMTPServer` method), 1257
- `process_request()` (`socketserver.BaseServer` method), 1270
- `process_time()` (in module `time`), 604
- `process_time_ns()` (in module `time`), 604
- `process_tokens()` (in module `tabnanny`), 1800
- `ProcessError`, 772
- `processes`, light-weight, 836
- `ProcessingInstruction()` (in module `xml.etree.ElementTree`), 1126
- `processingInstruction()` (`xml.sax.handler.ContentHandler` method), 1156
- `ProcessingInstructionHandler()` (`xml.parsers.expat.xmlparser` method), 1166
- `ProcessLookupError`, 93
- `processor time`, 601, 604, 607
- `processor()` (in module `platform`), 709
- `ProcessPoolExecutor` (class in `concurrent.futures`), 810
- `product()` (in module `itertools`), 345
- `Profile` (class in `profile`), 1617
- `profile` (module), 1616
- `profile function`, 752, 1666, 1671
- `profiler`, 1666, 1671
- `profiling`, deterministic, 1614

- ProgrammingError, 452
- Progressbar (class in tkinter.ttk), 1423
- prompt (cmd.Cmd attribute), 1394
- prompt_user_passwd() (url-lib.request.FancyURLopener method), 1210
- prompts, interpreter, 1671
- propagate (logging.Logger attribute), 646
- property (built-in class), 19
- property list, 521
- property_declaration_handler (in module xml.sax.handler), 1154
- property_dom_node (in module xml.sax.handler), 1154
- property_lexical_handler (in module xml.sax.handler), 1154
- property_xml_string (in module xml.sax.handler), 1154
- PropertyMock (class in unittest.mock), 1533
- prot_c() (ftplib.FTP_TLS method), 1233
- prot_p() (ftplib.FTP_TLS method), 1233
- proto (socket.socket attribute), 945
- protocol
 - CGI, 1175
 - context management, 81
 - copy, 421
 - FTP, 1210, 1228
 - HTTP, 1175, 1210, 1220, 1222, 1274
 - IMAP4, 1236
 - IMAP4_SSL, 1236
 - IMAP4_stream, 1236
 - iterator, 36
 - NNTP, 1243
 - POP3, 1234
 - SMTP, 1250
 - Telnet, 1260
- Protocol (class in asyncio), 903
- protocol (ssl.SSLContext attribute), 974
- PROTOCOL_SSLv2 (in module ssl), 958
- PROTOCOL_SSLv3 (in module ssl), 958
- PROTOCOL_SSLv23 (in module ssl), 958
- PROTOCOL_TLS (in module ssl), 958
- PROTOCOL_TLS_CLIENT (in module ssl), 958
- PROTOCOL_TLS_SERVER (in module ssl), 958
- PROTOCOL_TLSv1 (in module ssl), 958
- PROTOCOL_TLSv1_1 (in module ssl), 958
- PROTOCOL_TLSv1_2 (in module ssl), 959
- protocol_version (http.server.BaseHTTPRequestHandler attribute), 1276
- PROTOCOL_VERSION (imaplib.IMAP4 attribute), 1242
- ProtocolError (class in xmlrpc.client), 1297
- provisional API, 1908
- provisional package, 1908
- proxy() (in module weakref), 242
- proxyauth() (imaplib.IMAP4 method), 1240
- ProxyBasicAuthHandler (class in urllib.request), 1197
- ProxyDigestAuthHandler (class in urllib.request), 1197
- ProxyHandler (class in urllib.request), 1196
- ProxyType (in module weakref), 244
- ProxyTypes (in module weakref), 244
- pryear() (calendar.TextCalendar method), 207
- ps1 (in module sys), 1671
- ps2 (in module sys), 1671
- pstats (module), 1618
- pstdev() (in module statistics), 333
- pthread_getcpuclockid() (in module time), 602
- pthread_kill() (in module signal), 1005
- pthread_sigmask() (in module signal), 1005
- pthreads, 836
- pty
 - module, 552
- pty (module), 1852
- pu() (in module turtle), 1369
- publicId (xml.dom.DocumentType attribute), 1138
- PullDom (class in xml.dom.pulldom), 1150
- punctuation (in module string), 97
- punctuation_chars (shlex.shlex attribute), 1400
- PurePath (class in pathlib), 369
- PurePath.anchor (in module pathlib), 373
- PurePath.drive (in module pathlib), 372
- PurePath.name (in module pathlib), 374
- PurePath.parent (in module pathlib), 373
- PurePath.parents (in module pathlib), 373
- PurePath.parts (in module pathlib), 372
- PurePath.root (in module pathlib), 372
- PurePath.stem (in module pathlib), 374
- PurePath.suffix (in module pathlib), 374
- PurePath.suffixes (in module pathlib), 374
- PurePosixPath (class in pathlib), 370
- PureProxy (class in smtpd), 1258
- PureWindowsPath (class in pathlib), 370
- purge() (in module re), 118
- Purpose.CLIENT_AUTH (in module ssl), 962
- Purpose.SERVER_AUTH (in module ssl), 962
- push() (asynchat.async_chat method), 1001
- push() (code.InteractiveConsole method), 1749
- push() (contextlib.ExitStack method), 1702
- push_alignment() (formatter.formatter method), 1822
- push_async_callback() (contextlib.AsyncExitStack method), 1702
- push_async_exit() (contextlib.AsyncExitStack method), 1702
- push_font() (formatter.formatter method), 1822
- push_margin() (formatter.formatter method), 1822

`push_source()` (`shlex.shlex` method), 1399
`push_style()` (`formatter.formatter` method), 1823
`push_token()` (`shlex.shlex` method), 1399
`push_with_producer()` (`asynchat.async_chat` method), 1001
`pushbutton()` (`msilib.Dialog` method), 1832
`put()` (`asyncio.Queue` method), 872
`put()` (`multiprocessing.Queue` method), 774
`put()` (`multiprocessing.SimpleQueue` method), 775
`put()` (`queue.Queue` method), 834
`put()` (`queue.SimpleQueue` method), 835
`put_nowait()` (`asyncio.Queue` method), 872
`put_nowait()` (`multiprocessing.Queue` method), 774
`put_nowait()` (`queue.Queue` method), 834
`put_nowait()` (`queue.SimpleQueue` method), 835
`putch()` (in module `msvcrt`), 1833
`putenv()` (in module `os`), 545
`putheader()` (`http.client.HTTPConnection` method), 1226
`putp()` (in module `curses`), 690
`putrequest()` (`http.client.HTTPConnection` method), 1225
`putwch()` (in module `msvcrt`), 1833
`putwin()` (`curses.window` method), 697
`pvariance()` (in module `statistics`), 333
`pwd`
 module, 386
`pwd` (module), 1846
`pwd()` (`ftplib.FTP` method), 1233
`pwrite()` (in module `os`), 553
`pwritev()` (in module `os`), 553
`py_compile` (module), 1801
`PY_COMPILED` (in module `imp`), 1893
`PY_FROZEN` (in module `imp`), 1894
`py_object` (class in `ctypes`), 748
`PY_SOURCE` (in module `imp`), 1893
`PycInvalidationMode` (class in `py_compile`), 1802
`pyclbr` (module), 1800
`PyCompileError`, 1801
`PyDLL` (class in `ctypes`), 737
`pydoc` (module), 1467
`pyexpat`
 module, 1163
`PYFUNCTYPE()` (in module `ctypes`), 740
Python 3000, **1908**
Python Editor, 1438
Python Enhancement Proposals
 PEP 1, 1908
 PEP 205, 244
 PEP 227, 1723
 PEP 235, 1760
 PEP 237, 53, 67
 PEP 238, 1723, 1903
 PEP 249, 437, 439
 PEP 255, 1723
 PEP 263, 1760, 1796
 PEP 273, 1751
 PEP 278, 1911
 PEP 282, 412, 661
 PEP 292, 106
 PEP 302, 25, 405, 1670, 1751, 1753, 1757, 1760, 1762, 1763, 1765, 1766, 1894, 1903, 1906
 PEP 305, 493
 PEP 307, 416
 PEP 324, 814
 PEP 328, 25, 1723, 1760
 PEP 338, 1759
 PEP 342, 229
 PEP 343, 1707, 1723, 1901
 PEP 362, 1735, 1900, 1908
 PEP 366, 1759, 1760
 PEP 370, 1745
 PEP 378, 101
 PEP 383, 160, 927
 PEP 393, 166, 171, 1669
 PEP 397, 1646
 PEP 405, 1643
 PEP 411, 1667, 1673, 1674, 1908
 PEP 420, 1760, 1903, 1907, 1908
 PEP 421, 1668
 PEP 428, 368
 PEP 442, 1725
 PEP 443, 1904
 PEP 451, 1670, 1754, 17581760, 1903
 PEP 453, 1642
 PEP 461, 67
 PEP 468, 225
 PEP 475, 19, 93, 551, 554, 555, 583, 604, 939, 941944, 987990, 994, 1007
 PEP 479, 91, 1723
 PEP 483, 1451
 PEP 484, 1451, 1453, 1458, 1459, 1465, 1899, 1903, 1910, 1911
 PEP 485, 286, 292
 PEP 488, 1760, 1774, 1775, 1802
 PEP 489, 1760, 1770, 1773
 PEP 492, 230, 1667, 1674, 1741, 1900, 1901
 PEP 498, 1902
 PEP 506, 537
 PEP 515, 102
 PEP 519, 1908
 PEP 524, 587
 PEP 525, 230, 1667, 1673, 1742, 1900
 PEP 526, 1451, 1464, 1466, 1687, 1693, 1899, 1911
 PEP 529, 1665, 1674
 PEP 552, 1760, 1802
 PEP 557, 1687

- PEP 560, 249
 - PEP 563, 1723
 - PEP 567, 839, 878, 897
 - PEP 3101, 98
 - PEP 3105, 1723
 - PEP 3112, 1723
 - PEP 3115, 249
 - PEP 3116, 1911
 - PEP 3118, 69
 - PEP 3119, 231, 1709
 - PEP 3120, 1760
 - PEP 3141, 281, 1709
 - PEP 3147, 1758, 1760, 1774, 1775, 1802, 1804, 1805, 1892, 1893
 - PEP 3148, 813
 - PEP 3149, 1659
 - PEP 3151, 94, 930, 985, 1857
 - PEP 3154, 416
 - PEP 3155, 1909
 - PEP 3333, 11831188, 1191
 - python_branch() (in module platform), 709
 - python_build() (in module platform), 709
 - python_compiler() (in module platform), 709
 - PYTHON_DOM, 1135
 - python_implementation() (in module platform), 709
 - python_is_optimized() (in module test.support), 1588
 - python_revision() (in module platform), 709
 - python_version() (in module platform), 709
 - python_version_tuple() (in module platform), 709
 - PYTHONASYNCIODEBUG, 889, 924
 - PYTHONBREAKPOINT, 1660
 - PYTHONDEVMODE, 1599
 - PYTHONDOCS, 1468
 - PYTHONDONTWRITEBYTECODE, 1661
 - PYTHONFAULTHANDLER, 1605
 - PYTHONHOME, 1599
 - Pythonic, 1908
 - PYTHONIOENCODING, 1675
 - PYTHONLEGACYWINDOWSFSENCODING, 1674
 - PYTHONNOUSERSITE, 1744
 - PYTHONPATH, 1180, 1599, 1670
 - PYTHONSTARTUP, 149, 1445, 1669, 1743
 - PYTHONTRACEMALLOC, 1630, 1635
 - PYTHONUSERBASE, 1744
 - PYTHONUSERSITE, 1599
 - PYTHONWARNINGS, 1683
 - PyZipFile (class in zipfile), 478
- Q**
- q
 - compileall command line option, 1803
 - qiflush() (in module curses), 690
 - QName (class in xml.etree.ElementTree), 1131
 - qsize() (asyncio.Queue method), 872
 - qsize() (multiprocessing.Queue method), 774
 - qsize() (queue.Queue method), 834
 - qsize() (queue.SimpleQueue method), 835
 - qualified name, 1909
 - quantize() (decimal.Context method), 310
 - quantize() (decimal.Decimal method), 303
 - QueryInfoKey() (in module winreg), 1837
 - QueryReflectionKey() (in module winreg), 1839
 - QueryValue() (in module winreg), 1837
 - QueryValueEx() (in module winreg), 1838
 - Queue (class in asyncio), 871
 - Queue (class in multiprocessing), 773
 - Queue (class in queue), 833
 - queue (module), 832
 - queue (sched.scheduler attribute), 832
 - Queue() (multiprocessing.managers.SyncManager method), 786
 - QueueEmpty, 872
 - QueueFull, 872
 - QueueHandler (class in logging.handlers), 683
 - QueueListener (class in logging.handlers), 683
 - quick_ratio() (difflib.SequenceMatcher method), 134
 - quit (built-in variable), 28
 - quit (pdb command), 1614
 - quit() (ftplib.FTP method), 1233
 - quit() (nntplib.NNTP method), 1245
 - quit() (poplib.POP3 method), 1235
 - quit() (smtplib.SMTP method), 1255
 - quopri (module), 1109
 - quote() (in module email.utils), 1069
 - quote() (in module shlex), 1397
 - quote() (in module urllib.parse), 1216
 - QUOTE_ALL (in module csv), 496
 - quote_from_bytes() (in module urllib.parse), 1216
 - QUOTE_MINIMAL (in module csv), 496
 - QUOTE_NONE (in module csv), 496
 - QUOTE_NONNUMERIC (in module csv), 496
 - quote_plus() (in module urllib.parse), 1216
 - quoteattr() (in module xml.sax.saxutils), 1158
 - quotechar (csv.Dialect attribute), 497
 - quoted-printable
 - encoding, 1109
 - quotes (shlex.shlex attribute), 1400
 - quoting (csv.Dialect attribute), 497
- R**
- r
 - compileall command line option, 1804
 - r N, -repeat=N
 - timeit command line option, 1625
 - R, -no-report
 - trace command line option, 1628

- r, -report
 - trace command line option, 1628
- R_OK (in module os), 558
- radians() (in module math), 288
- radians() (in module turtle), 1368
- RadioButtonGroup (class in msilib), 1831
- radiogroup() (msilib.Dialog method), 1832
- radix() (decimal.Context method), 310
- radix() (decimal.Decimal method), 303
- RADIXCHAR (in module locale), 1352
- raise
 - statement, 87
- raise (2to3 fixer), 1583
- raise_on_defect (email.policy.Policy attribute), 1031
- RAISE_VARARGS (opcode), 1817
- RAND_add() (in module ssl), 954
- RAND_bytes() (in module ssl), 953
- RAND_egd() (in module ssl), 954
- RAND_pseudo_bytes() (in module ssl), 953
- RAND_status() (in module ssl), 954
- randbelow() (in module secrets), 537
- randbits() (in module secrets), 537
- randint() (in module random), 324
- random (module), 323
- random() (in module random), 325
- randrange() (in module random), 324
- range
 - object, 42
- range (built-in class), 42
- RARROW (in module token), 1794
- ratecv() (in module audioop), 1323
- ratio() (difflib.SequenceMatcher method), 134
- Rational (class in numbers), 281
- raw (io.BufferedIOBase attribute), 593
- raw() (in module curses), 690
- raw_data_manager (in module email.contentmanager), 1043
- raw_decode() (json.JSONDecoder method), 1077
- raw_input (2to3 fixer), 1583
- raw_input() (code.InteractiveConsole method), 1749
- RawArray() (in module multiprocessing.sharedctypes), 782
- RawConfigParser (class in configparser), 516
- RawDescriptionHelpFormatter (class in argparse), 615
- RawIOBase (class in io), 592
- RawPen (class in turtle), 1386
- RawTextHelpFormatter (class in argparse), 615
- RawTurtle (class in turtle), 1386
- RawValue() (in module multiprocessing.sharedctypes), 782
- RBRACE (in module token), 1794
- rcpttos (smtpd.SMTPChannel attribute), 1259
- re
 - module, 44, 404
- re (module), 108
- re (re.Match attribute), 122
- read() (asyncio.StreamReader method), 858
- read() (chunk.Chunk method), 1333
- read() (codecs.StreamReader method), 164
- read() (configparser.ConfigParser method), 514
- read() (http.client.HTTPResponse method), 1226
- read() (imaplib.IMAP4 method), 1240
- read() (in module os), 554
- read() (io.BufferedIOBase method), 593
- read() (io.BufferedReader method), 596
- read() (io.RawIOBase method), 592
- read() (io.TextIOBase method), 597
- read() (mimetypes.MimeTypes method), 1103
- read() (mmap.mmap method), 1011
- read() (ossaudiodev.oss_audio_device method), 1336
- read() (ssl.MemoryBIO method), 982
- read() (ssl.SSLSocket method), 963
- read() (urllib.robotparser.RobotFileParser method), 1219
- read() (zipfile.ZipFile method), 477
- read1() (io.BufferedIOBase method), 593
- read1() (io.BufferedReader method), 596
- read1() (io.BytesIO method), 595
- read_all() (telnetlib.Telnet method), 1260
- read_binary() (in module importlib.resources), 1769
- read_byte() (mmap.mmap method), 1011
- read_bytes() (pathlib.Path method), 381
- read_dict() (configparser.ConfigParser method), 514
- read_eager() (telnetlib.Telnet method), 1261
- read_envron() (in module wsgiref.handlers), 1192
- read_events() (xml.etree.ElementTree.XMLPullParser method), 1133
- read_file() (configparser.ConfigParser method), 514
- read_history_file() (in module readline), 146
- read_init_file() (in module readline), 146
- read_lazy() (telnetlib.Telnet method), 1261
- read_mime_types() (in module mimetypes), 1101
- read_sb_data() (telnetlib.Telnet method), 1261
- read_some() (telnetlib.Telnet method), 1260
- read_string() (configparser.ConfigParser method), 514
- read_text() (in module importlib.resources), 1769
- read_text() (pathlib.Path method), 381
- read_token() (shlex.shlex method), 1399
- read_until() (telnetlib.Telnet method), 1260
- read_very_eager() (telnetlib.Telnet method), 1261
- read_very_lazy() (telnetlib.Telnet method), 1261
- read_windows_registry() (mimetypes.MimeTypes method), 1103
- READABLE (in module tkinter), 1414
- readable() (asyncore.dispatcher method), 997

- readable() (io.IOBase method), 591
- readall() (io.RawIOBase method), 592
- reader() (in module csv), 493
- ReadError, 483
- readexactly() (asyncio.StreamReader method), 858
- readfp() (configparser.ConfigParser method), 516
- readfp() (mimetypes.MimeTypes method), 1103
- readframes() (aifc.aifc method), 1325
- readframes() (sunau.AU_read method), 1328
- readframes() (wave.Wave_read method), 1330
- readinto() (http.client.HTTPResponse method), 1226
- readinto() (io.BufferedIOBase method), 594
- readinto() (io.RawIOBase method), 593
- readinto1() (io.BufferedIOBase method), 594
- readinto1() (io.BytesIO method), 595
- readline (module), 145
- readline() (asyncio.StreamReader method), 858
- readline() (codecs.StreamReader method), 164
- readline() (imaplib.IMAP4 method), 1240
- readline() (io.IOBase method), 591
- readline() (io.TextIOBase method), 597
- readline() (mmap.mmap method), 1011
- readlines() (codecs.StreamReader method), 164
- readlines() (io.IOBase method), 591
- readlink() (in module os), 563
- readmodule() (in module pyclbr), 1800
- readmodule_ex() (in module pyclbr), 1800
- readonly (memoryview attribute), 73
- readPlist() (in module plistlib), 523
- readPlistFromBytes() (in module plistlib), 523
- ReadTransport (class in asyncio), 899
- readuntil() (asyncio.StreamReader method), 858
- readv() (in module os), 555
- ready() (multiprocessing.pool.AsyncResult method), 792
- Real (class in numbers), 281
- real (numbers.Complex attribute), 281
- Real Media File Format, 1332
- real_max_memuse (in module test.support), 1588
- real_quick_ratio() (difflib.SequenceMatcher method), 135
- realpath() (in module os.path), 388
- REALTIME_PRIORITY_CLASS (in module subprocess), 825
- reap_children() (in module test.support), 1595
- reap_threads() (in module test.support), 1594
- reason (http.client.HTTPResponse attribute), 1227
- reason (ssl.SSLError attribute), 952
- reason (UnicodeError attribute), 92
- reason (urllib.error.HTTPError attribute), 1218
- reason (urllib.error.URLError attribute), 1218
- reattach() (tkinter.ttk.Treeview method), 1428
- reccontrols() (ossaudiodev.oss_mixer_device method), 1339
- received_data (smtpd.SMTPChannel attribute), 1259
- received_lines (smtpd.SMTPChannel attribute), 1259
- recent() (imaplib.IMAP4 method), 1240
- reconfigure() (io.TextIOWrapper method), 598
- record_original_stdout() (in module test.support), 1591
- records (unittest.TestCase attribute), 1507
- rect() (in module cmath), 290
- rectangle() (in module curses.textpad), 703
- RecursionError, 90
- recursive_repr() (in module reprlib), 259
- recv() (asyncore.dispatcher method), 998
- recv() (multiprocessing.connection.Connection method), 777
- recv() (socket.socket method), 941
- recv_bytes() (multiprocessing.connection.Connection method), 777
- recv_bytes_into() (multiprocessing.connection.Connection method), 778
- recv_into() (socket.socket method), 943
- recvfrom() (socket.socket method), 941
- recvfrom_into() (socket.socket method), 942
- recvmsg() (socket.socket method), 941
- recvmsg_into() (socket.socket method), 942
- redirect_request() (urlib.request.HTTPRedirectHandler method), 1201
- redirect_stderr() (in module contextlib), 1700
- redirect_stdout() (in module contextlib), 1699
- redisplay() (in module readline), 146
- redrawln() (curses.window method), 697
- redrawwin() (curses.window method), 697
- reduce (2to3 fixer), 1583
- reduce() (in module functools), 355
- ref (class in weakref), 241
- refcount_test() (in module test.support), 1594
- reference count, 1909
- ReferenceError, 90, 244
- ReferenceType (in module weakref), 244
- refold_source (email.policy.EmailPolicy attribute), 1033
- refresh() (curses.window method), 697
- REG_BINARY (in module winreg), 1840
- REG_DWORD (in module winreg), 1840
- REG_DWORD_BIG_ENDIAN (in module winreg), 1841
- REG_DWORD_LITTLE_ENDIAN (in module winreg), 1840
- REG_EXPAND_SZ (in module winreg), 1841

- REG_FULL_RESOURCE_DESCRIPTOR (in module winreg), 1841
- REG_LINK (in module winreg), 1841
- REG_MULTI_SZ (in module winreg), 1841
- REG_NONE (in module winreg), 1841
- REG_QWORD (in module winreg), 1841
- REG_QWORD_LITTLE_ENDIAN (in module winreg), 1841
- REG_RESOURCE_LIST (in module winreg), 1841
- REG_RESOURCE_REQUIREMENTS_LIST (in module winreg), 1841
- REG_SZ (in module winreg), 1841
- register() (abc.ABCMeta method), 1710
- register() (in module atexit), 1714
- register() (in module codecs), 158
- register() (in module faulthandler), 1607
- register() (in module webbrowser), 1174
- register() (multiprocessing.managers.BaseManager method), 785
- register() (select.devpoll method), 987
- register() (select.epoll method), 989
- register() (selectors.BaseSelector method), 993
- register() (select.poll method), 989
- register_adapter() (in module sqlite3), 440
- register_archive_format() (in module shutil), 412
- register_at_fork() (in module os), 579
- register_converter() (in module sqlite3), 440
- register_defect() (email.policy.Policy method), 1032
- register_dialect() (in module csv), 494
- register_error() (in module codecs), 160
- register_function() (xmlrpc.server.CGIXMLRPCRequestHandler method), 1304
- register_function() (xmlrpc.server.SimpleXMLRPCServer method), 1301
- register_instance() (xmlrpc.server.CGIXMLRPCRequestHandler method), 1305
- register_instance() (xmlrpc.server.SimpleXMLRPCServer method), 1301
- register_introspection_functions() (xmlrpc.server.CGIXMLRPCRequestHandler method), 1305
- register_introspection_functions() (xmlrpc.server.SimpleXMLRPCServer method), 1302
- register_multicall_functions() (xmlrpc.server.CGIXMLRPCRequestHandler method), 1305
- register_multicall_functions() (xmlrpc.server.SimpleXMLRPCServer method), 1302
- register_namespace() (in module xml.etree.ElementTree), 1126
- register_optionflag() (in module doctest), 1478
- register_shape() (in module turtle), 1384
- register_unpack_format() (in module shutil), 412
- registerDOMImplementation() (in module xml.dom), 1135
- registerResult() (in module unittest), 1521
- regular package, 1909
- relative URL, 1211
- relative_to() (pathlib.PurePath method), 376
- release() (_thread.lock method), 837
- release() (asyncio.Condition method), 865
- release() (asyncio.Lock method), 863
- release() (asyncio.Semaphore method), 866
- release() (in module platform), 709
- release() (logging.Handler method), 650
- release() (memoryview method), 70
- release() (multiprocessing.Lock method), 779
- release() (multiprocessing.RLock method), 780
- release() (threading.Condition method), 758
- release() (threading.Lock method), 755
- release() (threading.RLock method), 756
- release() (threading.Semaphore method), 759
- release_lock() (in module imp), 1893
- reload (2to3 fixer), 1583
- reload() (in module imp), 1891
- reload() (in module importlib), 1761
- relpath() (in module os.path), 388
- remainder() (decimal.Context method), 310
- remainder() (in module math), 286
- remainder_near() (decimal.Context method), 310
- remainder_near() (decimal.Decimal method), 304
- RemoteDisconnected, 1224
- remove() (array.array method), 240
- remove() (collections.deque method), 217
- remove() (frozenset method), 76
- remove() (in module os), 563
- remove() (mailbox.Mailbox method), 1084
- remove() (mailbox.MH method), 1089
- remove() (sequence method), 39
- remove() (xml.etree.ElementTree.Element method), 1129
- remove_child_handler() (asyncio.AbstractChildWatcher method), 914
- remove_done_callback() (asyncio.Future method), 897
- remove_done_callback() (asyncio.Task method), 855
- remove_flag() (mailbox.MaildirMessage method), 1092
- remove_flag() (mailbox.mboxMessage method), 1094

- `remove_flag()` (`mailbox.MMDFMessage` method), 1098
- `remove_folder()` (`mailbox.Maildir` method), 1087
- `remove_folder()` (`mailbox.MH` method), 1088
- `remove_header()` (`urllib.request.Request` method), 1199
- `remove_history_item()` (in module `readline`), 147
- `remove_label()` (`mailbox.BabylMessage` method), 1096
- `remove_option()` (`configparser.ConfigParser` method), 515
- `remove_option()` (`optparse.OptionParser` method), 1881
- `remove_pyc()` (`msilib.Directory` method), 1831
- `remove_reader()` (`asyncio.loop` method), 884
- `remove_section()` (`configparser.ConfigParser` method), 515
- `remove_sequence()` (`mailbox.MHMessage` method), 1095
- `remove_signal_handler()` (`asyncio.loop` method), 886
- `remove_writer()` (`asyncio.loop` method), 884
- `removeAttribute()` (`xml.dom.Element` method), 1140
- `removeAttributeNode()` (`xml.dom.Element` method), 1140
- `removeAttributeNS()` (`xml.dom.Element` method), 1140
- `removeChild()` (`xml.dom.Node` method), 1138
- `removedirs()` (in module `os`), 563
- `removeFilter()` (`logging.Handler` method), 650
- `removeFilter()` (`logging.Logger` method), 648
- `removeHandler()` (in module `unittest`), 1521
- `removeHandler()` (`logging.Logger` method), 649
- `removeResult()` (in module `unittest`), 1521
- `removexattr()` (in module `os`), 575
- `rename()` (`ftplib.FTP` method), 1232
- `rename()` (`imaplib.IMAP4` method), 1240
- `rename()` (in module `os`), 564
- `rename()` (`pathlib.Path` method), 382
- `renames` (2to3 fixer), 1583
- `renames()` (in module `os`), 564
- `reopenIfNeeded()` (`logging.handlers.WatchedFileHandler` method), 674
- `reorganize()` (`dbm.gnu.gdbm` method), 435
- `repeat()` (in module `itertools`), 346
- `repeat()` (in module `timeit`), 1623
- `repeat()` (`timeit.Timer` method), 1624
- `repetition`
 - operation, 37
- `replace()` (`bytearray` method), 57
- `replace()` (`bytes` method), 57
- `replace()` (`curses.panel.Panel` method), 707
- `replace()` (`datetime.date` method), 181
- `replace()` (`datetime.datetime` method), 187
- `replace()` (`datetime.time` method), 193
- `replace()` (in module `dataclasses`), 1692
- `replace()` (in module `os`), 564
- `replace()` (`inspect.Parameter` method), 1734
- `replace()` (`inspect.Signature` method), 1732
- `replace()` (`pathlib.Path` method), 382
- `replace()` (`str` method), 48
- `replace_errors()` (in module `codecs`), 160
- `replace_header()` (`email.message.EmailMessage` method), 1017
- `replace_header()` (`email.message.Message` method), 1057
- `replace_history_item()` (in module `readline`), 147
- `replace_whitespace` (`textwrap.TextWrapper` attribute), 141
- `replaceChild()` (`xml.dom.Node` method), 1138
- `ReplacePackage()` (in module `modulefinder`), 1756
- `report()` (`filecmp.dircmp` method), 397
- `report()` (`modulefinder.ModuleFinder` method), 1756
- `REPORT_CDIF` (in module `doctest`), 1477
- `report_failure()` (`doctest.DocTestRunner` method), 1487
- `report_full_closure()` (`filecmp.dircmp` method), 397
- `REPORT_NDIFF` (in module `doctest`), 1477
- `REPORT_ONLY_FIRST_FAILURE` (in module `doctest`), 1477
- `report_partial_closure()` (`filecmp.dircmp` method), 397
- `report_start()` (`doctest.DocTestRunner` method), 1487
- `report_success()` (`doctest.DocTestRunner` method), 1487
- `REPORT_UDIFF` (in module `doctest`), 1477
- `report_unexpected_exception()` (`doctest.DocTestRunner` method), 1488
- `REPORTING_FLAGS` (in module `doctest`), 1478
- `repr` (2to3 fixer), 1583
- `Repr` (class in `reprlib`), 259
- `repr()` (built-in function), 21
- `repr()` (in module `reprlib`), 259
- `repr()` (`reprlib.Repr` method), 260
- `repr1()` (`reprlib.Repr` method), 260
- `reprlib` (module), 259
- `Request` (class in `urllib.request`), 1195
- `request()` (`http.client.HTTPConnection` method), 1224
- `request_queue_size` (`socketserver.BaseServer` attribute), 1269
- `request_rate()` (`urllib.robotparser.RobotFileParser` method), 1219
- `request_uri()` (in module `wsgiref.util`), 1184
- `request_version` (`http.server.BaseHTTPRequestHandler` attribute), 1275

- RequestHandlerClass (socketserver.BaseServer attribute), 1269
- requestline (http.server.BaseHTTPRequestHandler attribute), 1275
- requires() (in module test.support), 1589
- requires_bz2() (in module test.support), 1593
- requires_docstrings() (in module test.support), 1593
- requires_freebsd_version() (in module test.support), 1593
- requires_gzip() (in module test.support), 1593
- requires_IEEE_754() (in module test.support), 1593
- requires_linux_version() (in module test.support), 1593
- requires_lzma() (in module test.support), 1593
- requires_mac_version() (in module test.support), 1593
- requires_resource() (in module test.support), 1593
- requires_zlib() (in module test.support), 1593
- reserved (zipfile.ZipInfo attribute), 480
- RESERVED_FUTURE (in module uuid), 1265
- RESERVED_MICROSOFT (in module uuid), 1265
- RESERVED_NCS (in module uuid), 1265
- reset() (bdb.Bdb method), 1602
- reset() (codecs.IncrementalDecoder method), 163
- reset() (codecs.IncrementalEncoder method), 162
- reset() (codecs.StreamReader method), 165
- reset() (codecs.StreamWriter method), 164
- reset() (contextvars.ContextVar method), 840
- reset() (html.parser.HTMLParser method), 1113
- reset() (in module turtle), 1372, 1379
- reset() (ossaudiodev.oss_audio_device method), 1337
- reset() (pipes.Template method), 1856
- reset() (threading.Barrier method), 762
- reset() (xdrlib.Packer method), 519
- reset() (xdrlib.Unpacker method), 520
- reset() (xml.dom.pulldom.DOMEvtStream method), 1151
- reset() (xml.sax.xmlreader.IncrementalParser method), 1161
- reset_mock() (unittest.mock.Mock method), 1526
- reset_prog_mode() (in module curses), 690
- reset_shell_mode() (in module curses), 690
- resetbuffer() (code.InteractiveConsole method), 1749
- resetlocale() (in module locale), 1354
- resetscreen() (in module turtle), 1379
- resetty() (in module curses), 690
- resetwarnings() (in module warnings), 1687
- resize() (curses.window method), 697
- resize() (in module ctypes), 744
- resize() (mmap.mmap method), 1011
- resize_term() (in module curses), 690
- resizemode() (in module turtle), 1374
- resizeterm() (in module curses), 690
- resolution (datetime.date attribute), 180
- resolution (datetime.datetime attribute), 185
- resolution (datetime.time attribute), 192
- resolution (datetime.timedelta attribute), 177
- resolve() (pathlib.Path method), 382
- resolve_bases() (in module types), 249
- resolve_name() (in module importlib.util), 1775
- resolveEntity() (xml.sax.handler.EntityResolver method), 1157
- Resource (in module importlib.resources), 1768
- resource (module), 1856
- resource_path() (importlib.abc.ResourceReader method), 1765
- ResourceDenied, 1587
- ResourceLoader (class in importlib.abc), 1765
- ResourceReader (class in importlib.abc), 1764
- ResourceWarning, 94
- response (nntplib.NNTPError attribute), 1244
- response() (imaplib.IMAP4 method), 1240
- ResponseNotReady, 1223
- responses (http.server.BaseHTTPRequestHandler attribute), 1276
- responses (in module http.client), 1224
- restart (pdb command), 1613
- restore() (in module difflib), 131
- restype (ctypes._FuncPtr attribute), 739
- result() (asyncio.Future method), 896
- result() (asyncio.Task method), 854
- result() (concurrent.futures.Future method), 811
- results() (trace.Trace method), 1629
- resume_reading() (asyncio.ReadTransport method), 901
- resume_writing() (asyncio.BaseProtocol method), 904
- retr() (poplib.POP3 method), 1235
- retrbinary() (ftplib.FTP method), 1231
- retrieve() (urllib.request.URLopener method), 1209
- retrlines() (ftplib.FTP method), 1231
- return (pdb command), 1612
- return_annotation (inspect.Signature attribute), 1732
- return_ok() (http.cookiejar.CookiePolicy method), 1287
- RETURN_VALUE (opcode), 1813
- return_value (unittest.mock.Mock attribute), 1528
- returncode (asyncio.asyncio.subprocess.Process attribute), 870
- returncode (subprocess.CalledProcessError attribute), 816
- returncode (subprocess.CompletedProcess attribute), 815
- returncode (subprocess.Popen attribute), 823
- reverse() (array.array method), 240
- reverse() (collections.deque method), 217

- `reverse()` (in module `audioop`), 1323
- `reverse()` (sequence method), 39
- `reverse_order()` (`pstats.Stats` method), 1619
- `reverse_pointer` (`ipaddress.IPv4Address` attribute), 1308
- `reverse_pointer` (`ipaddress.IPv6Address` attribute), 1309
- `reversed()` (built-in function), 21
- `Reversible` (class in `collections.abc`), 229
- `Reversible` (class in `typing`), 1459
- `revert()` (`http.cookiejar.FileCookieJar` method), 1287
- `rewind()` (`aifc.aifc` method), 1325
- `rewind()` (`sunau.AU_read` method), 1328
- `rewind()` (`wave.Wave_read` method), 1330
- RFC
 - RFC 821, 1250, 1252
 - RFC 822, 605, 1045, 1063, 1226, 1253, 1254, 1256, 1345
 - RFC 854, 1260
 - RFC 959, 1229, 1232
 - RFC 977, 1243
 - RFC 1014, 519
 - RFC 1123, 605
 - RFC 1321, 525
 - RFC 1422, 975, 985
 - RFC 1521, 1106, 1109
 - RFC 1522, 1108, 1109
 - RFC 1524, 1082
 - RFC 1730, 1236
 - RFC 1738, 1218
 - RFC 1750, 954
 - RFC 1766, 1353
 - RFC 1808, 1211, 1218
 - RFC 1832, 519
 - RFC 1869, 1250, 1252
 - RFC 1870, 1257, 1259
 - RFC 1939, 1234
 - RFC 2045, 1013, 1018, 1040, 1041, 1057, 1058, 1064, 1104, 1106
 - RFC 2045#section-6.8, 1296
 - RFC 2046, 1013, 1044, 1064
 - RFC 2047, 1013, 1033, 1038, 1039, 1064, 1065, 1069
 - RFC 2060, 1236, 1241
 - RFC 2068, 1280
 - RFC 2104, 535
 - RFC 2109, 12801282, 1284, 1285, 12891291
 - RFC 2183, 1013, 1019, 1059
 - RFC 2231, 1013, 1017, 1018, 1056, 1058, 1064, 1071
 - RFC 2295, 1221
 - RFC 2342, 1240
 - RFC 2368, 1218
 - RFC 2373, 1308, 1309
 - RFC 2396, 1213, 1216, 1218
 - RFC 2397, 1204
 - RFC 2449, 1235
 - RFC 2518, 1220
 - RFC 2595, 1234, 1236
 - RFC 2616, 1185, 1188, 1201, 1202, 1209, 1218
 - RFC 2732, 1217
 - RFC 2774, 1221
 - RFC 2818, 954
 - RFC 2821, 1013
 - RFC 2822, 605, 1055, 10631065, 1069, 1070, 1091, 1276
 - RFC 2964, 1285
 - RFC 2965, 1195, 1198, 1284, 1285, 12871290, 1292
 - RFC 2980, 1243, 1249
 - RFC 3056, 1310
 - RFC 3171, 1308
 - RFC 3229, 1221
 - RFC 3280, 964
 - RFC 3330, 1309
 - RFC 3454, 144
 - RFC 3490, 171173
 - RFC 3490#section-3.1, 173
 - RFC 3492, 171, 172
 - RFC 3493, 950
 - RFC 3501, 1242
 - RFC 3542, 937
 - RFC 3548, 1103, 1104, 1107
 - RFC 3659, 1232
 - RFC 3879, 1310
 - RFC 3927, 1309
 - RFC 3977, 1243, 1245, 1247, 1249
 - RFC 3986, 1212, 1214, 1216, 1217
 - RFC 4086, 985
 - RFC 4122, 12621265
 - RFC 4180, 493
 - RFC 4193, 1310
 - RFC 4217, 1229
 - RFC 4291, 1309
 - RFC 4380, 1310
 - RFC 4627, 1072, 1080
 - RFC 4642, 1244
 - RFC 4918, 1221
 - RFC 4954, 1253
 - RFC 5161, 1239
 - RFC 5233, 1013, 1052
 - RFC 5246, 962, 985
 - RFC 5280, 954, 955, 985
 - RFC 5321, 1042, 1257
 - RFC 5322, 1014, 1024, 1027, 1028, 1031, 1033, 1034, 1036, 1037, 1039, 1042, 1255
 - RFC 5424, 679
 - RFC 5735, 1309

- RFC 5842, 1221
- RFC 5929, 966
- RFC 6066, 961, 971, 985
- RFC 6125, 954
- RFC 6152, 1257
- RFC 6531, 1015, 1033, 1250, 1257, 1258
- RFC 6532, 1013, 1014, 1024, 1033
- RFC 6585, 1221
- RFC 6855, 1239
- RFC 6856, 1236
- RFC 7159, 1072, 1079, 1080
- RFC 7230, 1195, 1226
- RFC 7231, 1220, 1221
- RFC 7232, 1221
- RFC 7233, 1220, 1221
- RFC 7235, 1221
- RFC 7238, 1221
- RFC 7301, 960, 970
- RFC 7525, 985
- RFC 7540, 1221
- RFC 7693, 528
- RFC 7914, 528
- rfc2109 (http.cookiejar.Cookie attribute), 1291
- rfc2109_as_netscape (http.cookiejar.DefaultCookiePolicy attribute), 1289
- rfc2965 (http.cookiejar.CookiePolicy attribute), 1288
- RFC_4122 (in module uuid), 1265
- rfile (http.server.BaseHTTPRequestHandler attribute), 1276
- rfind() (bytearray method), 58
- rfind() (bytes method), 58
- rfind() (mmap.mmap method), 1012
- rfind() (str method), 48
- rgb_to_hls() (in module colorsys), 1333
- rgb_to_hsv() (in module colorsys), 1333
- rgb_to_yiq() (in module colorsys), 1333
- rglob() (pathlib.Path method), 382
- right (filecmp.dircmp attribute), 397
- right() (in module turtle), 1362
- right_list (filecmp.dircmp attribute), 398
- right_only (filecmp.dircmp attribute), 398
- RIGHTSHIFT (in module token), 1794
- RIGHTSHIFTEQUAL (in module token), 1794
- rindex() (bytearray method), 58
- rindex() (bytes method), 58
- rindex() (str method), 48
- rjust() (bytearray method), 59
- rjust() (bytes method), 59
- rjust() (str method), 48
- rlcompleter (module), 150
- rlecode_hqx() (in module binascii), 1108
- rledecode_hqx() (in module binascii), 1108
- RLIM_INFINITY (in module resource), 1857
- RLIMIT_AS (in module resource), 1858
- RLIMIT_CORE (in module resource), 1857
- RLIMIT_CPU (in module resource), 1858
- RLIMIT_DATA (in module resource), 1858
- RLIMIT_FSIZE (in module resource), 1858
- RLIMIT_MEMLOCK (in module resource), 1858
- RLIMIT_MSGQUEUE (in module resource), 1858
- RLIMIT_NICE (in module resource), 1858
- RLIMIT_NOFILE (in module resource), 1858
- RLIMIT_NPROC (in module resource), 1858
- RLIMIT_NPTS (in module resource), 1859
- RLIMIT_OFILE (in module resource), 1858
- RLIMIT_RSS (in module resource), 1858
- RLIMIT_RTPRIO (in module resource), 1858
- RLIMIT_RTIME (in module resource), 1858
- RLIMIT_SBSIZE (in module resource), 1859
- RLIMIT_SIGPENDING (in module resource), 1859
- RLIMIT_STACK (in module resource), 1858
- RLIMIT_SWAP (in module resource), 1859
- RLIMIT_VMEM (in module resource), 1858
- RLock (class in multiprocessing), 780
- RLock (class in threading), 756
- RLock() (multiprocessing.managers.SyncManager method), 786
- rm() (ftplib.FTP method), 1233
- rmdir() (in module os), 564
- rmdir() (in module test.support), 1588
- rmdir() (pathlib.Path method), 382
- RMFF, 1332
- rms() (in module audioop), 1323
- rmtree() (in module shutil), 408
- rmtree() (in module test.support), 1588
- RobotFileParser (class in urllib.robotparser), 1219
- robots.txt, 1218
- rollback() (sqlite3.Connection method), 442
- ROT_THREE (opcode), 1810
- ROT_TWO (opcode), 1810
- rotate() (collections.deque method), 217
- rotate() (decimal.Context method), 310
- rotate() (decimal.Decimal method), 304
- rotate() (logging.handlers.BaseRotatingHandler method), 674
- RotatingFileHandler (class in logging.handlers), 675
- rotation_filename() (logging.handlers.BaseRotatingHandler method), 674
- rotator (logging.handlers.BaseRotatingHandler attribute), 674
- round() (built-in function), 21
- ROUND_05UP (in module decimal), 311
- ROUND_CEILING (in module decimal), 311
- ROUND_DOWN (in module decimal), 311
- ROUND_FLOOR (in module decimal), 311
- ROUND_HALF_DOWN (in module decimal), 311
- ROUND_HALF_EVEN (in module decimal), 311

- ROUND_HALF_UP (in module decimal), 311
 - ROUND_UP (in module decimal), 311
 - Rounded (class in decimal), 312
 - Row (class in sqlite3), 451
 - row_factory (sqlite3.Connection attribute), 445
 - rowcount (sqlite3.Cursor attribute), 450
 - RPAR (in module token), 1794
 - rpartition() (bytearray method), 58
 - rpartition() (bytes method), 58
 - rpartition() (str method), 48
 - rpc_paths (xmlrpc.server.SimpleXMLRPCRequestHandler attribute), 1302
 - rpop() (poplib.POP3 method), 1235
 - rset() (poplib.POP3 method), 1235
 - rshift() (in module operator), 361
 - rsplit() (bytearray method), 59
 - rsplit() (bytes method), 59
 - rsplit() (str method), 48
 - RSQB (in module token), 1794
 - rstrip() (bytearray method), 60
 - rstrip() (bytes method), 60
 - rstrip() (str method), 48
 - rt() (in module turtle), 1362
 - RTLD_DEEPBIND (in module os), 587
 - RTLD_GLOBAL (in module os), 587
 - RTLD_LAZY (in module os), 587
 - RTLD_LOCAL (in module os), 587
 - RTLD_NODELETE (in module os), 587
 - RTLD_NOLOAD (in module os), 587
 - RTLD_NOW (in module os), 587
 - ruler (cmd.Cmd attribute), 1394
 - run (pdb command), 1613
 - Run script, 1440
 - run() (bdb.Bdb method), 1605
 - run() (contextvars.Context method), 840
 - run() (doctest.DocTestRunner method), 1488
 - run() (in module asyncio), 847
 - run() (in module pdb), 1609
 - run() (in module profile), 1616
 - run() (in module subprocess), 814
 - run() (multiprocessing.Process method), 770
 - run() (pdb.Pdb method), 1610
 - run() (profile.Profile method), 1617
 - run() (sched.scheduler method), 832
 - run() (test.support.BasicTestRunner method), 1598
 - run() (threading.Thread method), 754
 - run() (trace.Trace method), 1629
 - run() (unittest.TestCase method), 1503
 - run() (unittest.TestSuite method), 1512
 - run() (unittest.TextTestRunner method), 1517
 - run() (wsgiref.handlers.BaseHandler method), 1189
 - run_coroutine_threadsafe() (in module asyncio), 852
 - run_docstring_examples() (in module doctest), 1481
 - run_doctest() (in module test.support), 1589
 - run_forever() (asyncio.loop method), 876
 - run_in_executor() (asyncio.loop method), 887
 - run_in_subinterp() (in module test.support), 1596
 - run_module() (in module runpy), 1757
 - run_path() (in module runpy), 1758
 - run_python_until_end() (in module test.support.script_helper), 1599
 - run_script() (modulefinder.ModuleFinder method), 1756
 - run_unittest() (in module test.support), 1589
 - run_until_complete() (asyncio.loop method), 876
 - run_with_locale() (in module test.support), 1593
 - run_with_tz() (in module test.support), 1593
 - runcall() (bdb.Bdb method), 1605
 - runcall() (in module pdb), 1609
 - runcall() (pdb.Pdb method), 1610
 - runcall() (profile.Profile method), 1617
 - runcode() (code.InteractiveInterpreter method), 1748
 - runtcx() (bdb.Bdb method), 1605
 - runtcx() (in module profile), 1617
 - runtcx() (profile.Profile method), 1617
 - runtcx() (trace.Trace method), 1629
 - runeval() (bdb.Bdb method), 1605
 - runeval() (in module pdb), 1609
 - runeval() (pdb.Pdb method), 1610
 - runfunc() (trace.Trace method), 1629
 - running() (concurrent.futures.Future method), 811
 - runpy (module), 1757
 - runsourcing() (code.InteractiveInterpreter method), 1748
 - RuntimeError, 90
 - RuntimeWarning, 94
 - RUSAGE_BOTH (in module resource), 1860
 - RUSAGE_CHILDREN (in module resource), 1860
 - RUSAGE_SELF (in module resource), 1860
 - RUSAGE_THREAD (in module resource), 1860
 - RWF_DSYNC (in module os), 554
 - RWF_HIPRI (in module os), 553
 - RWF_NOWAIT (in module os), 553
 - RWF_SYNC (in module os), 554
- ## S
- S (in module re), 115
 - s S, --setup=S
 - timeit command line option, 1625
 - s, --start-directory directory
 - unittest-discover command line option, 1496
 - s, --summary
 - trace command line option, 1628
 - S_ENFMT (in module stat), 395
 - S_IEXEC (in module stat), 395
 - S_IFBLK (in module stat), 394
 - S_IFCHR (in module stat), 394

- S_IFDIR (in module stat), 394
- S_IFDOOR (in module stat), 394
- S_IFIFO (in module stat), 394
- S_IFLNK (in module stat), 394
- S_IFMT() (in module stat), 392
- S_IFPORT (in module stat), 394
- S_IFREG (in module stat), 394
- S_IFSOCK (in module stat), 394
- S_IFWHT (in module stat), 394
- S_IMODE() (in module stat), 392
- S_IREAD (in module stat), 395
- S_IRGRP (in module stat), 395
- S_IROTH (in module stat), 395
- S_IRUSR (in module stat), 395
- S_IRWXG (in module stat), 395
- S_IRWXO (in module stat), 395
- S_IRWXU (in module stat), 395
- S_ISBLK() (in module stat), 392
- S_ISCHR() (in module stat), 392
- S_ISDIR() (in module stat), 392
- S_ISDOOR() (in module stat), 392
- S_ISFIFO() (in module stat), 392
- S_ISGID (in module stat), 394
- S_ISLNK() (in module stat), 392
- S_ISPORT() (in module stat), 392
- S_ISREG() (in module stat), 392
- S_ISSOCK() (in module stat), 392
- S_ISUID (in module stat), 394
- S_ISVTX (in module stat), 395
- S_ISWHT() (in module stat), 392
- S_IWGRP (in module stat), 395
- S_IWOTH (in module stat), 395
- S_IWRITE (in module stat), 395
- S_IWUSR (in module stat), 395
- S_IXGRP (in module stat), 395
- S_IXOTH (in module stat), 395
- S_IXUSR (in module stat), 395
- safe (uuid.SafeUUID attribute), 1263
- safe_substitute() (string.Template method), 106
- SafeChildWatcher (class in asyncio), 914
- saferepr() (in module pprint), 255
- SafeUUID (class in uuid), 1263
- same_files (filecmp.dircmp attribute), 398
- same_quantum() (decimal.Context method), 310
- same_quantum() (decimal.Decimal method), 304
- samefile() (in module os.path), 388
- samefile() (pathlib.Path method), 382
- SameFileError, 406
- sameopenfile() (in module os.path), 388
- samestat() (in module os.path), 388
- sample() (in module random), 325
- save() (http.cookiejar.FileCookieJar method), 1286
- SAVEDCWD (in module test.support), 1587
- SaveKey() (in module winreg), 1838
- SaveSignals (class in test.support), 1598
- savetty() (in module curses), 690
- SAX2DOM (class in xml.dom.pulldom), 1150
- SAXException, 1152
- SAXNotRecognizedException, 1152
- SAXNotSupportedException, 1152
- SAXParseException, 1152
- scaleb() (decimal.Context method), 310
- scaleb() (decimal.Decimal method), 304
- scandir() (in module os), 564
- scanf(), 123
- sched (module), 831
- SCHED_BATCH (in module os), 584
- SCHED_FIFO (in module os), 584
- sched_get_priority_max() (in module os), 584
- sched_get_priority_min() (in module os), 584
- sched_getaffinity() (in module os), 585
- sched_getparam() (in module os), 585
- sched_getscheduler() (in module os), 585
- SCHED_IDLE (in module os), 584
- SCHED_OTHER (in module os), 584
- sched_param (class in os), 584
- sched_priority (os.sched_param attribute), 584
- SCHED_RESET_ON_FORK (in module os), 584
- SCHED_RR (in module os), 584
- sched_rr_get_interval() (in module os), 585
- sched_setaffinity() (in module os), 585
- sched_setparam() (in module os), 585
- sched_setscheduler() (in module os), 585
- SCHED_SPORADIC (in module os), 584
- sched_yield() (in module os), 585
- scheduler (class in sched), 831
- schema (in module msilib), 1832
- Screen (class in turtle), 1386
- screensize() (in module turtle), 1380
- script_from_examples() (in module doctest), 1489
- scroll() (curses.window method), 697
- ScrolledCanvas (class in turtle), 1386
- scrollok() (curses.window method), 697
- script() (in module hashlib), 528
- seal() (in module unittest.mock), 1558
- search
 - path, module, 405, 1670, 1742
- search() (imaplib.IMAP4 method), 1240
- search() (in module re), 115
- search() (re.Pattern method), 118
- second (datetime.datetime attribute), 185
- second (datetime.time attribute), 192
- seconds since the epoch, 600
- secrets (module), 537
- SECTCRE (configparser.ConfigParser attribute), 510
- sections() (configparser.ConfigParser method), 513
- secure (http.cookiejar.Cookie attribute), 1291

- secure hash algorithm, SHA1, SHA224, SHA256, SHA384, SHA512, 525
- Secure Sockets Layer, 950
- security
 - CGI, 1180
- see() (tkinter.ttk.Treeview method), 1428
- seed() (in module random), 324
- seek() (chunk.Chunk method), 1332
- seek() (io.IOBase method), 591
- seek() (io.TextIOBase method), 597
- seek() (mmap.mmap method), 1012
- SEEK_CUR (in module os), 550
- SEEK_END (in module os), 550
- SEEK_SET (in module os), 550
- seekable() (io.IOBase method), 592
- seen_greeting (smtpd.SMTPChannel attribute), 1259
- Select (class in tkinter.tix), 1435
- select (module), 985
- select() (imaplib.IMAP4 method), 1240
- select() (in module select), 986
- select() (selectors.BaseSelector method), 994
- select() (tkinter.ttk.Notebook method), 1422
- selected_alpn_protocol() (ssl.SSLSocket method), 966
- selected_npn_protocol() (ssl.SSLSocket method), 966
- selection() (tkinter.ttk.Treeview method), 1429
- selection_add() (tkinter.ttk.Treeview method), 1429
- selection_remove() (tkinter.ttk.Treeview method), 1429
- selection_set() (tkinter.ttk.Treeview method), 1429
- selection_toggle() (tkinter.ttk.Treeview method), 1429
- selector (urllib.request.Request attribute), 1198
- SelectorEventLoop (class in asyncio), 892
- SelectorKey (class in selectors), 993
- selectors (module), 992
- SelectSelector (class in selectors), 994
- Semaphore (class in asyncio), 866
- Semaphore (class in multiprocessing), 780
- Semaphore (class in threading), 759
- Semaphore() (multiprocessing.managers.SyncManager method), 786
- semaphores, binary, 836
- SEMI (in module token), 1794
- send() (asyncore.dispatcher method), 998
- send() (http.client.HTTPConnection method), 1226
- send() (imaplib.IMAP4 method), 1241
- send() (logging.handlers.DatagramHandler method), 678
- send() (logging.handlers.SocketHandler method), 677
- send() (multiprocessing.connection.Connection method), 777
- send() (socket.socket method), 943
- send_bytes() (multiprocessing.connection.Connection method), 777
- send_error() (http.server.BaseHTTPRequestHandler method), 1277
- send_flowing_data() (formatter.writer method), 1824
- send_header() (http.server.BaseHTTPRequestHandler method), 1277
- send_hor_rule() (formatter.writer method), 1824
- send_label_data() (formatter.writer method), 1824
- send_line_break() (formatter.writer method), 1824
- send_literal_data() (formatter.writer method), 1824
- send_message() (smtplib.SMTP method), 1255
- send_paragraph() (formatter.writer method), 1824
- send_response() (http.server.BaseHTTPRequestHandler method), 1277
- send_response_only() (http.server.BaseHTTPRequestHandler method), 1277
- send_signal() (asyncio.asyncio.subprocess.Process method), 869
- send_signal() (asyncio.SubprocessTransport method), 903
- send_signal() (subprocess.Popen method), 822
- sendall() (socket.socket method), 943
- sendcmd() (ftplib.FTP method), 1231
- sendfile() (asyncio.loop method), 883
- sendfile() (in module os), 554
- sendfile() (socket.socket method), 944
- sendfile() (wsgiref.handlers.BaseHandler method), 1191
- SendfileNotAvailableError, 874
- sendmail() (smtplib.SMTP method), 1254
- sendmsg() (socket.socket method), 943
- sendmsg_afalg() (socket.socket method), 944
- sendto() (asyncio.DatagramTransport method), 902
- sendto() (socket.socket method), 943
- sentinel (in module unittest.mock), 1550
- sentinel (multiprocessing.Process attribute), 771
- sep (in module os), 586
- sequence, 1909
 - iteration, 36
 - object, 37
 - types, immutable, 39
 - types, mutable, 39
 - types, operations on, 37, 39
- Sequence (class in collections.abc), 229
- Sequence (class in typing), 1460
- sequence (in module msilib), 1832
- sequence2st() (in module parser), 1782
- SequenceMatcher (class in difflib), 128, 132
- serializing

- objects, 415
- serve_forever() (asyncio.Server method), 891
- serve_forever() (socketserver.BaseServer method), 1268
- server
 - WWW, 1175, 1274
- Server (class in asyncio), 890
- server (http.server.BaseHTTPRequestHandler attribute), 1275
- server_activate() (socketserver.BaseServer method), 1270
- server_address (socketserver.BaseServer attribute), 1269
- server_bind() (socketserver.BaseServer method), 1270
- server_close() (socketserver.BaseServer method), 1269
- server_hostname (ssl.SSLSocket attribute), 967
- server_side (ssl.SSLSocket attribute), 967
- server_software (wsgiref.handlers.BaseHandler attribute), 1190
- server_version (http.server.BaseHTTPRequestHandler attribute), 1276
- server_version (http.server.SimpleHTTPRequestHandler attribute), 1278
- ServerProxy (class in xmlrpc.client), 1293
- service_actions() (socketserver.BaseServer method), 1268
- session (ssl.SSLSocket attribute), 967
- session_reused (ssl.SSLSocket attribute), 967
- session_stats() (ssl.SSLContext method), 973
- set
 - object, 74
- set (built-in class), 75
- Set (class in collections.abc), 229
- Set (class in typing), 1460
- Set Breakpoint, 1442
- set() (asyncio.Event method), 864
- set() (configparser.ConfigParser method), 515
- set() (configparser.RawConfigParser method), 517
- set() (contextvars.ContextVar method), 839
- set() (http.cookies.Morsel method), 1282
- set() (ossaudiodev.oss_mixer_device method), 1339
- set() (test.support.EnvironmentVarGuard method), 1597
- set() (threading.Event method), 760
- set() (tkinter.ttk.Combobox method), 1419
- set() (tkinter.ttk.Spinbox method), 1420
- set() (tkinter.ttk.Treeview method), 1429
- set() (xml.etree.ElementTree.Element method), 1128
- SET_ADD (opcode), 1813
- set_allowed_domains()
 - (http.cookiejar.DefaultCookiePolicy method), 1289
- set_alpn_protocols() (ssl.SSLContext method), 970
- set_app()
 - (wsgiref.simple_server.WSGIServer method), 1187
- set_asyncgen_hooks() (in module sys), 1673
- set_authorizer() (sqlite3.Connection method), 444
- set_auto_history() (in module readline), 147
- set_blocked_domains()
 - (http.cookiejar.DefaultCookiePolicy method), 1289
- set_blocking() (in module os), 554
- set_boundary()
 - (email.message.EmailMessage method), 1019
- set_boundary() (email.message.Message method), 1059
- set_break() (bdb.Bdb method), 1604
- set_charset() (email.message.Message method), 1055
- set_child_watcher()
 - (asyncio.AbstractEventLoopPolicy method), 913
- set_child_watcher() (in module asyncio), 913
- set_children() (tkinter.ttk.Treeview method), 1426
- set_ciphers() (ssl.SSLContext method), 970
- set_completer() (in module readline), 148
- set_completer_delims() (in module readline), 148
- set_completion_display_matches_hook() (in module readline), 148
- set_content() (email.contentmanager.ContentManager method), 1043
- set_content()
 - (email.message.EmailMessage method), 1021
- set_content() (in module email.contentmanager), 1044
- set_continue() (bdb.Bdb method), 1604
- set_cookie() (http.cookiejar.CookieJar method), 1286
- set_cookie_if_ok() (http.cookiejar.CookieJar method), 1286
- set_coroutine_origin_tracking_depth() (in module sys), 1673
- set_coroutine_wrapper() (in module sys), 1674
- set_current() (msilib.Feature method), 1831
- set_data() (importlib.abc.SourceLoader method), 1767
- set_data() (importlib.machinery.SourceFileLoader method), 1772
- set_date() (mailbox.MaildirMessage method), 1092
- set_debug() (asyncio.loop method), 889
- set_debug() (in module gc), 1723
- set_debuglevel() (ftplib.FTP method), 1230
- set_debuglevel()
 - (http.client.HTTPConnection method), 1225
- set_debuglevel() (nntplib.NNTP method), 1249
- set_debuglevel() (poplib.POP3 method), 1235
- set_debuglevel() (smtplib.SMTP method), 1252

- [set_debuglevel\(\)](#) (telnetlib.Telnet method), [1261](#)
[set_default_executor\(\)](#) (asyncio.loop method), [887](#)
[set_default_type\(\)](#) (email.message.EmailMessage method), [1018](#)
[set_default_type\(\)](#) (email.message.Message method), [1057](#)
[set_default_verify_paths\(\)](#) (ssl.SSLContext method), [970](#)
[set_defaults\(\)](#) (argparse.ArgumentParser method), [639](#)
[set_defaults\(\)](#) (optparse.OptionParser method), [1883](#)
[set_ecdh_curve\(\)](#) (ssl.SSLContext method), [971](#)
[set_errno\(\)](#) (in module ctypes), [744](#)
[set_event_loop\(\)](#) (asyncio.AbstractEventLoopPolicy method), [913](#)
[set_event_loop\(\)](#) (in module asyncio), [875](#)
[set_event_loop_policy\(\)](#) (in module asyncio), [912](#)
[set_exception\(\)](#) (asyncio.Future method), [896](#)
[set_exception\(\)](#) (concurrent.futures.Future method), [812](#)
[set_exception_handler\(\)](#) (asyncio.loop method), [888](#)
[set_executable\(\)](#) (in module multiprocessing), [776](#)
[set_flags\(\)](#) (mailbox.MaildirMessage method), [1092](#)
[set_flags\(\)](#) (mailbox.mboxMessage method), [1094](#)
[set_flags\(\)](#) (mailbox.MMDFMessage method), [1098](#)
[set_from\(\)](#) (mailbox.mboxMessage method), [1093](#)
[set_from\(\)](#) (mailbox.MMDFMessage method), [1097](#)
[set_handle_inheritable\(\)](#) (in module os), [557](#)
[set_history_length\(\)](#) (in module readline), [147](#)
[set_info\(\)](#) (mailbox.MaildirMessage method), [1092](#)
[set_inheritable\(\)](#) (in module os), [556](#)
[set_inheritable\(\)](#) (socket.socket method), [944](#)
[set_labels\(\)](#) (mailbox.BabylMessage method), [1096](#)
[set_last_error\(\)](#) (in module ctypes), [744](#)
[set_literal](#) (2to3 fixer), [1583](#)
[set_loader\(\)](#) (in module importlib.util), [1776](#)
[set_match_tests\(\)](#) (in module test.support), [1589](#)
[set_memlimit\(\)](#) (in module test.support), [1591](#)
[set_next\(\)](#) (bdb.Bdb method), [1603](#)
[set_nonstandard_attr\(\)](#) (http.cookiejar.Cookie method), [1291](#)
[set_npn_protocols\(\)](#) (ssl.SSLContext method), [970](#)
[set_ok\(\)](#) (http.cookiejar.CookiePolicy method), [1287](#)
[set_option_negotiation_callback\(\)](#) (telnetlib.Telnet method), [1262](#)
[set_output_charset\(\)](#) (gettext.NullTranslations method), [1344](#)
[set_package\(\)](#) (in module importlib.util), [1776](#)
[set_param\(\)](#) (email.message.EmailMessage method), [1018](#)
[set_param\(\)](#) (email.message.Message method), [1058](#)
[set_pasv\(\)](#) (ftplib.FTP method), [1231](#)
[set_payload\(\)](#) (email.message.Message method), [1055](#)
[set_policy\(\)](#) (http.cookiejar.CookieJar method), [1286](#)
[set_position\(\)](#) (xdrlib.Unpacker method), [520](#)
[set_pre_input_hook\(\)](#) (in module readline), [148](#)
[set_progress_handler\(\)](#) (sqlite3.Connection method), [444](#)
[set_protocol\(\)](#) (asyncio.BaseTransport method), [900](#)
[set_proxy\(\)](#) (urllib.request.Request method), [1199](#)
[set_quit\(\)](#) (bdb.Bdb method), [1604](#)
[set_recsrc\(\)](#) (ossaudiodev.oss_mixer_device method), [1339](#)
[set_result\(\)](#) (asyncio.Future method), [896](#)
[set_result\(\)](#) (concurrent.futures.Future method), [812](#)
[set_return\(\)](#) (bdb.Bdb method), [1603](#)
[set_running_or_notify_cancel\(\)](#) (concurrent.futures.Future method), [812](#)
[set_seq1\(\)](#) (difflib.SequenceMatcher method), [133](#)
[set_seq2\(\)](#) (difflib.SequenceMatcher method), [133](#)
[set_seqs\(\)](#) (difflib.SequenceMatcher method), [133](#)
[set_sequences\(\)](#) (mailbox.MH method), [1089](#)
[set_sequences\(\)](#) (mailbox.MHMessage method), [1095](#)
[set_server_documentation\(\)](#) (xmlrpc.server.DocCGIXMLRPCRequestHandler method), [1306](#)
[set_server_documentation\(\)](#) (xmlrpc.server.DocXMLRPCServer method), [1306](#)
[set_server_name\(\)](#) (xmlrpc.server.DocCGIXMLRPCRequestHandler method), [1306](#)
[set_server_name\(\)](#) (xmlrpc.server.DocXMLRPCServer method), [1306](#)
[set_server_title\(\)](#) (xmlrpc.server.DocCGIXMLRPCRequestHandler method), [1306](#)
[set_server_title\(\)](#) (xmlrpc.server.DocXMLRPCServer method), [1306](#)
[set_servername_callback](#) (ssl.SSLContext attribute), [971](#)
[set_spacing\(\)](#) (formatter.formatter method), [1823](#)
[set_start_method\(\)](#) (in module multiprocessing), [777](#)
[set_startup_hook\(\)](#) (in module readline), [147](#)
[set_step\(\)](#) (bdb.Bdb method), [1603](#)
[set_subdir\(\)](#) (mailbox.MaildirMessage method), [1092](#)
[set_task_factory\(\)](#) (asyncio.loop method), [879](#)
[set_terminator\(\)](#) (asynchat.async_chat method), [1001](#)

- set_threshold() (in module gc), 1724
- set_trace() (bdb.Bdb method), 1604
- set_trace() (in module bdb), 1605
- set_trace() (in module pdb), 1609
- set_trace() (pdb.Pdb method), 1610
- set_trace_callback() (sqlite3.Connection method), 444
- set_tunnel() (http.client.HTTPConnection method), 1225
- set_type() (email.message.Message method), 1058
- set_unittest_reportflags() (in module doctest), 1483
- set_unixfrom() (email.message.EmailMessage method), 1016
- set_unixfrom() (email.message.Message method), 1054
- set_until() (bdb.Bdb method), 1604
- set_url() (urllib.robotparser.RobotFileParser method), 1219
- set_usage() (optparse.OptionParser method), 1883
- set_userptr() (curses.panel.Panel method), 707
- set_visible() (mailbox.BabylMessage method), 1096
- set_wakeup_fd() (in module signal), 1006
- set_write_buffer_limits() (asyncio.WriteTransport method), 901
- setacl() (imaplib.IMAP4 method), 1241
- setannotation() (imaplib.IMAP4 method), 1241
- setattr() (built-in function), 21
- setAttribute() (xml.dom.Element method), 1140
- setAttributeNode() (xml.dom.Element method), 1140
- setAttributeNodeNS() (xml.dom.Element method), 1140
- setAttributeNS() (xml.dom.Element method), 1140
- SetBase() (xml.parsers.expat.xmlparser method), 1164
- setblocking() (socket.socket method), 944
- setByteStream() (xml.sax.xmlreader.InputSource method), 1161
- setcbreak() (in module tty), 1852
- setCharacterStream() (xml.sax.xmlreader.InputSource method), 1162
- setcheckinterval() (in module sys), 1671
- setcomptype() (aifc.aifc method), 1326
- setcomptype() (sunau.AU_write method), 1329
- setcomptype() (wave.Wave_write method), 1331
- setContentHandler() (xml.sax.xmlreader.XMLReader method), 1160
- setcontext() (in module decimal), 305
- setDaemon() (threading.Thread method), 754
- setdefault() (dict method), 79
- setdefault() (http.cookies.Morsel method), 1282
- setdefaulttimeout() (in module socket), 938
- setdlopenflags() (in module sys), 1671
- setDocumentLocator() (xml.sax.handler.ContentHandler method), 1155
- setDTDHandler() (xml.sax.xmlreader.XMLReader method), 1160
- setegid() (in module os), 545
- setEncoding() (xml.sax.xmlreader.InputSource method), 1161
- setEntityResolver() (xml.sax.xmlreader.XMLReader method), 1160
- setErrorHandler() (xml.sax.xmlreader.XMLReader method), 1160
- seteuid() (in module os), 546
- setFeature() (xml.sax.xmlreader.XMLReader method), 1160
- setfirstweekday() (in module calendar), 209
- setfmt() (ossaudiodev.oss_audio_device method), 1337
- setFormatter() (logging.Handler method), 650
- setframerate() (aifc.aifc method), 1326
- setframerate() (sunau.AU_write method), 1329
- setframerate() (wave.Wave_write method), 1331
- setgid() (in module os), 546
- setgroups() (in module os), 546
- seth() (in module turtle), 1363
- setheading() (in module turtle), 1363
- sethostname() (in module socket), 938
- SetInteger() (msilib.Record method), 1830
- setitem() (in module operator), 362
- setitimer() (in module signal), 1005
- setLevel() (logging.Handler method), 650
- setLevel() (logging.Logger method), 646
- setlocale() (in module locale), 1349
- setLocale() (xml.sax.xmlreader.XMLReader method), 1160
- setLoggerClass() (in module logging), 660
- setlogmask() (in module syslog), 1862
- setLogRecordFactory() (in module logging), 660
- setmark() (aifc.aifc method), 1326
- setMaxConns() (urllib.request.CacheFTPHandler method), 1204
- setmode() (in module msvcrt), 1833
- setName() (threading.Thread method), 754
- setnchannels() (aifc.aifc method), 1326
- setnchannels() (sunau.AU_write method), 1328
- setnchannels() (wave.Wave_write method), 1331
- setnframes() (aifc.aifc method), 1326
- setnframes() (sunau.AU_write method), 1329
- setnframes() (wave.Wave_write method), 1331
- SetParamEntityParsing() (xml.parsers.expat.xmlparser method), 1164
- setparameters() (ossaudiodev.oss_audio_device method), 1338
- setparams() (aifc.aifc method), 1326

- setparams() (sunau.AU_write method), 1329
- setparams() (wave.Wave_write method), 1331
- setpassword() (zipfile.ZipFile method), 477
- setpgid() (in module os), 546
- setpgrp() (in module os), 546
- setpos() (aifc.aifc method), 1325
- setpos() (in module turtle), 1363
- setpos() (sunau.AU_read method), 1328
- setpos() (wave.Wave_read method), 1330
- setposition() (in module turtle), 1363
- setpriority() (in module os), 546
- setprofile() (in module sys), 1671
- setprofile() (in module threading), 752
- SetProperty() (msilib.SummaryInformation method), 1829
- setProperty() (xml.sax.xmlreader.XMLReader method), 1160
- setPublicId() (xml.sax.xmlreader.InputSource method), 1161
- setquota() (imaplib.IMAP4 method), 1241
- setraw() (in module tty), 1852
- setrecursionlimit() (in module sys), 1672
- setregid() (in module os), 546
- setresgid() (in module os), 546
- setresuid() (in module os), 546
- setreuid() (in module os), 547
- setrlimit() (in module resource), 1857
- setsampwidth() (aifc.aifc method), 1326
- setsampwidth() (sunau.AU_write method), 1328
- setsampwidth() (wave.Wave_write method), 1331
- setscrreg() (curses.window method), 697
- setsid() (in module os), 547
- setsockopt() (socket.socket method), 945
- setstate() (codecs.IncrementalDecoder method), 163
- setstate() (codecs.IncrementalEncoder method), 162
- setstate() (in module random), 324
- setStream() (logging.StreamHandler method), 672
- SetStream() (msilib.Record method), 1829
- SetString() (msilib.Record method), 1829
- setswitchinterval() (in module sys), 1672
- setswitchinterval() (in module test.support), 1589
- setSystemId() (xml.sax.xmlreader.InputSource method), 1161
- setsyx() (in module curses), 690
- setTarget() (logging.handlers.MemoryHandler method), 682
- settiltangle() (in module turtle), 1375
- settimeout() (socket.socket method), 944
- setTimeout() (urllib.request.CacheFTPHandler method), 1204
- settrace() (in module sys), 1672
- settrace() (in module threading), 752
- setuid() (in module os), 547
- setundobuffer() (in module turtle), 1378
- setup() (in module turtle), 1385
- setup() (socketserver.BaseRequestHandler method), 1270
- setUp() (unittest.TestCase method), 1502
- SETUP_ANNOTATIONS (opcode), 1813
- SETUP_ASYNC_WITH (opcode), 1812
- setup_environ() (wsgiref.handlers.BaseHandler method), 1190
- SETUP_EXCEPT (opcode), 1816
- SETUP_FINALLY (opcode), 1816
- SETUP_LOOP (opcode), 1816
- setup_python() (venv.EnvBuilder method), 1647
- setup_scripts() (venv.EnvBuilder method), 1647
- setup_testing_defaults() (in module wsgiref.util), 1184
- SETUP_WITH (opcode), 1813
- setUpClass() (unittest.TestCase method), 1502
- setupterm() (in module curses), 690
- SetValue() (in module winreg), 1838
- SetValueEx() (in module winreg), 1838
- setworldcoordinates() (in module turtle), 1380
- setx() (in module turtle), 1363
- setxattr() (in module os), 575
- sety() (in module turtle), 1363
- SF_APPEND (in module stat), 396
- SF_ARCHIVED (in module stat), 396
- SF_IMMUTABLE (in module stat), 396
- SF_MNOWAIT (in module os), 555
- SF_NODISKIO (in module os), 555
- SF_NOUNLINK (in module stat), 396
- SF_SNAPSHOT (in module stat), 396
- SF_SYNC (in module os), 555
- Shape (class in turtle), 1386
- shape (memoryview attribute), 74
- shape() (in module turtle), 1373
- shapessize() (in module turtle), 1374
- shapetransform() (in module turtle), 1375
- share() (socket.socket method), 945
- shared_ciphers() (ssl.SSLSocket method), 965
- shearfactor() (in module turtle), 1374
- Shelf (class in shelve), 430
- shelve
 - module, 432
- shelve (module), 429
- shift() (decimal.Context method), 310
- shift() (decimal.Decimal method), 304
- shift_path_info() (in module wsgiref.util), 1184
- shifting
 - operations, 32
- shlex (class in shlex), 1398
- shlex (module), 1397
- shortDescription() (unittest.TestCase method), 1510
- shorten() (in module textwrap), 139

- `shouldFlush()` (`logging.handlers.BufferingHandler` method), 682
- `shouldFlush()` (`logging.handlers.MemoryHandler` method), 682
- `shouldStop` (`unittest.TestResult` attribute), 1515
- `show()` (`curses.panel.Panel` method), 707
- `show_code()` (in module `dis`), 1808
- `showsyntaxerror()` (`code.InteractiveInterpreter` method), 1748
- `showtraceback()` (`code.InteractiveInterpreter` method), 1748
- `showturtle()` (in module `turtle`), 1373
- `showwarning()` (in module `warnings`), 1686
- `shuffle()` (in module `random`), 325
- `shutdown()` (`concurrent.futures.Executor` method), 808
- `shutdown()` (`imaplib.IMAP4` method), 1241
- `shutdown()` (in module `logging`), 660
- `shutdown()` (`multiprocessing.managers.BaseManager` method), 785
- `shutdown()` (`socketserver.BaseServer` method), 1269
- `shutdown()` (`socket.socket` method), 945
- `shutdown_asyncgens()` (`asyncio.loop` method), 877
- `shutil` (module), 406
- `side_effect` (`unittest.mock.Mock` attribute), 1529
- `SIG_BLOCK` (in module `signal`), 1004
- `SIG_DFL` (in module `signal`), 1003
- `SIG_IGN` (in module `signal`), 1003
- `SIG_SETMASK` (in module `signal`), 1004
- `SIG_UNBLOCK` (in module `signal`), 1004
- `siginterrupt()` (in module `signal`), 1006
- `signal`
 - module, 837
- `signal` (module), 1002
- `signal()` (in module `signal`), 1006
- `Signature` (class in `inspect`), 1732
- `signature` (`inspect.BoundArguments` attribute), 1735
- `signature()` (in module `inspect`), 1731
- `sigpending()` (in module `signal`), 1007
- `sigtimedwait()` (in module `signal`), 1007
- `sigwait()` (in module `signal`), 1007
- `sigwaitinfo()` (in module `signal`), 1007
- Simple Mail Transfer Protocol, 1250
- `SimpleCookie` (class in `http.cookies`), 1281
- `simplefilter()` (in module `warnings`), 1687
- `SimpleHandler` (class in `wsgiref.handlers`), 1189
- `SimpleHTTPRequestHandler` (class in `http.server`), 1278
- `SimpleNamespace` (class in `types`), 251
- `SimpleQueue` (class in `multiprocessing`), 775
- `SimpleQueue` (class in `queue`), 833
- `SimpleXMLRPCRequestHandler` (class in `xmlrpc.server`), 1301
- `SimpleXMLRPCServer` (class in `xmlrpc.server`), 1300
- `sin()` (in module `cmath`), 291
- `sin()` (in module `math`), 288
- single dispatch, 1910
- `SingleAddressHeader` (class in `email.headerregistry`), 1040
- `singledispatch()` (in module `functools`), 356
- `sinh()` (in module `cmath`), 291
- `sinh()` (in module `math`), 288
- `SIO_KEEPALIVE_VALS` (in module `socket`), 932
- `SIO_LOOPBACK_FAST_PATH` (in module `socket`), 932
- `SIO_RCVALL` (in module `socket`), 932
- `site` (module), 1742
- site command line option
 - `-user-base`, 1744
 - `-user-site`, 1745
- `sitecustomize`
 - module, 1743
- site-packages
 - directory, 1742
- `sixtofour` (`ipaddress.IPv6Address` attribute), 1310
- `size` (`struct.Struct` attribute), 156
- `size` (`tarfile.TarInfo` attribute), 487
- `size` (`tracemalloc.Statistic` attribute), 1638
- `size` (`tracemalloc.StatisticDiff` attribute), 1638
- `size` (`tracemalloc.Trace` attribute), 1638
- `size()` (`ftplib.FTP` method), 1233
- `size()` (`mmap.mmap` method), 1012
- `size_diff` (`tracemalloc.StatisticDiff` attribute), 1638
- `Sized` (class in `collections.abc`), 228
- `Sized` (class in `typing`), 1459
- `sizeof()` (in module `ctypes`), 744
- `SKIP` (in module `doctest`), 1477
- `skip()` (`chunk.Chunk` method), 1333
- `skip()` (in module `unittest`), 1500
- `skip_unless_bind_unix_socket()` (in module `test.support`), 1593
- `skip_unless_symlink()` (in module `test.support`), 1593
- `skip_unless_xattr()` (in module `test.support`), 1593
- `skipIf()` (in module `unittest`), 1500
- `skipinitialspace` (`csv.Dialect` attribute), 497
- `skipped` (`unittest.TestResult` attribute), 1515
- `skippedEntity()` (`xml.sax.handler.ContentHandler` method), 1156
- `SkipTest`, 1500
- `skipTest()` (`unittest.TestCase` method), 1503
- `skipUnless()` (in module `unittest`), 1500
- `SLASH` (in module `token`), 1794
- `SLASHEQUAL` (in module `token`), 1794
- `slave()` (`nntplib.NNTP` method), 1249
- `sleep()` (in module `asyncio`), 848
- `sleep()` (in module `time`), 604
- `slice`, 1910

- assignment, 39
- built-in function, 1818
- operation, 37
- slice (built-in class), 22
- SMTP
 - protocol, 1250
- SMTP (class in `smtplib`), 1250
- SMTP (in module `email.policy`), 1035
- `smtp_server` (`smtpd.SMTPChannel` attribute), 1258
- SMTP_SSL (class in `smtplib`), 1250
- `smtp_state` (`smtpd.SMTPChannel` attribute), 1259
- SMTPAuthenticationError, 1252
- SMTPChannel (class in `smtpd`), 1258
- SMTPConnectError, 1251
- `smtpd` (module), 1256
- SMTPDataError, 1251
- SMTPException, 1251
- SMTPHandler (class in `logging.handlers`), 681
- SMTPHeloError, 1251
- `smtplib` (module), 1250
- SMTPNotSupportedError, 1251
- SMTPRecipientsRefused, 1251
- SMTPResponseException, 1251
- SMTPSenderRefused, 1251
- SMTPServer (class in `smtpd`), 1257
- SMTPServerDisconnected, 1251
- SMTPUTF8 (in module `email.policy`), 1035
- Snapshot (class in `tracemalloc`), 1637
- SND_ALIAS (in module `winsound`), 1842
- SND_ASYNC (in module `winsound`), 1843
- SND_FILENAME (in module `winsound`), 1842
- SND_LOOP (in module `winsound`), 1843
- SND_MEMORY (in module `winsound`), 1843
- SND_NODEFAULT (in module `winsound`), 1843
- SND_NOSTOP (in module `winsound`), 1843
- SND_NOWAIT (in module `winsound`), 1843
- SND_PURGE (in module `winsound`), 1843
- `sndhdr` (module), 1334
- `sni_callback` (`ssl.SSLContext` attribute), 971
- `sniff()` (`csv.Sniffer` method), 496
- Sniffer (class in `csv`), 496
- `sock_accept()` (`asyncio.loop` method), 885
- SOCK_CLOEXEC (in module `socket`), 930
- `sock_connect()` (`asyncio.loop` method), 884
- SOCK_DGRAM (in module `socket`), 930
- SOCK_MAX_SIZE (in module `test.support`), 1588
- SOCK_NONBLOCK (in module `socket`), 930
- SOCK_RAW (in module `socket`), 930
- SOCK_RDM (in module `socket`), 930
- `sock_recv()` (`asyncio.loop` method), 884
- `sock_recv_into()` (`asyncio.loop` method), 884
- `sock_sendall()` (`asyncio.loop` method), 884
- `sock_sendfile()` (`asyncio.loop` method), 885
- SOCK_SEQPACKET (in module `socket`), 930
- SOCK_STREAM (in module `socket`), 930
- socket
 - module, 1173
 - object, 927
- socket (module), 927
- socket (`socketserver.BaseServer` attribute), 1269
- `socket()` (`imaplib.IMAP4` method), 1241
- `socket()` (in module `socket`), 933, 987
- `socket_type` (`socketserver.BaseServer` attribute), 1269
- SocketHandler (class in `logging.handlers`), 677
- `socketpair()` (in module `socket`), 933
- sockets (`asyncio.Server` attribute), 892
- socketserver (module), 1266
- SocketType (in module `socket`), 934
- SOL_ALG (in module `socket`), 932
- SOL_RDS (in module `socket`), 932
- SOMAXCONN (in module `socket`), 931
- `sort()` (`imaplib.IMAP4` method), 1241
- `sort()` (list method), 41
- `sort_stats()` (`pstats.Stats` method), 1618
- `sortdict()` (in module `test.support`), 1589
- `sorted()` (built-in function), 22
- sort-keys
 - `json.tool` command line option, 1081
- `sortTestMethodsUsing` (`unittest.TestLoader` attribute), 1514
- source (`doctest.Example` attribute), 1485
- source (`pdb` command), 1613
- source (`shlex.shlex` attribute), 1400
- SOURCE_DATE_EPOCH, 1802, 1804
- `source_from_cache()` (in module `imp`), 1892
- `source_from_cache()` (in module `importlib.util`), 1775
- `source_hash()` (in module `importlib.util`), 1776
- SOURCE_SUFFIXES (in module `importlib.machinery`), 1770
- `source_to_code()` (`importlib.abc.InspectLoader` static method), 1766
- SourceFileLoader (class in `importlib.machinery`), 1772
- `sourcehook()` (`shlex.shlex` method), 1399
- SourcelessFileLoader (class in `importlib.machinery`), 1772
- SourceLoader (class in `importlib.abc`), 1767
- space
 - in printf-style formatting, 52, 66
 - in string formatting, 101
- `span()` (`re.Match` method), 122
- `spawn()` (in module `pty`), 1852
- `spawn_python()` (in module `test.support.script_helper`), 1599
- `spawnl()` (in module `os`), 579
- `spawnle()` (in module `os`), 579

- spawnlp() (in module os), 579
- spawnlpe() (in module os), 579
- spawnv() (in module os), 579
- spawnve() (in module os), 579
- spawnvp() (in module os), 579
- spawnvpe() (in module os), 579
- spec_from_file_location() (in module importlib.util), 1776
- spec_from_loader() (in module importlib.util), 1776
- special method, 1910
- specified_attributes (xml.parsers.expat.xmlparser attribute), 1165
- speed() (in module turtle), 1366
- speed() (ossaudiodev.oss_audio_device method), 1337
- Spinbox (class in tkinter.ttk), 1420
- split() (bytearray method), 60
- split() (bytes method), 60
- split() (in module os.path), 388
- split() (in module re), 115
- split() (in module shlex), 1397
- split() (re.Pattern method), 119
- split() (str method), 48
- splitdrive() (in module os.path), 389
- splittext() (in module os.path), 389
- splitlines() (bytearray method), 63
- splitlines() (bytes method), 63
- splitlines() (str method), 49
- SplitResult (class in urllib.parse), 1215
- SplitResultBytes (class in urllib.parse), 1216
- SpooledTemporaryFile() (in module tempfile), 399
- sprintf-style formatting, 51, 66
- spwd (module), 1847
- sqlite3 (module), 437
- sqlite_version (in module sqlite3), 439
- sqlite_version_info (in module sqlite3), 439
- sqrt() (decimal.Context method), 310
- sqrt() (decimal.Decimal method), 304
- sqrt() (in module cmath), 291
- sqrt() (in module math), 287
- SSL, 950
- ssl (module), 950
- SSL_CERT_FILE, 985
- SSL_CERT_PATH, 985
- ssl_version (ftplib.FTP_TLS attribute), 1233
- SSLCertVerificationError, 953
- SSLContext (class in ssl), 967
- SSLEOFError, 953
- SSLError, 952
- SSLErrorNumber (class in ssl), 962
- SSLObject (class in ssl), 981
- sslobject_class (ssl.SSLContext attribute), 973
- SSLSession (class in ssl), 982
- SSLSocket (class in ssl), 963
- sslsocket_class (ssl.SSLContext attribute), 972
- SSLSyscallError, 953
- SSLv3 (ssl.TLSVersion attribute), 963
- SSLWantReadError, 953
- SSLWantWriteError, 953
- SSLZeroReturnError, 952
- st() (in module turtle), 1373
- st2list() (in module parser), 1783
- st2tuple() (in module parser), 1783
- ST_ETIME (in module stat), 393
- st_atime (os.stat_result attribute), 568
- st_atime_ns (os.stat_result attribute), 568
- st_birthtime (os.stat_result attribute), 569
- st_blksize (os.stat_result attribute), 568
- st_blocks (os.stat_result attribute), 568
- st_creator (os.stat_result attribute), 569
- ST_CTIME (in module stat), 393
- st_ctime (os.stat_result attribute), 568
- st_ctime_ns (os.stat_result attribute), 568
- ST_DEV (in module stat), 393
- st_dev (os.stat_result attribute), 568
- st_file_attributes (os.stat_result attribute), 569
- st_flags (os.stat_result attribute), 569
- st_fstype (os.stat_result attribute), 569
- st_gen (os.stat_result attribute), 569
- ST_GID (in module stat), 393
- st_gid (os.stat_result attribute), 568
- ST_INO (in module stat), 393
- st_ino (os.stat_result attribute), 567
- ST_MODE (in module stat), 393
- st_mode (os.stat_result attribute), 567
- ST_MTIME (in module stat), 393
- st_mtime (os.stat_result attribute), 568
- st_mtime_ns (os.stat_result attribute), 568
- ST_NLINK (in module stat), 393
- st_nlink (os.stat_result attribute), 568
- st_rdev (os.stat_result attribute), 569
- st_rsize (os.stat_result attribute), 569
- ST_SIZE (in module stat), 393
- st_size (os.stat_result attribute), 568
- st_type (os.stat_result attribute), 569
- ST_UID (in module stat), 393
- st_uid (os.stat_result attribute), 568
- stack (traceback.TracebackException attribute), 1717
- stack viewer, 1441
- stack() (in module inspect), 1739
- stack_effect() (in module dis), 1809
- stack_size() (in module _thread), 836
- stack_size() (in module threading), 752
- stackable
 - streams, 156
- StackSummary (class in traceback), 1718
- stamp() (in module turtle), 1365

- standard_b64decode() (in module base64), 1104
- standard_b64encode() (in module base64), 1104
- standarderror (2to3 fixer), 1583
- standend() (curses.window method), 697
- standout() (curses.window method), 697
- STAR (in module token), 1794
- STAREQUAL (in module token), 1794
- starmap() (in module itertools), 346
- starmap() (multiprocessing.pool.Pool method), 792
- starmap_async() (multiprocessing.pool.Pool method), 792
- start (range attribute), 42
- start (UnicodeError attribute), 92
- start() (in module tracemalloc), 1635
- start() (logging.handlers.QueueListener method), 684
- start() (multiprocessing.managers.BaseManager method), 784
- start() (multiprocessing.Process method), 770
- start() (re.Match method), 121
- start() (threading.Thread method), 753
- start() (tkinter.ttk.Progressbar method), 1423
- start() (xml.etree.ElementTree.TreeBuilder method), 1131
- start_color() (in module curses), 690
- start_component() (msilib.Directory method), 1830
- start_new_thread() (in module _thread), 836
- start_server() (in module asyncio), 857
- start_serving() (asyncio.Server method), 891
- start_threads() (in module test.support), 1592
- start_tls() (asyncio.loop method), 883
- start_unix_server() (in module asyncio), 858
- StartCdataSectionHandler() (xml.parsers.expat.xmlparser method), 1167
- StartDoctypeDeclHandler() (xml.parsers.expat.xmlparser method), 1166
- startDocument() (xml.sax.handler.ContentHandler method), 1155
- startElement() (xml.sax.handler.ContentHandler method), 1155
- StartElementHandler() (xml.parsers.expat.xmlparser method), 1166
- startElementNS() (xml.sax.handler.ContentHandler method), 1156
- STARTF_USESHOWWINDOW (in module subprocess), 824
- STARTF_USESTDHANDLES (in module subprocess), 824
- startfile() (in module os), 581
- StartNamespaceDeclHandler() (xml.parsers.expat.xmlparser method), 1167
- startPrefixMapping() (xml.sax.handler.ContentHandler method), 1155
- startswith() (bytearray method), 58
- startswith() (bytes method), 58
- startswith() (str method), 50
- startTest() (unittest.TestResult method), 1516
- startTestRun() (unittest.TestResult method), 1516
- starttls() (imaplib.IMAP4 method), 1241
- starttls() (nntplib.NNTP method), 1246
- starttls() (smtplib.SMTP method), 1254
- STARTUPINFO (class in subprocess), 823
- stat
 - module, 567
- stat (module), 391
- stat() (in module os), 567
- stat() (nntplib.NNTP method), 1248
- stat() (os.DirEntry method), 566
- stat() (pathlib.Path method), 378
- stat() (poplib.POP3 method), 1235
- stat_result (class in os), 567
- state() (tkinter.ttk.Widget method), 1418
- statement, 1910
 - assert, 88
 - del, 39, 77
 - except, 87
 - if, 29
 - import, 25, 1742, 1890
 - raise, 87
 - try, 87
 - while, 29
- staticmethod() (built-in function), 22
- Statistic (class in tracemalloc), 1638
- StatisticDiff (class in tracemalloc), 1638
- statistics (module), 329
- statistics() (tracemalloc.Snapshot method), 1637
- StatisticsError, 335
- Stats (class in pstats), 1618
- status (http.client.HTTPResponse attribute), 1227
- status() (imaplib.IMAP4 method), 1241
- statvfs() (in module os), 569
- STD_ERROR_HANDLE (in module subprocess), 824
- STD_INPUT_HANDLE (in module subprocess), 824
- STD_OUTPUT_HANDLE (in module subprocess), 824
- StdButtonBox (class in tkinter.tix), 1435
- stderr (asyncio.asyncio.subprocess.Process attribute), 870
- stderr (in module sys), 1674
- stderr (subprocess.CalledProcessError attribute), 816
- stderr (subprocess.CompletedProcess attribute), 815
- stderr (subprocess.Popen attribute), 822

- stderr (subprocess.TimeoutExpired attribute), 816
- stdev() (in module statistics), 334
- stdin (asyncio.asyncio.subprocess.Process attribute), 870
- stdin (in module sys), 1674
- stdin (subprocess.Popen attribute), 822
- stdout (asyncio.asyncio.subprocess.Process attribute), 870
- STDOUT (in module subprocess), 815
- stdout (in module sys), 1674
- stdout (subprocess.CalledProcessError attribute), 816
- stdout (subprocess.CompletedProcess attribute), 815
- stdout (subprocess.Popen attribute), 822
- stdout (subprocess.TimeoutExpired attribute), 816
- step (pdb command), 1612
- step (range attribute), 42
- step() (tkinter.ttk.Progressbar method), 1423
- stereocontrols() (ossaudiodev.oss_mixer_device method), 1339
- stls() (poplib.POP3 method), 1236
- stop (range attribute), 42
- stop() (asyncio.loop method), 877
- stop() (in module tracemalloc), 1635
- stop() (logging.handlers.QueueListener method), 684
- stop() (tkinter.ttk.Progressbar method), 1423
- stop() (unittest.TestResult method), 1516
- stop_here() (bdb.Bdb method), 1603
- StopAsyncIteration, 91
- StopIteration, 90
- stopListening() (in module logging.config), 663
- stopTest() (unittest.TestResult method), 1516
- stopTestRun() (unittest.TestResult method), 1516
- storbinary() (ftplib.FTP method), 1231
- store() (imaplib.IMAP4 method), 1241
- STORE_ACTIONS (optparse.Option attribute), 1889
- STORE_ATTR (opcode), 1814
- STORE_DEREF (opcode), 1817
- STORE_FAST (opcode), 1816
- STORE_GLOBAL (opcode), 1814
- STORE_NAME (opcode), 1814
- STORE_SUBSCR (opcode), 1812
- storlines() (ftplib.FTP method), 1232
- str (built-in class), 44
 - (see also string), 43
- str() (in module locale), 1354
- strcoll() (in module locale), 1354
- StreamError, 483
- StreamHandler (class in logging), 672
- StreamReader (class in asyncio), 858
- StreamReader (class in codecs), 164
- streamreader (codecs.CodecInfo attribute), 157
- StreamReaderWriter (class in codecs), 165
- StreamRecoder (class in codecs), 165
- StreamRequestHandler (class in socketserver), 1270
- streams, 156
 - stackable, 156
- StreamWriter (class in asyncio), 859
- StreamWriter (class in codecs), 163
- streamwriter (codecs.CodecInfo attribute), 157
- strerror (OSError attribute), 90
- strerror() (in module os), 547
- strptime() (datetime.date method), 182
- strptime() (datetime.datetime method), 190
- strptime() (datetime.time method), 194
- strptime() (in module time), 604
- strict (csv.Dialect attribute), 497
- strict (in module email.policy), 1035
- strict_domain (http.cookiejar.DefaultCookiePolicy attribute), 1289
- strict_errors() (in module codecs), 160
- strict_ns_domain (http.cookiejar.DefaultCookiePolicy attribute), 1290
- strict_ns_set_initial_dollar (http.cookiejar.DefaultCookiePolicy attribute), 1290
- strict_ns_set_path (http.cookiejar.DefaultCookiePolicy attribute), 1290
- strict_ns_unverifiable (http.cookiejar.DefaultCookiePolicy attribute), 1290
- strict_rfc2965_unverifiable (http.cookiejar.DefaultCookiePolicy attribute), 1289
- strides (memoryview attribute), 74
- string
 - format() (built-in function), 12
 - formatting, printf, 51
 - interpolation, printf, 51
 - methods, 44
 - module, 1355
 - object, 43
 - str (built-in class), 44
 - str() (built-in function), 22
 - text sequence type, 43
- STRING (in module token), 1794
- string (module), 97
- string (re.Match attribute), 122
- string_at() (in module ctypes), 744
- StringIO (class in io), 599
- stringprep (module), 144
- strip() (bytearray method), 61
- strip() (bytes method), 61
- strip() (str method), 50
- strip_dirs() (pstats.Stats method), 1618
- strip_python_strerror() (in module test.support), 1591
- stripspaces (curses.textpad.Textbox attribute), 704

- strptime() (datetime.datetime class method), 185
- strptime() (in module time), 606
- struct
 - module, 945
- Struct (class in struct), 155
- struct (module), 151
- struct sequence, 1910
- struct_time (class in time), 606
- Structure (class in ctypes), 748
- structures
 - C, 151
- strxfrm() (in module locale), 1354
- STType (in module parser), 1784
- Style (class in tkinter.ttk), 1430
- sub() (in module operator), 361
- sub() (in module re), 116
- sub() (re.Pattern method), 119
- subdirs (filecmp.dircmp attribute), 398
- SubElement() (in module xml.etree.ElementTree), 1126
- submit() (concurrent.futures.Executor method), 808
- submodule_search_locations (importlib.machinery.ModuleSpec attribute), 1774
- subn() (in module re), 117
- subn() (re.Pattern method), 119
- subnet_of() (ipaddress.IPv4Network method), 1314
- subnet_of() (ipaddress.IPv6Network method), 1315
- subnets() (ipaddress.IPv4Network method), 1313
- subnets() (ipaddress.IPv6Network method), 1315
- Subnormal (class in decimal), 313
- suboffsets (memoryview attribute), 74
- subpad() (curses.window method), 697
- subprocess (module), 813
- subprocess_exec() (asyncio.loop method), 889
- subprocess_shell() (asyncio.loop method), 890
- SubprocessError, 815
- SubprocessProtocol (class in asyncio), 903
- SubprocessTransport (class in asyncio), 899
- subscribe() (imaplib.IMAP4 method), 1242
- subscript
 - assignment, 39
 - operation, 37
- subsequent_indent (textwrap.TextWrapper attribute), 141
- substitute() (string.Template method), 106
- subTest() (unittest.TestCase method), 1503
- subtract() (collections.Counter method), 214
- subtract() (decimal.Context method), 310
- subtype (email.headerregistry.ContentTypeHeader attribute), 1040
- subwin() (curses.window method), 697
- successful() (multiprocessing.pool.AsyncResult method), 793
- suffix_map (in module mimetypes), 1102
- suffix_map (mimetypes.MimeTypes attribute), 1102
- suite() (in module parser), 1782
- suiteClass (unittest.TestLoader attribute), 1514
- sum() (built-in function), 23
- summarize() (doctest.DocTestRunner method), 1488
- summarize_address_range() (in module ipaddress), 1318
- sunau (module), 1326
- super (pyclbr.Class attribute), 1801
- super() (built-in function), 23
- supernet() (ipaddress.IPv4Network method), 1313
- supernet() (ipaddress.IPv6Network method), 1315
- supernet_of() (ipaddress.IPv4Network method), 1314
- supernet_of() (ipaddress.IPv6Network method), 1315
- supports_bytes_environ (in module os), 547
- supports_dir_fd (in module os), 570
- supports_effective_ids (in module os), 570
- supports_fd (in module os), 570
- supports_follow_symlinks (in module os), 571
- supports_unicode_filenames (in module os.path), 389
- SupportsAbs (class in typing), 1459
- SupportsBytes (class in typing), 1459
- SupportsComplex (class in typing), 1459
- SupportsFloat (class in typing), 1459
- SupportsInt (class in typing), 1459
- SupportsRound (class in typing), 1459
- suppress() (in module contextlib), 1698
- SuppressCrashReport (class in test.support), 1597
- SW_HIDE (in module subprocess), 824
- swap_attr() (in module test.support), 1592
- swap_item() (in module test.support), 1592
- swapcase() (bytearray method), 64
- swapcase() (bytes method), 64
- swapcase() (str method), 50
- sym_name (in module symbol), 1793
- Symbol (class in symtable), 1792
- symbol (module), 1793
- SymbolTable (class in symtable), 1791
- symlink() (in module os), 571
- symlink_to() (pathlib.Path method), 383
- symmetric_difference() (frozenset method), 75
- symmetric_difference_update() (frozenset method), 76
- symtable (module), 1791
- symtable() (in module symtable), 1791
- sync() (dbm.dumb.dumbdbm method), 437
- sync() (dbm.gnu.gdbm method), 435
- sync() (in module os), 571
- sync() (ossaudiodev.oss_audio_device method), 1337

`sync()` (`shelve.Shelf` method), 430
`syncdown()` (`curses.window` method), 698
`synchronized()` (in module `multiprocessing.sharedctypes`), 783
`SyncManager` (class in `multiprocessing.managers`), 785
`syncok()` (`curses.window` method), 698
`syncup()` (`curses.window` method), 698
`SyntaxErr`, 1143
`SyntaxError`, 91
`SyntaxWarning`, 94
`sys`
 module, 18
`sys` (module), 1659
`sys_exc` (2to3 fixer), 1583
`sys_version` (`http.server.BaseHTTPRequestHandler` attribute), 1276
`sysconf()` (in module `os`), 586
`sysconf_names` (in module `os`), 586
`sysconfig` (module), 1676
`syslog` (module), 1861
`syslog()` (in module `syslog`), 1861
`SysLogHandler` (class in `logging.handlers`), 678
`system()` (in module `os`), 581
`system()` (in module `platform`), 709
`system_alias()` (in module `platform`), 709
`system_must_validate_cert()` (in module `test.support`), 1589
`SystemError`, 91
`SystemExit`, 91
`systemId` (`xml.dom.DocumentType` attribute), 1138
`SystemRandom` (class in `random`), 326
`SystemRandom` (class in `secrets`), 537
`SystemRoot`, 820

T

`-t <tarfile>`
 tarfile command line option, 489
`-t <zipfile>`
 zipfile command line option, 481
`-t, --top-level-directory directory`
 unittest-discover command line option, 1496
`-t, --trace`
 trace command line option, 1628
`-T, --trackcalls`
 trace command line option, 1628
`T_FMT` (in module `locale`), 1352
`T_FMT_AMP` (in module `locale`), 1352
`tab()` (`tkinter.ttk.Notebook` method), 1422
`TabError`, 91
`tabnanny` (module), 1799
`tabs()` (`tkinter.ttk.Notebook` method), 1422
`tabsize` (`textwrap.TextWrapper` attribute), 141
`tabular`

 data, 493
`tag` (`xml.etree.ElementTree.Element` attribute), 1127
`tag_bind()` (`tkinter.ttk.Treeview` method), 1429
`tag_configure()` (`tkinter.ttk.Treeview` method), 1429
`tag_has()` (`tkinter.ttk.Treeview` method), 1429
`tagName` (`xml.dom.Element` attribute), 1140
`tail` (`xml.etree.ElementTree.Element` attribute), 1127
`take_snapshot()` (in module `tracemalloc`), 1635
`takewhile()` (in module `itertools`), 346
`tan()` (in module `cmath`), 291
`tan()` (in module `math`), 288
`tanh()` (in module `cmath`), 291
`tanh()` (in module `math`), 288
`TarError`, 483
`TarFile` (class in `tarfile`), 483, 484
`tarfile` (module), 481
tarfile command line option
 `-c <tarfile> <source1> ... <sourceN>`, 489
 `--create <tarfile> <source1> ... <sourceN>`, 489
 `-e <tarfile> [<output_dir>]`, 489
 `--extract <tarfile> [<output_dir>]`, 489
 `-l <tarfile>`, 489
 `--list <tarfile>`, 489
 `-t <tarfile>`, 489
 `--test <tarfile>`, 489
 `-v, --verbose`, 489
`target` (`xml.dom.ProcessingInstruction` attribute), 1142
`TarInfo` (class in `tarfile`), 487
`Task` (class in `asyncio`), 853
`task_done()` (`asyncio.Queue` method), 872
`task_done()` (`multiprocessing.JoinableQueue` method), 775
`task_done()` (`queue.Queue` method), 834
`tau` (in module `cmath`), 292
`tau` (in module `math`), 289
`tb_locals` (`unittest.TestResult` attribute), 1515
`tbreak` (`pdb` command), 1611
`tcdrain()` (in module `termios`), 1851
`tcflow()` (in module `termios`), 1851
`tcflush()` (in module `termios`), 1851
`tcgetattr()` (in module `termios`), 1851
`tcgetpgrp()` (in module `os`), 555
`Tcl()` (in module `tkinter`), 1404
`TCPServer` (class in `socketserver`), 1266
`tcsendbreak()` (in module `termios`), 1851
`tcsetattr()` (in module `termios`), 1851
`tcsetpgrp()` (in module `os`), 555
`tearDown()` (`unittest.TestCase` method), 1502
`tearDownClass()` (`unittest.TestCase` method), 1503
`tee()` (in module `itertools`), 346
`tell()` (`aifc.aifc` method), 1325, 1326
`tell()` (`chunk.Chunk` method), 1333
`tell()` (`io.IOBase` method), 592

- `tell()` (`io.TextIOBase` method), 598
- `tell()` (`mmap.mmap` method), 1012
- `tell()` (`sunau.AU_read` method), 1328
- `tell()` (`sunau.AU_write` method), 1329
- `tell()` (`wave.Wave_read` method), 1330
- `tell()` (`wave.Wave_write` method), 1331
- `Telnet` (class in `telnetlib`), 1260
- `telnetlib` (module), 1260
- `TEMP`, 401
- `temp_cwd()` (in module `test.support`), 1591
- `temp_dir()` (in module `test.support`), 1591
- `temp_umask()` (in module `test.support`), 1592
- `tempdir` (in module `tempfile`), 401
- `tempfile` (module), 398
- `Template` (class in `pipes`), 1855
- `Template` (class in `string`), 106
- `template` (`string.Template` attribute), 106
- `temporary`
 - file, 398
 - file name, 398
- `TemporaryDirectory()` (in module `tempfile`), 400
- `TemporaryFile()` (in module `tempfile`), 399
- `teredo` (`ipaddress.IPv6Address` attribute), 1310
- `TERM`, 690, 691
- `termattrs()` (in module `curses`), 690
- `terminal_size` (class in `os`), 556
- `terminate()` (`asyncio.asyncio.subprocess.Process` method), 869
- `terminate()` (`asyncio.SubprocessTransport` method), 903
- `terminate()` (`multiprocessing.pool.Pool` method), 792
- `terminate()` (`multiprocessing.Process` method), 771
- `terminate()` (`subprocess.Popen` method), 822
- `termios` (module), 1850
- `termname()` (in module `curses`), 691
- `test` (`doctest.DocTestFailure` attribute), 1491
- `test` (`doctest.UnexpectedException` attribute), 1491
- `test` (module), 1584
- `-test <tarfile>`
 - tarfile command line option, 489
- `-test <zipfile>`
 - zipfile command line option, 481
- `test()` (in module `cgi`), 1179
- `TEST_DATA_DIR` (in module `test.support`), 1588
- `TEST_HOME_DIR` (in module `test.support`), 1588
- `TEST_SUPPORT_DIR` (in module `test.support`), 1588
- `TestCase` (class in `unittest`), 1502
- `TestFailed`, 1587
- `testfile()` (in module `doctest`), 1480
- `TESTFN` (in module `test.support`), 1587
- `TESTFN_ENCODING` (in module `test.support`), 1587
- `TESTFN_NONASCII` (in module `test.support`), 1587
- `TESTFN_UNDECODABLE` (in module `test.support`), 1587
- `TESTFN_UNENCODABLE` (in module `test.support`), 1587
- `TESTFN_UNICODE` (in module `test.support`), 1587
- `TestHandler` (class in `test.support`), 1598
- `TestLoader` (class in `unittest`), 1512
- `testMethodPrefix` (`unittest.TestLoader` attribute), 1514
- `testmod()` (in module `doctest`), 1481
- `testNamePatterns` (`unittest.TestLoader` attribute), 1514
- `TestResult` (class in `unittest`), 1515
- `tests` (in module `imghdr`), 1334
- `testsource()` (in module `doctest`), 1490
- `testsRun` (`unittest.TestResult` attribute), 1515
- `TestSuite` (class in `unittest`), 1511
- `test.support` (module), 1587
- `test.support.script_helper` (module), 1598
- `testzip()` (`zipfile.ZipFile` method), 477
- `Text` (class in `typing`), 1462
- `text` (in module `msilib`), 1832
- `text` (`traceback.TracebackException` attribute), 1718
- `text` (`xml.etree.ElementTree.Element` attribute), 1127
- `text encoding`, 1910
- `text file`, 1910
- `text mode`, 18
- `text()` (in module `cgitb`), 1183
- `text()` (`msilib.Dialog` method), 1832
- `text_factory` (`sqlite3.Connection` attribute), 446
- `Textbox` (class in `curses.textpad`), 703
- `TextCalendar` (class in `calendar`), 207
- `textdomain()` (in module `gettext`), 1342
- `textdomain()` (in module `locale`), 1356
- `textinput()` (in module `turtle`), 1383
- `TextIO` (class in `typing`), 1463
- `TextIOBase` (class in `io`), 597
- `TextIOWrapper` (class in `io`), 598
- `TextTestResult` (class in `unittest`), 1517
- `TextTestRunner` (class in `unittest`), 1517
- `textwrap` (module), 139
- `TextWrapper` (class in `textwrap`), 140
- `theme_create()` (`tkinter.ttk.Style` method), 1432
- `theme_names()` (`tkinter.ttk.Style` method), 1433
- `theme_settings()` (`tkinter.ttk.Style` method), 1432
- `theme_use()` (`tkinter.ttk.Style` method), 1433
- `THOUSEP` (in module `locale`), 1352
- `Thread` (class in `threading`), 753
- `thread()` (`imaplib.IMAP4` method), 1242
- `thread_info` (in module `sys`), 1675
- `thread_time()` (in module `time`), 607

- `thread_time_ns()` (in module `time`), 607
- `threading` (module), 751
- `threading_cleanup()` (in module `test.support`), 1595
- `threading_setup()` (in module `test.support`), 1595
- `ThreadingHTTPServer` (class in `http.server`), 1275
- `ThreadingMixIn` (class in `socketserver`), 1267
- `ThreadingTCPServer` (class in `socketserver`), 1267
- `ThreadingUDPServer` (class in `socketserver`), 1267
- `ThreadPoolExecutor` (class in `concurrent.futures`), 809
- `threads`
 - POSIX, 836
- `throw` (2to3 fixer), 1583
- `ticket_lifetime_hint` (`ssl.SSLSession` attribute), 983
- `tigetflag()` (in module `curses`), 691
- `tigetnum()` (in module `curses`), 691
- `tigetstr()` (in module `curses`), 691
- `TILDE` (in module `token`), 1794
- `tilt()` (in module `turtle`), 1375
- `tiltangle()` (in module `turtle`), 1375
- `time` (class in `datetime`), 192
- `time` (module), 600
- `time` (`ssl.SSLSession` attribute), 983
- `time()` (`asyncio.loop` method), 878
- `time()` (`datetime.datetime` method), 187
- `time()` (in module `time`), 607
- `Time2Internaldate()` (in module `imaplib`), 1238
- `time_ns()` (in module `time`), 607
- `timedelta` (class in `datetime`), 177
- `TimedRotatingFileHandler` (class in `logging.handlers`), 676
- `timegm()` (in module `calendar`), 210
- `timeit` (module), 1622
- `timeit` command line option
 - `-h, --help`, 1625
 - `-n N, --number=N`, 1625
 - `-p, --process`, 1625
 - `-r N, --repeat=N`, 1625
 - `-s S, --setup=S`, 1625
 - `-u, --unit=U`, 1625
 - `-v, --verbose`, 1625
- `timeit()` (in module `timeit`), 1623
- `timeit()` (`timeit.Timer` method), 1623
- `timeout`, 930
- `timeout` (`socketserver.BaseServer` attribute), 1269
- `timeout` (`ssl.SSLSession` attribute), 983
- `timeout` (`subprocess.TimeoutExpired` attribute), 816
- `timeout()` (`curses.window` method), 698
- `TIMEOUT_MAX` (in module `_thread`), 837
- `TIMEOUT_MAX` (in module `threading`), 752
- `TimeoutError`, 93, 772, 813, 874
- `TimeoutExpired`, 815
- `Timer` (class in `threading`), 761
- `Timer` (class in `timeit`), 1623
- `TimerHandle` (class in `asyncio`), 890
- `times()` (in module `os`), 581
- `TIMESTAMP` (`py_compile.PycInvalidationMode` attribute), 1802
- `timestamp()` (`datetime.datetime` method), 188
- `timetuple()` (`datetime.date` method), 181
- `timetuple()` (`datetime.datetime` method), 188
- `timetz()` (`datetime.datetime` method), 187
- `timezone` (class in `datetime`), 202
- `timezone` (in module `time`), 610
- `title()` (`bytearray` method), 64
- `title()` (`bytes` method), 64
- `title()` (in module `turtle`), 1385
- `title()` (`str` method), 50
- `Tix`, 1433
- `tix_addbitmapdir()` (`tkinter.tix.tixCommand` method), 1437
- `tix_cget()` (`tkinter.tix.tixCommand` method), 1437
- `tix_configure()` (`tkinter.tix.tixCommand` method), 1437
- `tix_filedialog()` (`tkinter.tix.tixCommand` method), 1437
- `tix_getbitmap()` (`tkinter.tix.tixCommand` method), 1437
- `tix_getimage()` (`tkinter.tix.tixCommand` method), 1438
- `TIX_LIBRARY`, 1434
- `tix_option_get()` (`tkinter.tix.tixCommand` method), 1438
- `tix_resetoptions()` (`tkinter.tix.tixCommand` method), 1438
- `tixCommand` (class in `tkinter.tix`), 1437
- `Tk`, 1403
- `Tk` (class in `tkinter`), 1404
- `Tk` (class in `tkinter.tix`), 1434
- `Tk Option Data Types`, 1411
- `Tkinter`, 1403
- `tkinter` (module), 1403
- `tkinter.scrolledtext` (module), 1438
- `tkinter.tix` (module), 1433
- `tkinter.ttk` (module), 1414
- `TList` (class in `tkinter.tix`), 1436
- `TLS`, 950
- `TLSv1` (`ssl.TLSVersion` attribute), 963
- `TLSv1_1` (`ssl.TLSVersion` attribute), 963
- `TLSv1_2` (`ssl.TLSVersion` attribute), 963
- `TLSv1_3` (`ssl.TLSVersion` attribute), 963
- `TLSVersion` (class in `ssl`), 962
- `TMP`, 401
- `TMPDIR`, 401
- `to_bytes()` (`int` method), 33
- `to_eng_string()` (`decimal.Context` method), 310
- `to_eng_string()` (`decimal.Decimal` method), 304
- `to_integral()` (`decimal.Decimal` method), 304

- `to_integral_exact()` (decimal.Context method), 311
- `to_integral_exact()` (decimal.Decimal method), 304
- `to_integral_value()` (decimal.Decimal method), 305
- `to_sci_string()` (decimal.Context method), 311
- `ToASCII()` (in module `encodings.idna`), 173
- `tobuf()` (tarfile.TarInfo method), 487
- `tobytes()` (array.array method), 240
- `tobytes()` (memoryview method), 70
- `today()` (datetime.date class method), 179
- `today()` (datetime.datetime class method), 183
- `tofile()` (array.array method), 240
- `tok_name` (in module `token`), 1793
- `token` (module), 1793
- `token` (shlex.shlex attribute), 1400
- `token_bytes()` (in module `secrets`), 538
- `token_hex()` (in module `secrets`), 538
- `token_urlsafe()` (in module `secrets`), 538
- `TokenError`, 1796
- `tokenize` (module), 1795
- `tokenize` command line option
 - e, -exact, 1797
 - h, -help, 1797
- `tokenize()` (in module `tokenize`), 1796
- `tolist()` (array.array method), 240
- `tolist()` (memoryview method), 70
- `tolist()` (parser.ST method), 1784
- `tomono()` (in module `audioop`), 1323
- `toordinal()` (datetime.date method), 181
- `toordinal()` (datetime.datetime method), 188
- `top()` (curses.panel.Panel method), 708
- `top()` (poplib.POP3 method), 1235
- `top_panel()` (in module `curses.panel`), 707
- `toprettyxml()` (xml.dom.minidom.Node method), 1146
- `tostereo()` (in module `audioop`), 1323
- `tostring()` (array.array method), 240
- `tostring()` (in module `xml.etree.ElementTree`), 1127
- `tostringlist()` (in module `xml.etree.ElementTree`), 1127
- `total_changes` (sqlite3.Connection attribute), 446
- `total_ordering()` (in module `functools`), 354
- `total_seconds()` (datetime.timedelta method), 179
- `totuple()` (parser.ST method), 1784
- `touch()` (pathlib.Path method), 383
- `touchline()` (curses.window method), 698
- `touchwin()` (curses.window method), 698
- `tounicode()` (array.array method), 240
- `ToUnicode()` (in module `encodings.idna`), 173
- `towards()` (in module `turtle`), 1367
- `toxml()` (xml.dom.minidom.Node method), 1146
- `tparm()` (in module `curses`), 691
- `Trace` (class in `trace`), 1629
- `Trace` (class in `tracemalloc`), 1638
- `trace` (module), 1627
- `trace` command line option
 - c, -count, 1628
 - C, -coverdir=<dir>, 1628
 - f, -file=<file>, 1628
 - g, -timing, 1628
 - help, 1627
 - ignore-dir=<dir>, 1628
 - ignore-module=<mod>, 1628
 - l, -listfuncs, 1628
 - m, -missing, 1628
 - R, -no-report, 1628
 - r, -report, 1628
 - s, -summary, 1628
 - t, -trace, 1628
 - T, -trackcalls, 1628
 - version, 1627
- `trace` function, 752, 1666, 1672
- `trace()` (in module `inspect`), 1739
- `trace_dispatch()` (bdb.Bdb method), 1602
- `traceback`
 - object, 1662, 1715
- `Traceback` (class in `tracemalloc`), 1639
- `traceback` (module), 1715
- `traceback` (tracemalloc.Statistic attribute), 1638
- `traceback` (tracemalloc.StatisticDiff attribute), 1638
- `traceback` (tracemalloc.Trace attribute), 1639
- `traceback_limit` (tracemalloc.Snapshot attribute), 1637
- `traceback_limit` (wsgiref.handlers.BaseHandler attribute), 1191
- `TracebackException` (class in `traceback`), 1717
- `tracebacklimit` (in module `sys`), 1675
- `tracebacks`
 - in CGI scripts, 1182
- `TracebackType` (class in `types`), 250
- `tracemalloc` (module), 1630
- `tracer()` (in module `turtle`), 1381
- `traces` (tracemalloc.Snapshot attribute), 1637
- `transfercmd()` (ftplib.FTP method), 1232
- `transient_internet()` (in module `test.support`), 1592
- `TransientResource` (class in `test.support`), 1597
- `translate()` (bytearray method), 58
- `translate()` (bytes method), 58
- `translate()` (in module `fnmatch`), 405
- `translate()` (str method), 51
- `translation()` (in module `gettext`), 1343
- `transport` (asyncio.StreamWriter attribute), 859
- `Transport` (class in `asyncio`), 899
- `Transport Layer Security`, 950
- `Tree` (class in `tkinter.tix`), 1436
- `TreeBuilder` (class in `xml.etree.ElementTree`), 1131
- `Treeview` (class in `tkinter.ttk`), 1426
- `triangular()` (in module `random`), 326
- triple-quoted string, 1910

- True, 29, 84
 - true, 29
 - True (built-in variable), 27
 - truediv() (in module operator), 361
 - trunc() (in module math), 31, 286
 - truncate() (in module os), 571
 - truncate() (io.IOBase method), 592
 - truth
 - value, 29
 - truth() (in module operator), 360
 - try
 - statement, 87
 - ttk, 1414
 - tty
 - I/O control, 1850
 - tty (module), 1852
 - ttyname() (in module os), 555
 - tuple
 - object, 39, 41
 - tuple (built-in class), 41
 - Tuple (in module typing), 1466
 - tuple2st() (in module parser), 1782
 - tuple_params (2to3 fixer), 1583
 - Turtle (class in turtle), 1386
 - turtle (module), 1357
 - turtledemo (module), 1390
 - turtles() (in module turtle), 1385
 - TurtleScreen (class in turtle), 1386
 - turtlesize() (in module turtle), 1374
 - type, 1910
 - Boolean, 6
 - built-in function, 83
 - object, 24
 - operations on dictionary, 77
 - operations on list, 39
 - type (built-in class), 23
 - Type (class in typing), 1458
 - type (optparse.Option attribute), 1876
 - type (socket.socket attribute), 945
 - type (tarfile.TarInfo attribute), 487
 - type (urllib.request.Request attribute), 1198
 - type alias, 1910
 - type hint, 1910
 - TYPE_CHECKER (optparse.Option attribute), 1887
 - TYPE_CHECKING (in module typing), 1467
 - typeahead() (in module curses), 691
 - typecode (array.array attribute), 238
 - typecodes (in module array), 238
 - TYPED_ACTIONS (optparse.Option attribute), 1889
 - typed_subpart_iterator() (in module email.iterators), 1071
 - TypeError, 91
 - types
 - built-in, 29
 - immutable sequence, 39
 - module, 83
 - mutable sequence, 39
 - operations on integer, 32
 - operations on mapping, 77
 - operations on numeric, 31
 - operations on sequence, 37, 39
 - types (2to3 fixer), 1583
 - types (module), 248
 - TYPES (optparse.Option attribute), 1887
 - types_map (in module mimetypes), 1102
 - types_map (mimetypes.MimeTypes attribute), 1102
 - types_map_inv (mimetypes.MimeTypes attribute), 1103
 - TypeVar (class in typing), 1457
 - typing (module), 1451
 - TZ, 607, 608
 - tzinfo (class in datetime), 195
 - tzinfo (datetime.datetime attribute), 185
 - tzinfo (datetime.time attribute), 192
 - tzname (in module time), 610
 - tzname() (datetime.datetime method), 188
 - tzname() (datetime.time method), 194
 - tzname() (datetime.timezone method), 202
 - tzname() (datetime.tzinfo method), 196
 - tzset() (in module time), 607
- ## U
- u, -unit=U
 - timeit command line option, 1625
 - ucd_3_2_0 (in module unicodedata), 144
 - udata (select.kevent attribute), 992
 - UDPServer (class in socketserver), 1266
 - UF_APPEND (in module stat), 395
 - UF_COMPRESSED (in module stat), 396
 - UF_HIDDEN (in module stat), 396
 - UF_IMMUTABLE (in module stat), 395
 - UF_NODUMP (in module stat), 395
 - UF_NOUNLINK (in module stat), 396
 - UF_OPAQUE (in module stat), 395
 - uid (tarfile.TarInfo attribute), 487
 - uid() (imaplib.IMAP4 method), 1242
 - uidl() (poplib.POP3 method), 1236
 - u-LAW, 1321, 1326, 1334
 - ulaw2lin() (in module audioop), 1323
 - umask() (in module os), 547
 - unalias (pdb command), 1613
 - uname (tarfile.TarInfo attribute), 488
 - uname() (in module os), 547
 - uname() (in module platform), 709
 - UNARY_INVERT (opcode), 1810
 - UNARY_NEGATIVE (opcode), 1810

- UNARY_NOT (opcode), 1810
- UNARY_POSITIVE (opcode), 1810
- UnboundLocalError, 92
- unbuffered I/O, 18
- UNC paths
 - and os.makedirs(), 562
- UNCHECKED_HASH
 - (py_compile.PycInvalidationMode attribute), 1802
- unconsumed_tail (zlib.Decompress attribute), 462
- unctrl() (in module curses), 691
- unctrl() (in module curses.ascii), 706
- Underflow (class in decimal), 313
- undisplay (pdb command), 1613
- undo() (in module turtle), 1366
- undobufferentries() (in module turtle), 1378
- undoc_header (cmd.Cmd attribute), 1394
- unescape() (in module html), 1111
- unescape() (in module xml.sax.saxutils), 1158
- UnexpectedException, 1491
- unexpectedSuccesses (unittest.TestResult attribute), 1515
- unfreeze() (in module gc), 1725
- unget_wch() (in module curses), 691
- ungetch() (in module curses), 691
- ungetch() (in module msvcrt), 1833
- ungetmouse() (in module curses), 691
- ungetwch() (in module msvcrt), 1834
- unhexlify() (in module binascii), 1109
- Unicode, 142, 156
 - database, 142
- unicode (2to3 fixer), 1583
- unicodedata (module), 142
- UnicodeDecodeError, 92
- UnicodeEncodeError, 92
- UnicodeError, 92
- UnicodeTranslateError, 92
- UnicodeWarning, 94
- unidata_version (in module unicodedata), 144
- unified_diff() (in module difflib), 131
- uniform() (in module random), 325
- UnimplementedFileMode, 1223
- Union (class in ctypes), 748
- Union (in module typing), 1465
- union() (frozenset method), 75
- unique() (in module enum), 261, 264
- unittest (module), 1493
- unittest command line option
 - b, --buffer, 1495
 - c, --catch, 1495
 - f, --failfast, 1495
 - k, 1495
 - locals, 1496
- unittest-discover command line option
 - p, --pattern pattern, 1496
 - s, --start-directory directory, 1496
 - t, --top-level-directory directory, 1496
 - v, --verbose, 1496
- unittest.mock (module), 1521
- universal newlines, 1911
 - bytearray.splitlines method, 63
 - bytes.splitlines method, 63
 - csv.reader function, 493
 - importlib.abc.InspectLoader.get_source method, 1766
 - io.IncrementalNewlineDecoder class, 599
 - io.TextIOWrapper class, 598
 - open() built-in function, 18
 - str.splitlines method, 49
 - subprocess module, 816
- UNIX
 - file control, 1853
 - I/O control, 1853
- unix_dialect (class in csv), 496
- unix_shell (in module test.support), 1587
- UnixDatagramServer (class in socketserver), 1266
- UnixStreamServer (class in socketserver), 1266
- unknown (uuid.SafeUUID attribute), 1263
- unknown_decl() (html.parser.HTMLParser method), 1114
- unknown_open() (urllib.request.BaseHandler method), 1201
- unknown_open() (urllib.request.UnknownHandler method), 1204
- UnknownHandler (class in urllib.request), 1198
- UnknownProtocol, 1223
- UnknownTransferEncoding, 1223
- unlink() (in module os), 572
- unlink() (in module test.support), 1588
- unlink() (pathlib.Path method), 383
- unlink() (xml.dom.minidom.Node method), 1146
- unload() (in module test.support), 1588
- unlock() (mailbox.Babyl method), 1090
- unlock() (mailbox.Mailbox method), 1086
- unlock() (mailbox.Maildir method), 1087
- unlock() (mailbox.mbox method), 1088
- unlock() (mailbox.MH method), 1089
- unlock() (mailbox.MMDF method), 1090
- unpack() (in module struct), 152
- unpack() (struct.Struct method), 156
- unpack_archive() (in module shutil), 412
- unpack_array() (xdrlib.Unpacker method), 521
- unpack_bytes() (xdrlib.Unpacker method), 521
- unpack_double() (xdrlib.Unpacker method), 520
- UNPACK_EX (opcode), 1814
- unpack_farray() (xdrlib.Unpacker method), 521
- unpack_float() (xdrlib.Unpacker method), 520
- unpack_fopaque() (xdrlib.Unpacker method), 521

- `unpack_from()` (in module `struct`), 152
- `unpack_from()` (`struct.Struct` method), 156
- `unpack_fstring()` (`xdrlib.Unpacker` method), 520
- `unpack_list()` (`xdrlib.Unpacker` method), 521
- `unpack_opaque()` (`xdrlib.Unpacker` method), 521
- `UNPACK_SEQUENCE` (opcode), 1814
- `unpack_string()` (`xdrlib.Unpacker` method), 521
- `Unpacker` (class in `xdrlib`), 519
- `unparsedEntityDecl()` (`xml.sax.handler.DTDHandler` method), 1157
- `UnparsedEntityDeclHandler()` (`xml.parsers.expat.xmlparser` method), 1166
- `Unpickler` (class in `pickle`), 419
- `UnpicklingError`, 418
- `unquote()` (in module `email.utils`), 1069
- `unquote()` (in module `urllib.parse`), 1216
- `unquote_plus()` (in module `urllib.parse`), 1217
- `unquote_to_bytes()` (in module `urllib.parse`), 1217
- `unregister()` (in module `atexit`), 1714
- `unregister()` (in module `faulthandler`), 1607
- `unregister()` (`select.devpoll` method), 988
- `unregister()` (`select.epoll` method), 989
- `unregister()` (`selectors.BaseSelector` method), 993
- `unregister()` (`select.poll` method), 990
- `unregister_archive_format()` (in module `shutil`), 412
- `unregister_dialect()` (in module `csv`), 494
- `unregister_unpack_format()` (in module `shutil`), 413
- `unsafe` (`uuid.SafeUUID` attribute), 1263
- `unset()` (`test.support.EnvironmentVarGuard` method), 1597
- `unsetenv()` (in module `os`), 547
- `UnstructuredHeader` (class in `email.headerregistry`), 1039
- `unsubscribe()` (`imaplib.IMAP4` method), 1242
- `UnsupportedOperation`, 589
- `until` (`pdb` command), 1612
- `untokenize()` (in module `tokenize`), 1796
- `untouchwin()` (`curses.window` method), 698
- `unused_data` (`bz2.BZ2Decompressor` attribute), 467
- `unused_data` (`lzma.LZMADecompressor` attribute), 471
- `unused_data` (`zlib.Decompress` attribute), 461
- `unverifiable` (`urllib.request.Request` attribute), 1198
- `unwrap()` (in module `inspect`), 1738
- `unwrap()` (`ssl.SSLSocket` method), 966
- `up` (`pdb` command), 1610
- `up()` (in module `turtle`), 1369
- `update()` (`collections.Counter` method), 214
- `update()` (`dict` method), 79
- `update()` (`frozenset` method), 76
- `update()` (`hashlib.hash` method), 527
- `update()` (`hmac.HMAC` method), 536
- `update()` (`http.cookies.Morsel` method), 1282
- `update()` (in module `turtle`), 1381
- `update()` (`mailbox.Mailbox` method), 1085
- `update()` (`mailbox.Maildir` method), 1087
- `update()` (`trace.CoverageResults` method), 1629
- `update_authenticated()` (`url-lib.request.HTTPPasswordMgrWithPriorAuth` method), 1203
- `update_lines_cols()` (in module `curses`), 691
- `update_panels()` (in module `curses.panel`), 707
- `update_visible()` (`mailbox.BabylMessage` method), 1096
- `update_wrapper()` (in module `functools`), 358
- `upper()` (`bytearray` method), 65
- `upper()` (`bytes` method), 65
- `upper()` (`str` method), 51
- `urandom()` (in module `os`), 587
- `URL`, 1175, 1211, 1218, 1274
 - parsing, 1211
 - relative, 1211
- `url` (`xmlrpc.client.ProtocolError` attribute), 1297
- `url2pathname()` (in module `urllib.request`), 1194
- `urcleanup()` (in module `urllib.request`), 1208
- `urldefrag()` (in module `urllib.parse`), 1214
- `urlencode()` (in module `urllib.parse`), 1217
- `URLError`, 1218
- `urljoin()` (in module `urllib.parse`), 1214
- `urllib` (2to3 fixer), 1584
- `urllib` (module), 1192
- `urllib.error` (module), 1218
- `urllib.parse` (module), 1211
- `urllib.request`
 - module, 1222
- `urllib.request` (module), 1193
- `urllib.response` (module), 1210
- `urllib.robotparser` (module), 1218
- `urlopen()` (in module `urllib.request`), 1193
- `URLopener` (class in `urllib.request`), 1208
- `urlparse()` (in module `urllib.parse`), 1211
- `urlretrieve()` (in module `urllib.request`), 1208
- `urlsafe_b64decode()` (in module `base64`), 1104
- `urlsafe_b64encode()` (in module `base64`), 1104
- `urlsplit()` (in module `urllib.parse`), 1213
- `urlunparse()` (in module `urllib.parse`), 1213
- `urlunsplit()` (in module `urllib.parse`), 1213
- `urn` (`uuid.UUID` attribute), 1264
- `use_default_colors()` (in module `curses`), 692
- `use_env()` (in module `curses`), 692
- `use_rawinput` (`cmd.Cmd` attribute), 1394
- `UseForeignDTD()` (`xml.parsers.expat.xmlparser` method), 1164
- `USER`, 685
- `user`
 - effective id, 544
 - id, 545

id, setting, 547
 user() (poplib.POP3 method), 1235
 USER_BASE (in module site), 1744
 user_call() (bdb.Bdb method), 1603
 user_exception() (bdb.Bdb method), 1603
 user_line() (bdb.Bdb method), 1603
 user_return() (bdb.Bdb method), 1603
 USER_SITE (in module site), 1744
 -user-base
 site command line option, 1744
 usercustomize
 module, 1743
 UserDict (class in collections), 226
 UserList (class in collections), 226
 USERNAME, 544, 685
 username (email.headerregistry.Address attribute), 1042
 USERPROFILE, 386
 userptr() (curses.panel.Panel method), 708
 -user-site
 site command line option, 1745
 UserString (class in collections), 227
 UserWarning, 94
 USTAR_FORMAT (in module tarfile), 483
 UTC, 601
 utc (datetime.timezone attribute), 203
 utcfromtimestamp() (datetime.datetime class method), 184
 utcnow() (datetime.datetime class method), 184
 utcoffset() (datetime.datetime method), 187
 utcoffset() (datetime.time method), 194
 utcoffset() (datetime.timezone method), 202
 utcoffset() (datetime.tzinfo method), 195
 utctimetuple() (datetime.datetime method), 188
 utf8 (email.policy.EmailPolicy attribute), 1033
 utf8() (poplib.POP3 method), 1236
 utf8_enabled (imaplib.IMAP4 attribute), 1242
 utime() (in module os), 572
 uu
 module, 1107
 uu (module), 1110
 UUID (class in uuid), 1263
 uuid (module), 1262
 uuid1, 1264
 uuid1() (in module uuid), 1264
 uuid3, 1264
 uuid3() (in module uuid), 1264
 uuid4, 1264
 uuid4() (in module uuid), 1264
 uuid5, 1265
 uuid5() (in module uuid), 1264
 UuidCreate() (in module msilib), 1827

V

-v, -verbose
 tarfile command line option, 489
 timeit command line option, 1625
 unittest-discover command line option, 1496
 v4_int_to_packed() (in module ipaddress), 1318
 v6_int_to_packed() (in module ipaddress), 1318
 validator() (in module wsgiref.validate), 1188
 value
 truth, 29
 value (ctypes._SimpleCData attribute), 746
 value (http.cookiejar.Cookie attribute), 1291
 value (http.cookies.Morsel attribute), 1282
 value (xml.dom.Attr attribute), 1141
 Value() (in module multiprocessing), 781
 Value() (in module multiprocessing.sharedctypes), 782
 Value() (multiprocessing.managers.SyncManager method), 786
 value_decode() (http.cookies.BaseCookie method), 1281
 value_encode() (http.cookies.BaseCookie method), 1281
 ValueError, 92
 valuerefs() (weakref.WeakValueDictionary method), 243
 values
 Boolean, 84
 values() (contextvars.Context method), 841
 values() (dict method), 79
 values() (email.message.EmailMessage method), 1017
 values() (email.message.Message method), 1056
 values() (mailbox.Mailbox method), 1084
 values() (types.MappingProxyType method), 251
 ValuesView (class in collections.abc), 229
 ValuesView (class in typing), 1460
 var (contextvars.contextvars.Token.Token attribute), 840
 variable annotation, 1911
 variance() (in module statistics), 334
 variant (uuid.UUID attribute), 1264
 vars() (built-in function), 24
 VBAR (in module token), 1794
 vbar (tkinter.scrolledtext.ScrolledText attribute), 1438
 VBAREQUAL (in module token), 1794
 Vec2D (class in turtle), 1387
 venv (module), 1643
 VERBOSE (in module re), 115
 verbose (in module tabnanny), 1799
 verbose (in module test.support), 1587
 verify() (smtplib.SMTP method), 1253

verify_client_post_handshake() (ssl.SSLSocket method), 966
 verify_code (ssl.SSLCertVerificationError attribute), 953
 VERIFY_CRL_CHECK_CHAIN (in module ssl), 957
 VERIFY_CRL_CHECK_LEAF (in module ssl), 957
 VERIFY_DEFAULT (in module ssl), 957
 verify_flags (ssl.SSLContext attribute), 975
 verify_message (ssl.SSLCertVerificationError attribute), 953
 verify_mode (ssl.SSLContext attribute), 975
 verify_request() (socketserver.BaseServer method), 1270
 VERIFY_X509_STRICT (in module ssl), 957
 VERIFY_X509_TRUSTED_FIRST (in module ssl), 958
 VerifyFlags (class in ssl), 958
 VerifyMode (class in ssl), 957
 -version
 trace command line option, 1627
 version (email.headerregistry.MIMEVersionHeader attribute), 1040
 version (http.client.HTTPResponse attribute), 1227
 version (http.cookiejar.Cookie attribute), 1290
 version (in module curses), 698
 version (in module marshal), 433
 version (in module sqlite3), 439
 version (in module sys), 1676
 version (ipaddress.IPv4Address attribute), 1308
 version (ipaddress.IPv4Network attribute), 1312
 version (ipaddress.IPv6Address attribute), 1309
 version (ipaddress.IPv6Network attribute), 1315
 version (urllib.request.URLopener attribute), 1209
 version (uuid.UUID attribute), 1264
 version() (in module ensurepip), 1642
 version() (in module platform), 709
 version() (ssl.SSLSocket method), 966
 version_info (in module sqlite3), 439
 version_info (in module sys), 1676
 version_string() (http.server.BaseHTTPRequestHandler method), 1278
 vformat() (string.Formatter method), 98
 virtual
 Environments, 1643
 virtual environment, 1911
 virtual machine, 1911
 visit() (ast.NodeVisitor method), 1790
 vline() (curses.window method), 698
 voidcmd() (ftplib.FTP method), 1231
 volume (zipfile.ZipInfo attribute), 480
 vonmisesvariate() (in module random), 326

W

W_OK (in module os), 558
 wait() (asyncio.asyncio.subprocess.Process method), 869
 wait() (asyncio.Condition method), 865
 wait() (asyncio.Event method), 864
 wait() (in module asyncio), 851
 wait() (in module concurrent.futures), 812
 wait() (in module multiprocessing.connection), 794
 wait() (in module os), 581
 wait() (multiprocessing.pool.AsyncResult method), 792
 wait() (subprocess.Popen method), 821
 wait() (threading.Barrier method), 762
 wait() (threading.Condition method), 758
 wait() (threading.Event method), 760
 wait3() (in module os), 583
 wait4() (in module os), 583
 wait_closed() (asyncio.Server method), 891
 wait_closed() (asyncio.StreamWriter method), 859
 wait_for() (asyncio.Condition method), 865
 wait_for() (in module asyncio), 850
 wait_for() (threading.Condition method), 758
 wait_threads_exit() (in module test.support), 1592
 waitid() (in module os), 582
 waitpid() (in module os), 582
 walk() (email.message.EmailMessage method), 1019
 walk() (email.message.Message method), 1059
 walk() (in module ast), 1790
 walk() (in module os), 572
 walk_packages() (in module pkgutil), 1755
 walk_stack() (in module traceback), 1717
 walk_tb() (in module traceback), 1717
 want (doctest.Example attribute), 1485
 warn() (in module warnings), 1686
 warn_explicit() (in module warnings), 1686
 Warning, 94, 452
 warning() (in module logging), 658
 warning() (logging.Logger method), 648
 warning() (xml.sax.handler.ErrorHandler method), 1157
 warnings, 1681
 warnings (module), 1681
 WarningsRecorder (class in test.support), 1598
 warnoptions (in module sys), 1676
 wasSuccessful() (unittest.TestResult method), 1515
 WatchedFileHandler (class in logging.handlers), 674
 wave (module), 1329
 WCONTINUED (in module os), 583
 WCOREDUMP() (in module os), 583
 WeakKeyDictionary (class in weakref), 242
 WeakMethod (class in weakref), 243
 weakref (module), 240
 WeakSet (class in weakref), 243

- WeakValueDictionary (class in weakref), 242
- webbrowser (module), 1173
- weekday() (datetime.date method), 181
- weekday() (datetime.datetime method), 188
- weekday() (in module calendar), 209
- weekheader() (in module calendar), 209
- weibullvariate() (in module random), 326
- WEXITED (in module os), 582
- WEXITSTATUS() (in module os), 584
- wfile (http.server.BaseHTTPRequestHandler attribute), 1276
- what() (in module imghdr), 1334
- what() (in module sndhdr), 1335
- whathdr() (in module sndhdr), 1335
- whatis (pdb command), 1613
- when() (asyncio.TimerHandle method), 890
- where (pdb command), 1610
- which() (in module shutil), 409
- whichdb() (in module dbm), 433
- while
 - statement, 29
- whitespace (in module string), 98
- whitespace (shlex.shlex attribute), 1399
- whitespace_split (shlex.shlex attribute), 1400
- Widget (class in tkinter.ttk), 1418
- width (textwrap.TextWrapper attribute), 140
- width() (in module turtle), 1369
- WIFCONTINUED() (in module os), 583
- WIFEXITED() (in module os), 583
- WIFSIGNALED() (in module os), 583
- WIFSTOPPED() (in module os), 583
- win32_ver() (in module platform), 710
- WinDLL (class in ctypes), 737
- window manager (widgets), 1410
- window() (curses.panel.Panel method), 708
- window_height() (in module turtle), 1385
- window_width() (in module turtle), 1385
- Windows ini file, 499
- WindowsError, 92
- WindowsPath (class in pathlib), 377
- WindowsProactorEventLoopPolicy (class in asyncio), 913
- WindowsRegistryFinder (class in importlib.machinery), 1770
- winerror (OSError attribute), 90
- WinError() (in module ctypes), 744
- WINFUNCTYPE() (in module ctypes), 740
- winreg (module), 1834
- WinSock, 987
- winsound (module), 1842
- winver (in module sys), 1676
- WITH_CLEANUP_FINISH (opcode), 1814
- WITH_CLEANUP_START (opcode), 1814
- with_hostmask (ipaddress.IPv4Interface attribute), 1317
- with_hostmask (ipaddress.IPv4Network attribute), 1312
- with_hostmask (ipaddress.IPv6Interface attribute), 1317
- with_hostmask (ipaddress.IPv6Network attribute), 1315
- with_name() (pathlib.PurePath method), 376
- with_netmask (ipaddress.IPv4Interface attribute), 1317
- with_netmask (ipaddress.IPv4Network attribute), 1312
- with_netmask (ipaddress.IPv6Interface attribute), 1317
- with_netmask (ipaddress.IPv6Network attribute), 1315
- with_prefixlen (ipaddress.IPv4Interface attribute), 1317
- with_prefixlen (ipaddress.IPv4Network attribute), 1312
- with_prefixlen (ipaddress.IPv6Interface attribute), 1317
- with_prefixlen (ipaddress.IPv6Network attribute), 1315
- with_pymalloc() (in module test.support), 1589
- with_suffix() (pathlib.PurePath method), 377
- with_traceback() (BaseException method), 88
- WNOHANG (in module os), 583
- WNOWAIT (in module os), 582
- wordchars (shlex.shlex attribute), 1399
- World Wide Web, 1173, 1211, 1218
- wrap() (in module textwrap), 139
- wrap() (textwrap.TextWrapper method), 142
- wrap_bio() (ssl.SSLContext method), 972
- wrap_future() (in module asyncio), 896
- wrap_socket() (in module ssl), 956
- wrap_socket() (ssl.SSLContext method), 972
- wrapper() (in module curses), 692
- WrapperDescriptorType (in module types), 250
- wraps() (in module functools), 358
- WRITABLE (in module tkinter), 1414
- writable() (asyncore.dispatcher method), 997
- writable() (io.IOBase method), 592
- write() (asyncio.StreamWriter method), 859
- write() (asyncio.WriteTransport method), 902
- write() (codecs.StreamWriter method), 163
- write() (code.InteractiveInterpreter method), 1748
- write() (configparser.ConfigParser method), 515
- write() (email.generator.BytesGenerator method), 1027
- write() (email.generator.Generator method), 1028
- write() (in module os), 555
- write() (in module turtle), 1372

[write\(\)](#) ([io.BufferedIOBase](#) method), 594
[write\(\)](#) ([io.BufferedWriter](#) method), 596
[write\(\)](#) ([io.RawIOBase](#) method), 593
[write\(\)](#) ([io.TextIOBase](#) method), 598
[write\(\)](#) ([mmap.mmap](#) method), 1012
[write\(\)](#) ([ossaudiodev.oss_audio_device](#) method), 1336
[write\(\)](#) ([ssl.MemoryBIO](#) method), 982
[write\(\)](#) ([ssl.SSLSocket](#) method), 964
[write\(\)](#) ([telnetlib.Telnet](#) method), 1261
[write\(\)](#) ([xml.etree.ElementTree.ElementTree](#) method), 1130
[write\(\)](#) ([zipfile.ZipFile](#) method), 477
[write_byte\(\)](#) ([mmap.mmap](#) method), 1012
[write_bytes\(\)](#) ([pathlib.Path](#) method), 383
[write_docstringdict\(\)](#) (in module [turtle](#)), 1388
[write_eof\(\)](#) ([asyncio.StreamWriter](#) method), 859
[write_eof\(\)](#) ([asyncio.WriteTransport](#) method), 902
[write_eof\(\)](#) ([ssl.MemoryBIO](#) method), 982
[write_history_file\(\)](#) (in module [readline](#)), 146
[write_results\(\)](#) ([trace.CoverageResults](#) method), 1629
[write_text\(\)](#) ([pathlib.Path](#) method), 383
[write_through](#) ([io.TextIOWrapper](#) attribute), 598
[writeall\(\)](#) ([ossaudiodev.oss_audio_device](#) method), 1336
[writeframes\(\)](#) ([aifc.aifc](#) method), 1326
[writeframes\(\)](#) ([sunau.AU_write](#) method), 1329
[writeframes\(\)](#) ([wave.Wave_write](#) method), 1331
[writeframesraw\(\)](#) ([aifc.aifc](#) method), 1326
[writeframesraw\(\)](#) ([sunau.AU_write](#) method), 1329
[writeframesraw\(\)](#) ([wave.Wave_write](#) method), 1331
[writeheader\(\)](#) ([csv.DictWriter](#) method), 498
[writelines\(\)](#) ([asyncio.StreamWriter](#) method), 859
[writelines\(\)](#) ([asyncio.WriteTransport](#) method), 902
[writelines\(\)](#) ([codecs.StreamWriter](#) method), 163
[writelines\(\)](#) ([io.IOBase](#) method), 592
[writePlist\(\)](#) (in module [plistlib](#)), 523
[writePlistToBytes\(\)](#) (in module [plistlib](#)), 523
[writepy\(\)](#) ([zipfile.PyZipFile](#) method), 479
[writer](#) ([formatter.formatter](#) attribute), 1821
[writer\(\)](#) (in module [csv](#)), 494
[writerow\(\)](#) ([csv.csvwriter](#) method), 498
[writerows\(\)](#) ([csv.csvwriter](#) method), 498
[writestr\(\)](#) ([zipfile.ZipFile](#) method), 478
[WriteTransport](#) (class in [asyncio](#)), 899
[writev\(\)](#) (in module [os](#)), 555
[writexml\(\)](#) ([xml.dom.minidom.Node](#) method), 1146
[WrongDocumentErr](#), 1143
[ws_comma](#) (2to3 fixer), 1584
[wsgi_file_wrapper](#) ([wsgiref.handlers.BaseHandler](#) attribute), 1191
[wsgi_multiprocess](#) ([wsgiref.handlers.BaseHandler](#) attribute), 1190

[wsgi_multithread](#) ([wsgiref.handlers.BaseHandler](#) attribute), 1190
[wsgi_run_once](#) ([wsgiref.handlers.BaseHandler](#) attribute), 1190
[wsgiref](#) (module), 1183
[wsgiref.handlers](#) (module), 1188
[wsgiref.headers](#) (module), 1185
[wsgiref.simple_server](#) (module), 1186
[wsgiref.util](#) (module), 1183
[wsgiref.validate](#) (module), 1187
[WSGIRequestHandler](#) (class in [wsgiref.simple_server](#)), 1187
[WSGIServer](#) (class in [wsgiref.simple_server](#)), 1187
[wShowWindow](#) ([subprocess.STARTUPINFO](#) attribute), 823
[WSTOPPED](#) (in module [os](#)), 582
[WSTOPSIG\(\)](#) (in module [os](#)), 584
[wstring_at\(\)](#) (in module [ctypes](#)), 744
[WTERMSIG\(\)](#) (in module [os](#)), 584
[WUNTRACED](#) (in module [os](#)), 583
[WWW](#), 1173, 1211, 1218
[server](#), 1175, 1274

X

[X](#) (in module [re](#)), 115
[-x](#) [regex](#)
[compileall](#) command line option, 1803
[X509](#) certificate, 975
[X_OK](#) (in module [os](#)), 558
[xatom\(\)](#) ([imaplib.IMAP4](#) method), 1242
[XATTR_CREATE](#) (in module [os](#)), 575
[XATTR_REPLACE](#) (in module [os](#)), 575
[XATTR_SIZE_MAX](#) (in module [os](#)), 575
[xcor\(\)](#) (in module [turtle](#)), 1367
[XDR](#), 519
[xdrlib](#) (module), 519
[xhdr\(\)](#) ([nntplib.NNTP](#) method), 1249
[XHTML](#), 1111
[XHTML_NAMESPACE](#) (in module [xml.dom](#)), 1135
[xml](#) (module), 1117
[XML\(\)](#) (in module [xml.etree.ElementTree](#)), 1127
[XML_ERROR_ABORTED](#) (in module [xml.parsers.expat.errors](#)), 1171
[XML_ERROR_ASYNC_ENTITY](#) (in module [xml.parsers.expat.errors](#)), 1170
[XML_ERROR_ATTRIBUTE_EXTERNAL_ENTITY_REF](#) (in module [xml.parsers.expat.errors](#)), 1170
[XML_ERROR_BAD_CHAR_REF](#) (in module [xml.parsers.expat.errors](#)), 1170
[XML_ERROR_BINARY_ENTITY_REF](#) (in module [xml.parsers.expat.errors](#)), 1170
[XML_ERROR_CANT_CHANGE_FEATURE_ONCE_PARSING](#) (in module [xml.parsers.expat.errors](#)), 1171

- XML_ERROR_DUPLICATE_ATTRIBUTE (in module `xml.parsers.expat.errors`), 1170
- XML_ERROR_ENTITY_DECLARED_IN_PE (in module `xml.parsers.expat.errors`), 1171
- XML_ERROR_EXTERNAL_ENTITY_HANDLING (in module `xml.parsers.expat.errors`), 1171
- XML_ERROR_FEATURE_REQUIRES_XML_DTD (in module `xml.parsers.expat.errors`), 1171
- XML_ERROR_FINISHED (in module `xml.parsers.expat.errors`), 1171
- XML_ERROR_INCOMPLETE_PE (in module `xml.parsers.expat.errors`), 1171
- XML_ERROR_INCORRECT_ENCODING (in module `xml.parsers.expat.errors`), 1170
- XML_ERROR_INVALID_TOKEN (in module `xml.parsers.expat.errors`), 1170
- XML_ERROR_JUNK_AFTER_DOC_ELEMENT (in module `xml.parsers.expat.errors`), 1170
- XML_ERROR_MISPLACED_XML_PI (in module `xml.parsers.expat.errors`), 1170
- XML_ERROR_NO_ELEMENTS (in module `xml.parsers.expat.errors`), 1170
- XML_ERROR_NO_MEMORY (in module `xml.parsers.expat.errors`), 1170
- XML_ERROR_NOT_STANDALONE (in module `xml.parsers.expat.errors`), 1171
- XML_ERROR_NOT_SUSPENDED (in module `xml.parsers.expat.errors`), 1171
- XML_ERROR_PARAM_ENTITY_REF (in module `xml.parsers.expat.errors`), 1170
- XML_ERROR_PARTIAL_CHAR (in module `xml.parsers.expat.errors`), 1170
- XML_ERROR_PUBLICID (in module `xml.parsers.expat.errors`), 1171
- XML_ERROR_RECURSIVE_ENTITY_REF (in module `xml.parsers.expat.errors`), 1170
- XML_ERROR_SUSPEND_PE (in module `xml.parsers.expat.errors`), 1171
- XML_ERROR_SUSPENDED (in module `xml.parsers.expat.errors`), 1171
- XML_ERROR_SYNTAX (in module `xml.parsers.expat.errors`), 1170
- XML_ERROR_TAG_MISMATCH (in module `xml.parsers.expat.errors`), 1170
- XML_ERROR_TEXT_DECL (in module `xml.parsers.expat.errors`), 1171
- XML_ERROR_UNBOUND_PREFIX (in module `xml.parsers.expat.errors`), 1171
- XML_ERROR_UNCLOSED_CDATA_SECTION (in module `xml.parsers.expat.errors`), 1170
- XML_ERROR_UNCLOSED_TOKEN (in module `xml.parsers.expat.errors`), 1170
- XML_ERROR_UNDECLARING_PREFIX (in module `xml.parsers.expat.errors`), 1171
- XML_ERROR_UNDEFINED_ENTITY (in module `xml.parsers.expat.errors`), 1170
- XML_ERROR_UNEXPECTED_STATE (in module `xml.parsers.expat.errors`), 1171
- XML_ERROR_UNKNOWN_ENCODING (in module `xml.parsers.expat.errors`), 1170
- XML_ERROR_XML_DECL (in module `xml.parsers.expat.errors`), 1171
- XML_NAMESPACE (in module `xml.dom`), 1135
- xmlcharrefreplace_errors() (in module `codecs`), 161
- XmlDeclHandler() (`xml.parsers.expat.xmlparser` method), 1165
- xml.dom (module), 1134
- xml.dom.minidom (module), 1144
- xml.dom.pulldom (module), 1149
- xml.etree.ElementTree (module), 1118
- XMLFilterBase (class in `xml.sax.saxutils`), 1158
- XMLGenerator (class in `xml.sax.saxutils`), 1158
- XMLID() (in module `xml.etree.ElementTree`), 1127
- XMLNS_NAMESPACE (in module `xml.dom`), 1135
- XMLParser (class in `xml.etree.ElementTree`), 1132
- xml.parsers.expat (module), 1162
- xml.parsers.expat.errors (module), 1169
- xml.parsers.expat.model (module), 1169
- XMLParserType (in module `xml.parsers.expat`), 1163
- XMLPullParser (class in `xml.etree.ElementTree`), 1133
- XMLReader (class in `xml.sax.xmlreader`), 1159
- xmlrpc.client (module), 1292
- xmlrpc.server (module), 1300
- xml.sax (module), 1151
- xml.sax.handler (module), 1152
- xml.sax.saxutils (module), 1157
- xml.sax.xmlreader (module), 1158
- xor() (in module `operator`), 361
- xover() (`nntplib.NNTP` method), 1249
- xpath() (`nntplib.NNTP` method), 1249
- xrange (2to3 fixer), 1584
- xreadlines (2to3 fixer), 1584
- xview() (`tkinter.ttk.Treeview` method), 1429
- ## Y
- Y2K, 601
- ycor() (in module `turtle`), 1367
- year (`datetime.date` attribute), 180
- year (`datetime.datetime` attribute), 185
- Year 2000, 601
- Year 2038, 600
- yeardatescalendar() (`calendar.Calendar` method), 207
- yeardays2calendar() (`calendar.Calendar` method), 207
- yeardayscalendar() (`calendar.Calendar` method), 207

YESEXPR (in module locale), 1352
YIELD_FROM (opcode), 1813
YIELD_VALUE (opcode), 1813
yiq_to_rgb() (in module colorsys), 1333
yview() (tkinter.ttk.Treeview method), 1429

Z

Zen of Python, 1911
ZeroDivisionError, 92
zfill() (bytearray method), 65
zfill() (bytes method), 65
zfill() (str method), 51
zip (2to3 fixer), 1584
zip() (built-in function), 24
ZIP_BZIP2 (in module zipfile), 474
ZIP_DEFLATED (in module zipfile), 474
zip_longest() (in module itertools), 347
ZIP_LZMA (in module zipfile), 474
ZIP_STORED (in module zipfile), 474
zipapp (module), 1652
zipapp command line option
 -c, -compress, 1653
 -h, -help, 1653
 -info, 1653
 -m <mainfn>, -main=<mainfn>, 1653
 -o <output>, -output=<output>, 1652
 -p <interpreter>, -python=<interpreter>, 1653
ZipFile (class in zipfile), 475
zipfile (module), 474
zipfile command line option
 -c <zipfile> <source1> ... <sourceN>, 481
 -create <zipfile> <source1> ... <sourceN>, 481
 -e <zipfile> <output_dir>, 481
 -extract <zipfile> <output_dir>, 481
 -l <zipfile>, 481
 -list <zipfile>, 481
 -t <zipfile>, 481
 -test <zipfile>, 481
zipimport (module), 1751
zipimporter (class in zipimport), 1752
ZipImportError, 1751
ZipInfo (class in zipfile), 474
zlib (module), 459
ZLIB_RUNTIME_VERSION (in module zlib), 462
ZLIB_VERSION (in module zlib), 462