NAME

mq_setattr, mq_getattr – set/get message queue attributes

SYNOPSIS

cc [*flag* ...] *file* ... **–lposix4** [*library* ...]

```
#include <mqueue.h>

int mq_setattr(mqd_t mqdes, const struct mq_attr *mqstat,
    struct mq_attr* omqstat);

int mq_getattr(mqd_t mqdes, struct mq_attr *mqstat);

struct mq_attr {
    long    mq_flags;       /* message queue flags */
    long    mq_maxmsg;      /* maximum number of messages */
    long    mq_msgsize;     /* maximum message size */
    long    mq_curmsgs;     /* number of messages currently queued */
    ...
};
```

MT-LEVEL

MT-Safe

DESCRIPTION

mq_setattr( ) is used to set attributes associated with the message queue specified by *mqdes*.

The message queue attributes corresponding to the following members defined in the *mq_attr* structure are set to the specified values upon successful completion of **mq_setattr( )**:

mq_flags The value of this member is either **0** or **O_NONBLOCK**.

The values of **mq_maxmsg**, **mq_msgsize**, and **mq_curmsgs** are ignored by **mq_setattr( ).**

If *omqstat* is non-NULL, **mq_setattr( )** stores, in the location referenced by *omqstat*, the previous message queue attributes and the current queue status. These values are the same as would be returned by a call to **mq_getattr( )** at that point. **mq_getattr( )** is used to get status information and attributes associated with the message queue specified in *mqdes*. Upon return, the **mq_flags** member of the **mq_attr** structure referenced by *mqstat* has the value that was set when the message queue was created but also with modifications made by subsequent **mq_setattr( )** calls.

The following attributes were set at message queue creation:

mq_maxmsg

mq_msgsize

Upon return, the **mq_curmsgs** (the number of messages currently on the queue) member of the **mq_attr** structure referenced by *mqstat* is set according to the current state of the message queue.

RETURN VALUES

Upon successful completion, these function(s) return **0**; otherwise, they return **-1**, and set **errno** to indicate the error condition.

mq_setattr( ), if successful, also changes the attributes of the message queue as specified.

ERRORS

EBADF *mqdes* is not a valid message queue descriptor.

ENOSYS **mq_setattr( )** and **mq_getattr( )** are not supported by this implementation.

SEE ALSO

mq_open(3R), **mq_receive**(3R), **mq_send**(3R)

BUGS

In Solaris 2.5, these functions always return **–1** and set **errno** to **ENOSYS,** because this release does not support the Message Passing option. It is our intention to provide support for these interfaces in future releases.