NAME

elf_aux_info - extract data from the elf auxiliary vector of the current process

LIBRARY

Standard C Library (libc, -lc)

SYNOPSIS

#include <sys/auxv.h>

int
elf_aux_info(*int aux, void *buf, int buflen*);

DESCRIPTION

The **elf_aux_info**() function retrieves the auxiliary info vector requested in *aux*. The information is stored into the provided buffer if it will fit. The following values, defined in <*sys/elf_common.h*> can be requested (corresponding buffer sizes are specified in parenthesis):

AT_CANARY The canary value for SSP (arbitrary sized buffer, as many bytes are returned as it fits into it, rest is zeroed).

AT_EXECPATH The path of executed program (MAXPATHLEN). This may not be present if the process was initialized by fexecve(2) and the namecache no longer contains the file's name.

AT_HWCAP CPU / hardware feature flags (sizeof(u_long)).

AT_HWCAP2 CPU / hardware feature flags (sizeof(u_long)).

AT_NCPUS Number of CPUs (sizeof(int)).

AT_OSRELDATE The OSRELDATE of the kernel or jail the program is running on (sizeof(int)).

AT_PAGESIZES Vector of page sizes (arbitrary sized buffer, as many elements of the pagesizes array are returned as it fits).

AT_PAGESZ Page size in bytes (sizeof(int)).

AT_TIMEKEEP Pointer to VDSO timehands (for library internal use, sizeof(void *)).

AT_USRSTACKBASE

Top of the user stack for main thread.

AT_USRSTACKLIM
Limit for grow of the user stack for main thread.

RETURN VALUES

Returns zero on success, or an error number on failure.

ERRORS

[EINVAL] An unknown item was requested.

[EINVAL] The provided buffer was not the right size for the requested item.

[ENOENT] The requested item is not available.

HISTORY

The **elf_aux_info**() function appeared in FreeBSD 12.0.

BUGS

Only a small subset of available auxiliary info vector items are accessible with this function. Some items require a "right-sized" buffer while others just require a "big enough" buffer.