

UNIX Device Drivers

Device drivers comprise a collection of code which resides in the kernel for the purpose of controlling various peripheral devices. While this code is kernel resident, it is often created by vendors to support their particular hardware controllers, and is not necessarily constructed by the same people who write the rest of the kernel. Kernel support for drivers has to provide for:

- driver construction by developers who may not have access to the kernel sources
- compatibility with other systems; driver writers would prefer to write one driver for their device which can easily port to various platforms
- general programming support for the developer; remember, driver code is kernel code and cannot be linked against the standard language libraries. The kernel must supply routines that make up for the lack of standard library support