Question 1.
Answer: copyin() is used to copy a block of memory from user-level address to kernel address; copyout() is used to copy a block of memory from kernel address to user-level address

Question 2.
Answer: UIO_USERSPACE means userspace and UIO_USERISPACE means user instruction space. When the memory move occurs only in the kernel we use UIO_SYSSPACE instead.

Question 3.
Answer: If we don't close the file opened, the user program might be able to modify it.

Question 4.
Answer: md_usermode.

Question 5.
Answer: Define userptr_t as a pointer to a one-byte structure, so it won't mix with other pointers. It can cast vaddr from vaddr_t into userptr_t so that the value of vaddr can be assigned to be the user address space.

Question 6.
Answer: Currently it calls painc which will cause the kernel to crash. We want to kill the current process instead of shuting down the whole kernel.

Question 7.
Answer: At the time that mips_syscall() and kill_curthread() is invoked the interrupt is enabled.

Question 8.
Answer: vfs_open().

Question 9.
Answer: Operations that can be done on vnode: vnode_init, vnode_kill, vnode_incref, vnode_decref, vnode_incopen, vnode_decopen, vnode_check. There is no need to create two vnodes while two different processes are trying to open the same file.