

```
#include <stdio.h>
#include <unistd.h>

char String1[] = "Hello, this is the message from parent to child";
char String2[] = "Hello, this is the message from chld to parent";

main ()
{
    char buf[1024];
    int fds1[2], fds2[2];
    int childr, childw, parentr, parentw;

    pipe (fds1);
    pipe (fds2);
    childr = fds1[0];
    childw = fds2[1];
    parentr = fds2[0];
    parentw = fds1[1];

    if (fork() > 0)
    { /* the parent process */
        close (childr); close (childw);
        write (parentw, String1, sizeof (String1));
        read (parentr, buf, sizeof (String2));
        printf ("Parent: %s\n", buf);
    }
    else
    { /* the child process */
        close (parentr); close (parentw);
        write (childw, String2, sizeof (String2));
        read (childr, buf, sizeof (String1));
        printf ("Child: %s\n", buf);
    }
}
```