

seL4 IPC Internals

What message do we need to pass?

Assume we are still on x86_64. By looking at the original seL4 syscall implementation. For example **x64_sys_send_recv**:

```
x64_sys_recv(sel4_Word sys, sel4_Word src, sel4_Word *out_badge,
             sel4_Word *out_info, sel4_Word *out_mr0, sel4_Word *out_mr1,
             sel4_Word *out_mr2, sel4_Word *out_mr3, sel4_Word reply)
{
    register sel4_Word mr0 asm("r10");
    register sel4_Word mr1 asm("r8");
    register sel4_Word mr2 asm("r9");
    register sel4_Word mr3 asm("r15");
    MCS_REPLY_DECL;
    asm volatile(
        "movq    %%rsp, %%rbx    \n"
        "syscall                    \n"
        "movq    %%rbx, %%rsp    \n"
        : "=D"(*out_badge),
          "=S"(*out_info),
          "=r"(mr0),
          "=r"(mr1),
          "=r"(mr2),
          "=r"(mr3)
        : "d"(sys),
          "D"(src)
        : "MCS_REPLY"
        : "%rcx", "%rbx", "r11", "memory"
    );
}
```