



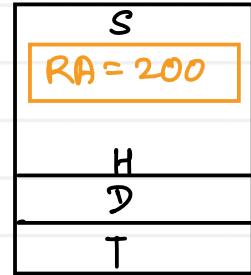
**Sunbeam Institute of Information Technology  
Pune and Karad**

**Module - Embedded Operating System**

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# Signal Delivery



```

main() {
    ① signal(SIGINT, sig-handler);
    while(1) {
        ③ f → 200
        ④ ↓
    }
}

```

```

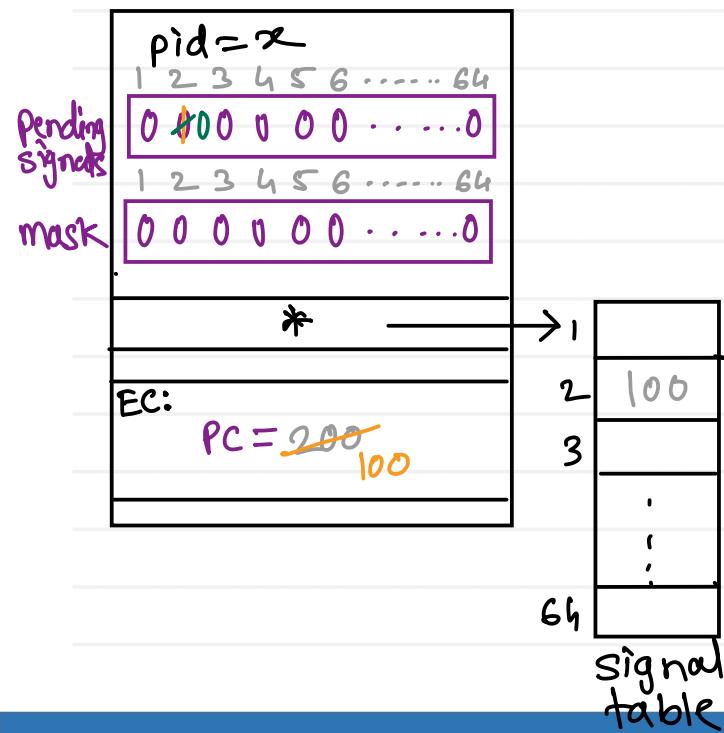
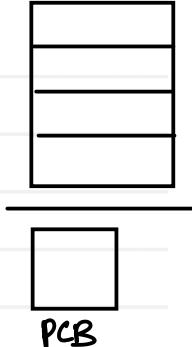
100 sig-handler() {
    ⑤ ↓
}

```

```

main() {
    ② ↓
    kill(x, SIGINT);
}

```



```

interrupt-handler() {
    ⑥ save execution context of
        running process in its PCB
    ⑦ find address of ISR from IRT
    ⑧ call ISR()
}

4) pid = CPU_Scheduler();
5) signal_delivery(pid);
6) CPU_Dispatcher(pid);
}

```

signal-delivery(pid) {

- 1) find PCB of process (pid) from process list.
- 2) find all pending signals which are non masked
- 3) for each pending signal
  - a. create dummy stack frame on user space stack of process, so that process will resume where it is paused.
  - b. update execution context in PCB. PC = addr of signal handler
  - c. clear pending bit of signal





Thank you!!!

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