SP. Hw 3. report.

(a)

main
dummy
funct_1
dummy
funct_2
dummy
funct_3
dummy
funct_4

use gdb, "info frame" will show a function's rbp

and previous function's rsp

(b) Yes, the local variable is in the stack frame, so its value will remain the same when the scheduler jump back to the function.

(c) When funct_4 longjmp to main, if there is no dummy function, then main calls Scheduler, the stack frame of Scheduler will overlap the stack frame of funct_1.

dummy is used to prepare the space for the Scheduler function.

(d) No. the stack frame of dummy is covered by Scheduler, so the program cannot return to main following the path.

(e) I finished the program by following the instructions in the pdf file and implemented each function according the pseudo code in the pdf file