Worksheet 4B

Quiz 1: *Semantics of print*

Program *Expected Output*

```
(print 42)
```

```
(let (x1 100)
(let (x2 200)
  (block
    (print x1)
    (print x2))))
```

Quiz 2: *Assembly for print*

Program *Assembly*

```
(print 42)
```

```
(print e)
```

Quiz 3: *Passing parameters with rdi*

Like with `snek_error`, we used `rdi` to pass the param to `snek_print`.

Unlike with `snek_error`, we're coming back!

Can you write a test that will *break* our compiler?

Quiz 4: *Semantics of functions*

Fill in the result of evaluating the following programs.

Program *Result*

```
(fun (incr n)
  (add1 n)
)

(incr 100)
```

```
(fun (fac n)
  (if (= n 0)
    1
    (* n (fac (sub1 n)))
  )
)

(fac 5)
```

Quiz 5: *Assembly: Caller*

Program

```
(incr 100)
```

Assembly

```
mov rax, 200
```

```
(f e)
```

```
; << e >>
```

Quiz 6: *Assembly: Callee*

Program

```
(fun (incr n)
  (add1 n)
)
```

Assembly

```
; setup frame


; body


; teardown frame
```

Quiz 7: *Your turn!*

What is something you found confusing in today's lecture (or earlier)?