

### for loop

```
for (init-expr; test-expr; update-expr)
    body-statement;
```

### Equivalent while loop

```
init-expr;
while (test-expr) {
    body-statement;
    update-expr;
}
```

### Jump-to-middle

```
init-expr;
goto test;
loop:
    body-statement;
    update-expr;
test:
    t = test-expr;
    if (t)
        goto loop;
```

### Guarded do

```
init-expr;
t = test-expr;
if (!t)
    goto done;
loop:
    body-statement;
    update-expr;
    t = test-expr;
    if (t)
        goto loop;
done:
```