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Exercise 1.1

In below expressions, the result printed by the interpreter is given. It's assumed that the sequence is to be evaluated in the order they are presented.

```
10
```

10

```
(+ 5 3 4)
```

12

```
(- 9 1)
```

8

```
(/ 6 2)
```

3

```
(+ (* 2 4) (- 4 6))
```

6

```
(define a 3)
```

implementation dependent a = 3

```
(define b (+ a 1))
```

implementation dependent b = 4

```
(+ a b (* a b))
```

19

```
(= a b)
```

false

```
(if (and (> b a) (< b (* a b)))
    b
    a)
```

4

```
(cond ((= a 4) 6)
      ((= b 4) (+ 6 7 a))
      (else 25))
```

16

```
(+ 2 (if (> b a) b a))
```

6

```
(* (cond ((> a b) a)
         ((< a b) b)
         (else -1)
   (+ a 1)
```

16

Exercise 1.2

Tanslation of the following expression into prefix notation

$$\frac{5+4+(2-(3-(6+\frac{4}{5})))}{3(6-2)(2-7)}$$

```
(/ (+ 5
      4
      (- 2 (- 3
              (+ 6
                 (/ 4 5)))))
   (* 3
      (- 6 2)
      (- 2 7)))
```