

1. Variables
2. Constants
3. if/else
4. Loops
5. Functions
6. Arrays/lists
7. Classes

Which one is the most important?

5

6

1

What is $(x \cdot x * x)(2)$?

$(x:\text{int}) \Rightarrow x * x$

4

5 4

5 16

What are the free variables in $(x \cdot ((y \cdot x * y)(z)))(y)$?

z

4 y,z

2

z y

x

outside y

last occurrence of y, z

1

y

x and z

z,y

y z

Put all () back into $\backslash c.\backslash d.\backslash e.c d e$

1 $\backslash c.(\backslash d.(\backslash e.(c d) e))$

$\backslash c.(\backslash d.(\backslash e.((c d) (e))))$

0 $\backslash c.(\backslash d.(\backslash e.(c d)(e)))$

$(\backslash c.(\backslash d (\backslash e ((cd)e))))$

$\backslash c.(\backslash d.(\backslash e.((c d) e)))$

$(\backslash c.(\backslash d.(\backslash e.((c d) e))))$

$\backslash c.(\backslash d.(\backslash e.c) d) e$

$\backslash c(\backslash d(\backslash e(cd)e))$

$(\backslash c.(\backslash d.(\backslash e.(c d)))) e$

$(\backslash c.(\backslash d.(\backslash e.(cd)e)))$

(((\c.\d)\e)c d) e
\c(\d(\e(c.d.e)))