

## Quiz 3

COMP9021 Principles of Programming

2014 session 1

### Sample outputs

```
$ a.out
```

```
Enter a floating point number in base 3 represented as a dot
- preceded by between 1 and 20 digits equal to 0, 1 or 2,
the first of which is not 0 and is possibly preceded by + or -, and
- followed by between 0 and 10 digits equal to 0, 1 or 2:
```

```
1.
```

```
The number that has been input is approximately equal to 1.000000
In base 2, this number is approximately equal to +1.0000000000 * 2^0
```

```
$ a.out
```

```
Enter a floating point number in base 3 represented as a dot
- preceded by between 1 and 20 digits equal to 0, 1 or 2,
the first of which is not 0 and is possibly preceded by + or -, and
- followed by between 0 and 10 digits equal to 0, 1 or 2:
```

```
2.0
```

```
The number that has been input is approximately equal to 2.000000
In base 2, this number is approximately equal to +1.0000000000 * 2^1
```

```
$ a.out
```

```
Enter a floating point number in base 3 represented as a dot
- preceded by between 1 and 20 digits equal to 0, 1 or 2,
the first of which is not 0 and is possibly preceded by + or -, and
- followed by between 0 and 10 digits equal to 0, 1 or 2:
```

```
-101.202020
```

```
The number that has been input is approximately equal to -10.748971
In base 2, this number is approximately equal to -1.0101011111 * 2^3
```

```
$ a.out
```

```
Enter a floating point number in base 3 represented as a dot
- preceded by between 1 and 20 digits equal to 0, 1 or 2,
the first of which is not 0 and is possibly preceded by + or -, and
- followed by between 0 and 10 digits equal to 0, 1 or 2:
```

```
+11111111110000000000.0101010101
```

```
The number that has been input is approximately equal to 1743362676.124998
In base 2, this number is approximately equal to +1.1001111110 * 2^30
```

```

$ a.out
Enter a floating point number in base 3 represented as a dot
- preceded by between 1 and 20 digits equal to 0, 1 or 2,
the first of which is not 0 and is possibly preceded by + or -, and
- followed by between 0 and 10 digits equal to 0, 1 or 2:
-222222000000111111.201201201
The number that has been input is approximately equal to -386889412.730732
In base 2, this number is approximately equal to -1.0111000011 * 2^28
$ a.out
Enter a floating point number in base 3 represented as a dot
- preceded by between 1 and 20 digits equal to 0, 1 or 2,
the first of which is not 0 and is possibly preceded by + or -, and
- followed by between 0 and 10 digits equal to 0, 1 or 2:
+210012210012.0000000000
The number that has been input is approximately equal to 417560.000000
In base 2, this number is approximately equal to +1.1001011111 * 2^18
$ a.out
Enter a floating point number in base 3 represented as a dot
- preceded by between 1 and 20 digits equal to 0, 1 or 2,
the first of which is not 0 and is possibly preceded by + or -, and
- followed by between 0 and 10 digits equal to 0, 1 or 2:
111222000021202102.000000012
The number that has been input is approximately equal to 200358911.000254
In base 2, this number is approximately equal to +1.0111111000 * 2^27

```