Programming Constructs

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if

Executes code if a condition holds.

Example

```
1 x = 3;
2
3 if x>0
4    disp("positive")
5 end
```

if

Executes code if a condition holds.

Example

```
1 x = 3;
2
3 if x>0
4   disp("positive")
5 end
```

Output

```
positive
```

if

Executes code if a condition holds.

Example

```
1 x = -3;
2
3 if x>0
4    disp("positive")
5 end
```

if

Executes code if a condition holds.

Example

```
1 x = -3;
2
3 if x>0
4    disp("positive")
5 end
```

Output

if/else

Executes a block of code if a condition holds, and a different block of code otherwise.

Example

```
1 x = -7;
2
3 if x>0
4    disp("positive")
5 else
6    disp("negative")
7 end
```

if/else

Executes a block of code if a condition holds, and a different block of code otherwise.

Example

```
1 x = -7;
2
3 if x>0
4    disp("positive")
5 else
6    disp("negative")
7 end
```

Output

```
negative
```

for

Repeats a block of code a number of times, updating the value of a variable on each iteration.

Example

```
1 for j = 1:3
2    disp(j);
3 end
```

for

Repeats a block of code a number of times, updating the value of a variable on each iteration.

Example

```
for j = 1:3
   disp(j);
end
```

Output

```
     1

     2

     3
```