

# Your title here

## General section

Description of the first section goes here.

```
import os
```

## Section with code output

Description of the second section goes here.

```
print("Hello, world!")
```

Hello, world!

## Section with code evaluation but no results included

This section is evaluated but execution results are not included in the output.

```
print("Hello, world!")
```

## Section with code evaluation but no results included

This section is evaluated but execution results are not included in the output.

```
print(os.getcwd())
```

## Section with code evaluation and results included

This section is evaluated and execution results are included in the output.

```
print(os.getcwd())
```

/home/runner/work/pyansys-quarto-cheatsheet/pyansys-quarto-cheatsheet/examples

## Section without code evaluation

```
print(os.getcwd())
```

If there is no evaluation, the code cell is not executed. Thus, no execution results are included in the output.

## Section without code echo

This section is not evaluated, and the code cell is not shown in the rendered document. However, the output is included in the rendered document.

Hello, world!

## Section without code echo and output

This section is not evaluated, and the code cell is not shown in the rendered document. The output is also not included in the rendered document.

## Use of variables

### Styles of text

#### Bold text

#### *Italic* text

#### **Bold** and *italic* text

### Lists and images

1. Numbered list
  2. Numbered list
  3. Numbered list
- Bulleted list
  - Bulleted list
  - Bulleted list



Figure 1: image

## Mathematical operators and expressions

Mathematical expressions with operators:

- Comparison operators:  $a \geq b$ ,  $a \leq b$ ,  $a > b$ ,  $a < b$ ,  $a = b$ ,  $a \neq b$
- Arithmetic operations:  $a + b$ ,  $a - b$ ,  $a \times b$ ,  $a \div b$ ,  $a^2$ ,  $\sqrt{a}$
- Logical operators:  $a \wedge b$ ,  $a \vee b$ ,  $\neg a$

- Set operations:  $A \cup B$ ,  $A \cap B$ ,  $A \subseteq B$ ,  $x \in A$

Complex expressions:

$$\int_0^\infty e^{-x^2} dx = \frac{\sqrt{\pi}}{2}$$

$$\sum_{i=1}^n i = \frac{n(n+1)}{2}$$

Algorithm pseudocode with math symbols:

```
for i = 1 to n:  
    if x[i] ≥ threshold:  
        result[i] ← x[i] × weight  
    else:  
        result[i] ← 0
```

You can also leverage the `algorithm` and `algpseudocode` LaTeX packages for more advanced algorithm representation.

## Algorithm 1 Sample Algorithm

**Require:**  $n \geq 0$

**Ensure:**  $y = x^n$

$y \leftarrow 1$

$X \leftarrow x$

$N \leftarrow n$

**while**  $N \neq 0$  **do**

**if**  $N$  is even **then**

$X \leftarrow X \times X$

$N \leftarrow \frac{N}{2}$

**else if**  $N$  is odd **then**

$y \leftarrow y \times X$

$N \leftarrow N - 1$

**end if**

**end while**

▷ This is a comment

## Subsection

- Add subsections as needed.
- Add more subsections as needed.
- Add more subsections as needed.
- [link](#)
- [link](#)
- [link](#)