# CSCI 141

Command Line Arguments

## Goals

- Know how to pass user input to a program via command line arguments.
- Know how to access those arguments inside a program.

# User Input

command line arguments

(sometimes also known as)

program arguments

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1. **Pass** arguments to the program when running it.

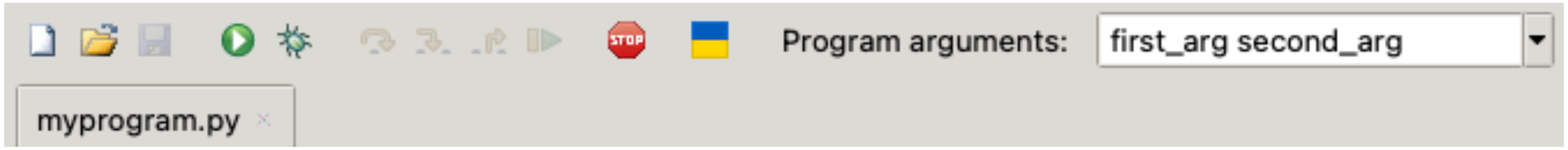
2. **Access** the arguments in the program's code.

# 1. Passing Command Line Arguments

This depends on how you run your program. For Thonny:

1. Enable the Program arguments box by checking **Program arguments** in the **View** menu. You should only need to do this once per Thonny installation.

2. Type the arguments in the Program arguments box, then click the Friendly Green Run Button



On a command line:

Add the arguments to your command, separated by spaces:

```
python3 myprogram.py first_arg second_arg
```

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import sys # at the top of your program

first_argument = sys.argv[1]
second_argument = sys.argv[2]
# and so on...
```

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# Demo

- Run a program that takes and prints two command line arguments in Thonny.
- Run the same program from the command line.
- What happens if you try to read an argument that the user didn't supply?
- What happens if you never use an argument that *was* supplied to the program?

# `input` vs command line args

Why use one over the other?

# Demo

- add2.py: write a program that takes two integers as command line arguments and prints their sum
    - Notice that we need to convert them to integers!
    - What happens if the provided arguments do not look like integers?