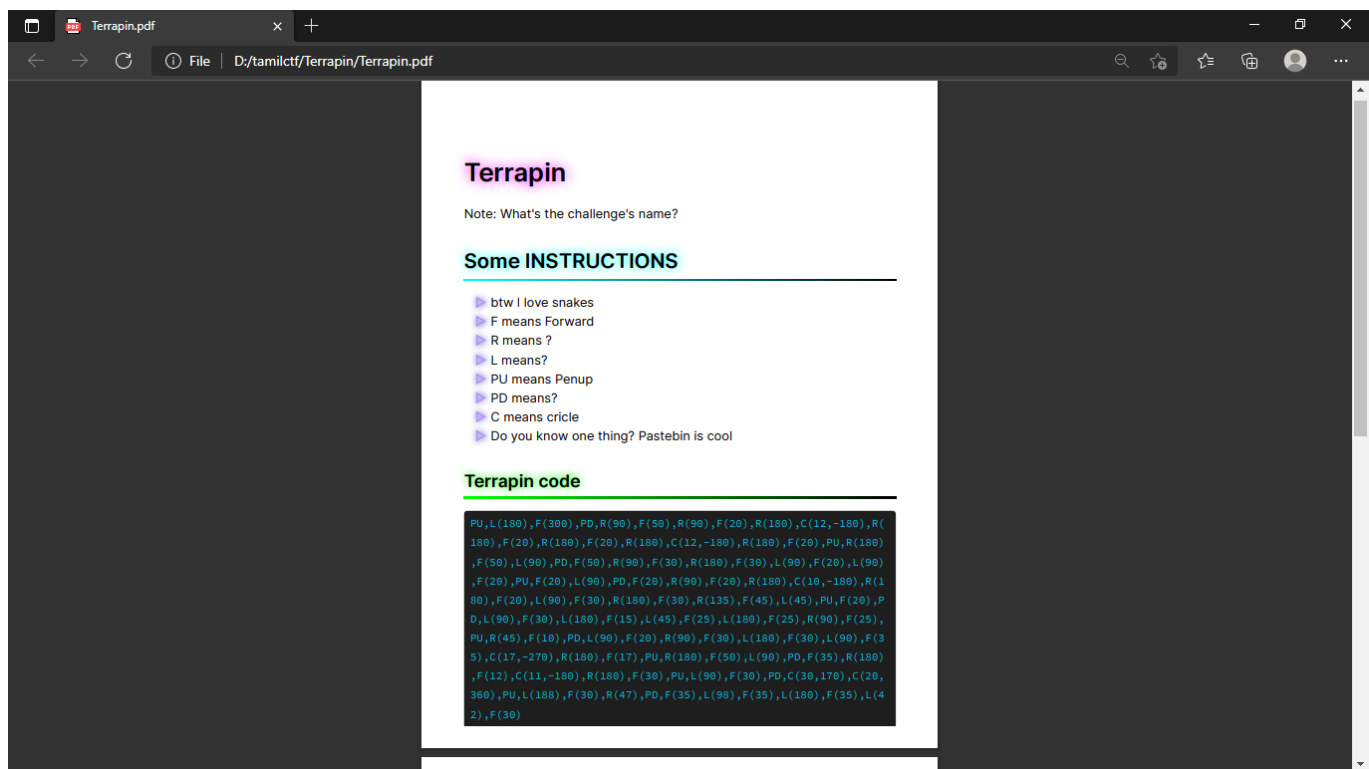# Terrapin [MISC]

Description

Pay attention to title

Writeup

- ▷ Here we got a pdf file
- ▷ Let's see what's in it :)

- ▷ Note: What's the challenge's name?
- ▷ Let's search for it in google
- ▷ Terrapin means turtles
- ▷ And by reading the instructions you can understand, the author loves snakes

- ▷ Snakes means python
- ▷ And terrapin means turtle (turtle - a module in python)
- ▷ And forward,penup,circle are the functions in turtle module
- ▷ Also they provided us a terrapin code
- ▷ Looks like we need to use this to make a program
- ▷ Little bit of googling helps you to learn this module
- ▷ It's very simple

Terrapin code

```
PU,L(180),F(300),PD,R(90),F(50),R(90),F(20),R(180),C(12,-180),R(
180),F(20),R(180),F(20),R(180),C(12,-180),R(180),F(20),PU,R(180)
,F(50),L(90),PD,F(50),R(90),F(30),R(180),F(30),L(90),F(20),L(90)
,F(20),PU,F(20),L(90),PD,F(20),R(90),F(20),R(180),C(10,-180),R(1
80),F(20),L(90),F(30),R(180),F(30),R(135),F(45),L(45),PU,F(20),P
D,L(90),F(30),L(180),F(15),L(45),F(25),L(180),F(25),R(90),F(25),
PU,R(45),F(10),PD,L(90),F(20),R(90),F(30),L(180),F(30),L(90),F(3
5),C(17,-270),R(180),F(17),PU,R(180),F(50),L(90),PD,F(35),R(180)
,F(12),C(11,-180),R(180),F(30),PU,L(90),F(30),PD,C(30,170),C(20,
360),PU,L(188),F(30),R(47),PD,F(35),L(98),F(35),L(180),F(35),L(4
2),F(30)
```

- ▷ This is the code they provided in the pdf
- ▷ You can clearly assume that these are the functions in turtle module
- ▷ We just need to replace that

They said:

- ▷ F - forward
- ▷ PU - penup
- ▷ C - circle

But there're other words too like, PD,L,R
So if you know about turtle module you can guess this
that

▷ PD means pendown
▷ L means left
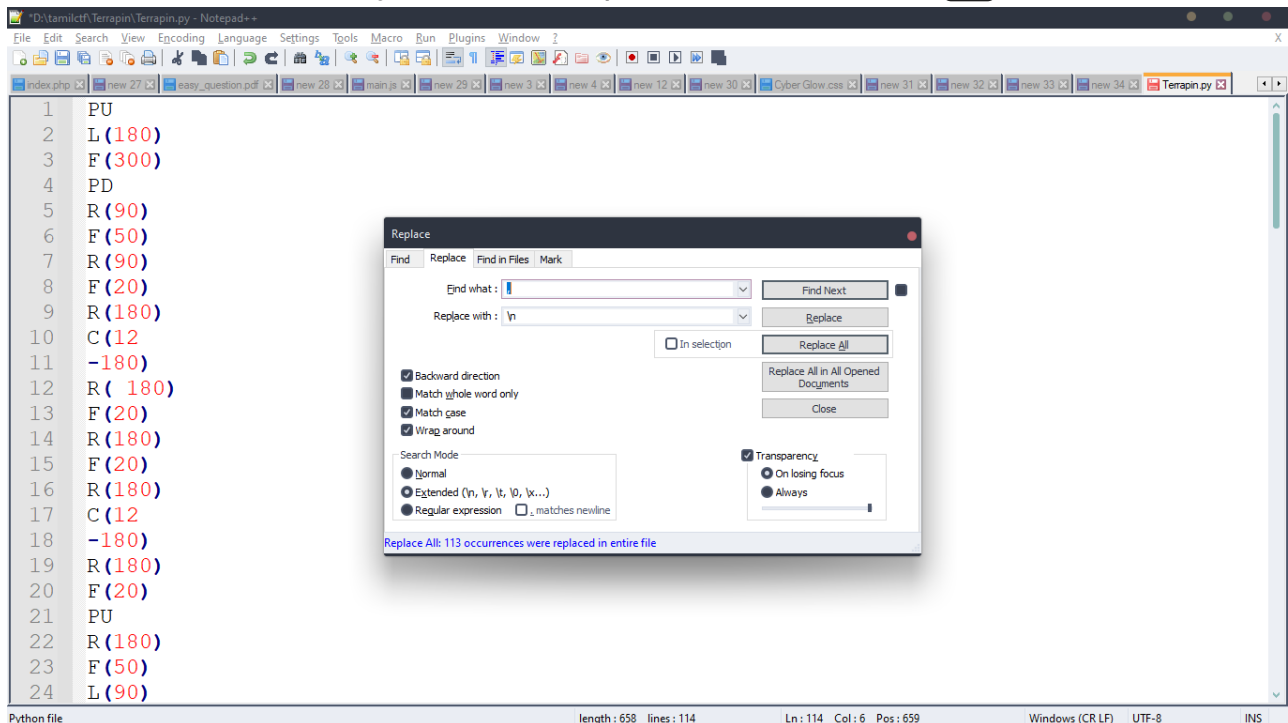▷ R means right

THIS IS VERY EASY TO GUESS :)

Programming part

▷ First let's open a text editor(I'm gonna use notepad)
▷ copy and paste the **terrapin code** in text editior
▷ And start replacing

```python
# Add these two lines first
import turtle
t = turtle.Turtle()
```

▷

First, There're so many commas, replace commas with `\n`

▷ Cool done.
▷ Now replace `PU` with `t.penup()`
▷ Replace `PD` with `t.pendown()`

- ▷ Replace `F` with `t.forward`
- ▷ Replace `L` with `t.left`
- ▷ Replace `R` with `t.right`
- ▷ Replace `C` with `t.circle`
- ▷

  And one important thing some circle function have two values like `t.circle(10,180)`

- ▷

  So here's a comma, in starting you replaced `,` with `\n` so this function also gets affected so correct it
- ▷ Just add a comma there, that's all
- ▷ Now run your code :)

- ▷ WOW we got some letters **BFRk5n9Y**
- ▷ What to do with these letters?
- ▷ Read the instructions in the pdf carefully
- ▷ Note the last line `Do you know one thing? Pastebin is cool`
- ▷ So this is a paste, let's see it
- ▷ `pastebin.com/BFRk5n9Y` put the result after /
- ▷ Now go to this link

▶ Cool we got our flag `TamilCTF{7urtl3s_4r3_veRrrRyy_sl0ww}`