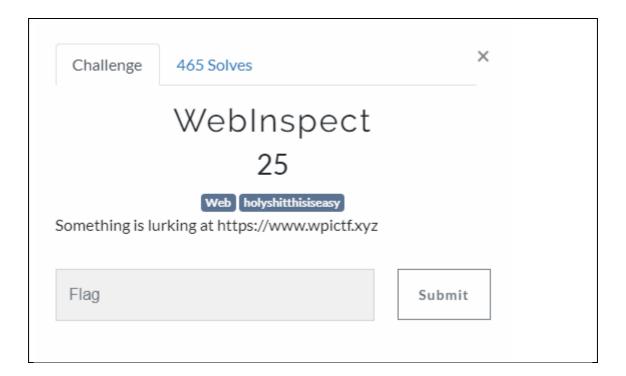
ENESYS



TEKNOKRAT AND SYSTEM SECURITY TENESYS 2019

1. Webinspect – 25 point

– Web –



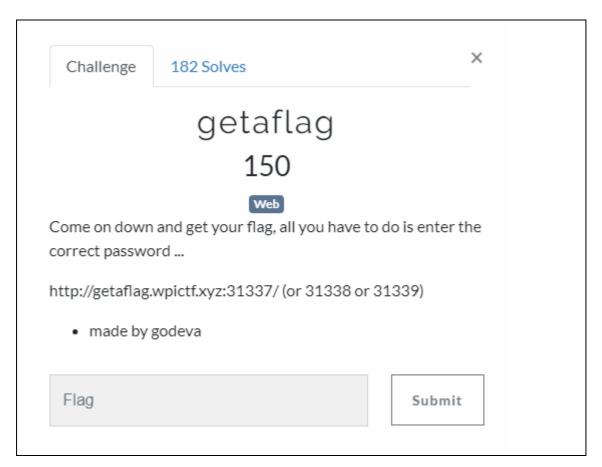
- Didapatkan sebuah website
- Lalu lihat view source + search "WPI{"

```
<!-- WPI{InspectOr_Gadget} -->
<h5> What's Unique about WPICTF?</h5>
  We have onsite physical devices that you can try
  hack into.<br>
  We are <b>beginner friendly</b>. Most challenges
  were made by WPI students, so they are designed from
  being extremely easy to extremely difficult.<br>
  <br>
  <br/>
  <br/>
  <br/>
  <br/>
  <br/>
  <br/>
  <br/>
  <br/>
  <br/>
  </br/>
  </br/>
  <br/>
  <br/>
```

• Dan didapatkan flag: WPI{Inspect0r_Gadget}

2. getaflag – 150 point

- Web -



• Didapatkan sebuah website

GET a ₹
All you gotta do is guess the correct password?
Enter

 Lalu di cek terlebih dahulu view sourcenya dan ada base64

• Lalu didecode dan didapatkan auth.php

```
Input value to Encode or Decode:

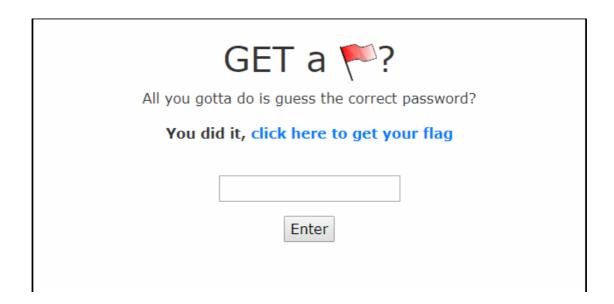
Hey Goutham, don't forget to block /auth.php after you upload this challenge;)
```

Lalu akses http://getaflag.wpictf.xyz:31337/auth.php

```
// Pseudocode
$passcode = '???';
$flag = '????'

extract($_GET);
if (($input is detected)) {
  if ($input === get_contents($passcode)) {
    return $flag
  } else {
    echo "Invalid ... Please try again!"
  }
}
```

Lalu akses
 http://getaflag.wpictf.xyz:31337/?input=&passcode=

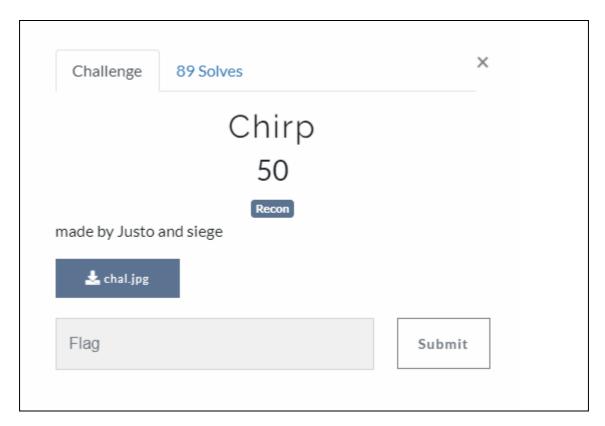


Lalu lihat view source kembali

Dan didapatkan flag : WPI{1_I0v3_PHP}

3. Chirp - 50 point

- Recon -



Didapatkan sebuah gambar



 Asumsi pertama ini adalah sebuah stegano, lalu dicoba menggunakan Steghide dan ternyata ada sebuah password

D:\Tool\steghide-0.5.1\steghide-0.5.1\steghide>steghide.exe extract -sf Syl.jpg Enter passphrase: steghide: could not extract any data with that passphrase!

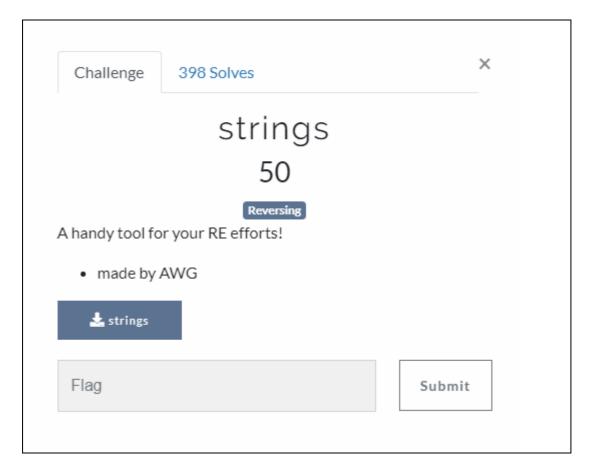
- Lalu saya masukkin beberapa pass dengan nama nama bluebird lah , berbau dengan event tersebutlah dan hasilnya nihil
- Dan ku tersadar bahwa ini adalah sebuah recon
- Lalu ku asumsikan lagi bahwa ini adalah sebuah bluebird alias twitter lalu ku buka twitter sponsor acara @SiegeTech



- Dengan senang hatinya itu ku masukkan ke pass steghide gambar tersebut dan nothing juga
- Lalu dicoba disolve ternyata itu flagnya ☺
- Dan didapatkan flag: WPI{sp0nsored_by_si3ge}

4. Strings - 50 point

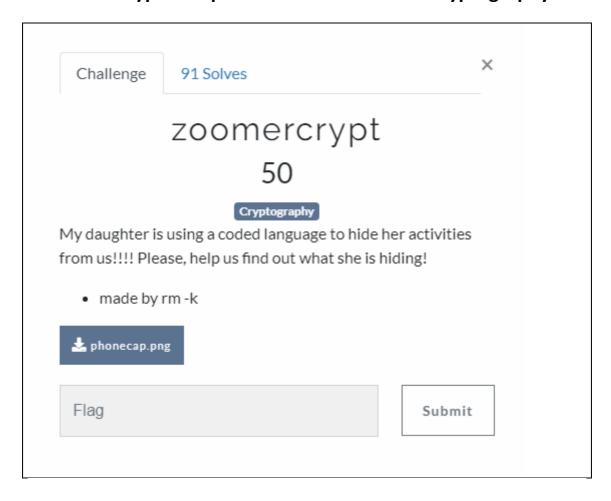
- Reversing -



- Didapatkan sebuah file ELF
- Dan didapatkan flag :WPI{What do you mean I SEE AHH SKI}

5. zoomercrypt – 50 point

- Cryptography -



- Didapatkan sebuah gambar emoji
- Lalu emoji diubah menjadi Unicode
- 1F60B 1F604 1F617 {1F606 1F613 1F604 1F613 1F602 1F608_1F60E 1F603 1F603 1F601 1F613 1F606 1F607}
- Lalu lihat Dictionary Emoji berikut :

```
{
    'a': 'ðŸ~€', # value 1F600
    'b': 'ðŸ~ ', # value 1F601
    'c': 'ðŸ~,', # value 1F602
    'd': 'ðŸ~f', # value 1F603
    'e': 'ðŸ~,', # value 1F604
    'f': 'ðŸ~...', # value 1F605
    'g': 'ðŸ~†', # value 1F606
    'h': 'ðŸ~‡', # value 1F607
    'i': 'ðŸ~^', # value 1F608
    'j': 'ðŸ~&', # value 1F609
    'k': 'ðŸ~Š', # value 1F60A
```

```
'l': 'ðŸ~<', # value 1F60B

'm': 'ðŸ~Œ', # value 1F60C

'n': 'ðŸ~ ', # value 1F60D

'o': 'ðŸ~Ž', # value 1F60E

'p': 'ðŸ~ ', # value 1F60F

'q': 'ðŸ~ ', # value 1F610

'r': 'ðŸ~', # value 1F611

's': 'ðŸ~', # value 1F612

't': 'ðŸ~", # value 1F613

'u': 'ðŸ~", # value 1F614

'v': 'ðŸ~*, # value 1F615

'w': 'ðŸ~-', # value 1F616

'x': 'ðŸ~-', # value 1F617

'y': 'ðŸ~-', # value 1F618

'z': 'ðŸ~*', # value 1F619

}
```

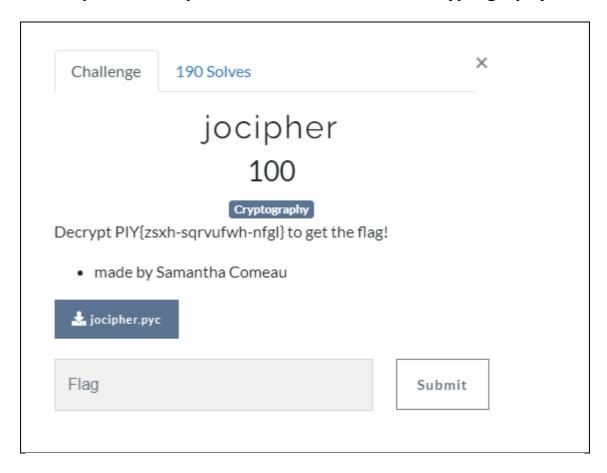
- Didapatkan lex{gtetci_oddbtgh}
- Lalu di Caesar cipher shift 15 atau Rot 15



Dan didapatkan flag: WPI{REPENT_ZOOMERS}

6. Jocipher - 100 point

- Cryptography -



- Didapatkan sebuah file pyc
- Lalu di decompile
- Lalu running script berikut ini :

```
import argparse, re
num = ''
first = ''
second = ''
third = ''
def setup():
    global first
    global num
    global second
    global third
   num += '1'
    num += '2'
   num += '3'
    num += '4'
    num += '5'
    num += '6'
```

```
num += '7'
    num += '8'
    num += '9'
    num += '0'
    first += 'q'
    first += 'w'
    first += 'e'
    first += 'r'
    first += 't'
    first += 'y'
    first += 'u'
    first += 'i'
    first += 'o'
    first += 'p'
    second += 'a'
    second += 's'
    second += 'd'
    second += 'f'
    second += 'q'
    second += 'h'
    second += 'j'
    second += 'k'
    second += 'l'
    third += 'z'
    third += 'x'
    third += 'c'
    third += 'v'
    third += 'b'
    third += 'n'
    third += 'm'
def encode(string, shift):
    result = ''
    for i in range(len(string)):
        char = string.lower()[i]
        if char in num:
            new_char = num[(num.index(char) + shift) %
len(num)]
            result += new_char
        elif char in first:
            new_char = first[(first.index(char) +
shift) % len(first)]
            if string[i].isupper():
                result += new_char.upper()
            else:
                result += new_char
        elif char in second:
            new_char = second[(second.index(char) +
shift) % len(second)]
            if string[i].isupper():
```

```
result += new_char.upper()
            else:
                result += new char
        elif char in third:
            new_char = third[(third.index(char) +
shift) % len(third)]
            if string[i].isupper():
                result += new_char.upper()
            else:
                result += new_char
        else:
            result += char
   print result
   return 0
def decode(string, shift):
   result = ''
    shift = -1 * shift
    for i in range(len(string)):
        char = string.lower()[i]
        if char in num:
            new_char = num[(num.index(char) + shift) %
len(num)]
            result += new_char
        elif char in first:
           new_char = first[(first.index(char) +
shift) % len(first)]
            if string[i].isupper():
                result += new_char.upper()
            else:
                result += new_char
        elif char in second:
            new_char = second[(second.index(char) +
shift) % len(second)]
            if string[i].isupper():
                result += new_char.upper()
            else:
                result += new_char
        elif char in third:
            new_char = third[(third.index(char) +
shift) % len(third)]
            if string[i].isupper():
                result += new_char.upper()
            else:
                result += new_char
        else:
            result += char
   print result
```

```
return 0
def main():
    parser = argparse.ArgumentParser()
    parser.add_argument('--string', '-s', type=str,
required=True, help='the string to encode or decode')
    parser.add_argument('--shift', '-t', type=int,
required=True, help='the shift value to use')
    parser.add_argument('--encode', '-e',
required=False, action='store_true', help='encode the
string')
    parser.add_argument('--decode', '-d',
required=False, action='store_true', help='decode the
string')
    args = parser.parse_args()
    setup()
    p = re.compile('[a-zA-Z0-9] - {}]')
    if p.match(args.string) is not None:
        if args.encode:
            ret = encode(args.string, args.shift)
        else:
            if args.decode:
                ret = decode(args.string, args.shift)
        if ret is not 0:
            print 'Sorry, this cipher only uses the [a-
zA-Z0-9 \setminus -\{\}]'
    else:
        print 'Sorry, this cipher only uses the [a-zA-
Z0-9\\-{}]'
    return
if __name__ == '__main__':
    main()
```

• Masukkan cipher dan shiftnya

```
C:\Python27>python jo.py -s PIY{zsxh-sqrvufwh-nfgl} -t 48 -d WPI{xkcd-keyboard-mash}
```

• Dan didapatkan flag: WPI{xkcd-keyboard-mash}