Презентация по индивидуальному проекту этап №4

Основы информационной безопасности

Паращенко А.Д.

5 октября 2024

Российский университет дружбы народов, Москва, Россия

Цель работы

Цель работы

Изучить работу базового сканера безопасности веб-сервера *nikto*. Просканировать уязвимости в веб-приложении DVWA.

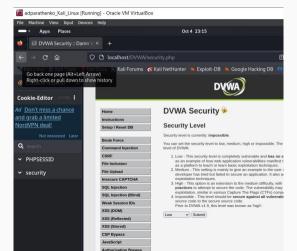
Выполнение лабораторной работы

1)Подготавливаем приложение DVWA для сканирования. (рис. (fig:001?))

```
(adparathenko⊛adparathenko)-[~]
 -$ sudo systemetl start mysql
[sudo] password for adparathenko:
   (adparathenko⊕ adparathenko)-[~]
   sudo systematl start apache2
   (adparathenko® adparathenko)-[~]
```

Рис. 1: Запуск арасhe2

2) Заходим на сайт DVWA и и меняем уровень безопасности на минимальный. (рис. (fig:002?))



3) Запускаем сканер *nikto*. (рис. (**fig:003?**))

```
__(adparathenko⊕ adparathenko)-[~]
_$ #nikto
```

Рис. 3: Запуск nikto

4) Сканируем веб-приложение по полному адресу. (рис. (fig:004?))

```
-$ nikto -h http://127.0.0.1/DVWA/
 Nikto v2 5 a
+ Target IP:
                     127.0.0.1
+ Target Hostname:
                     127.0.0.1
+ Target Port:
4 Start Time:
                     2024-10-04 23:17:24 (GMT3)
+ Server: Anache/2.4.59 (Debian)
+ /DVWA/: The anti-clickjacking X-Frame-Options header is not present. See: https://developer.mozilla.org/en-US/docs/Web/HTTP/Headers
+ /DVWA/: The X-Content-Type-Options header is not set. This could allow the user agent to render the content of the site in a differ
ent fashion to the MIME type. See: https://www.netsparker.com/web-vulnerability-scanner/vulnerabilities/missing-content-type-header/
+ Root page /DVWA redirects to: login.php
+ No CGI Directories found (use '-C all' to force check all possible dirs)
+ OPTIONS: Allowed HTTP Methods: OPTIONS, HEAD, GET, POST .
+ /DVWA///etc/hosts: The server install allows reading of any system file by adding an extra '/' to the URL.
  /DVWA/config/: Directory indexing found.
  /DVWA/config/: Configuration information may be available remotely.
  /DVWA/tests/: Directory indexing found.
  /DVWA/tests/: This might be interesting.
  /DVWA/database/: Directory indexing found.
  /DVWA/database/: Database directory found.
  /DVWA/docs/: Directory indexing found.
  /DVWA/login.php: Admin login page/section found.
+ /DVWA/.git/index: Git Index file may contain directory listing information.
  /DVWA/.git/HEAD: Git HEAD file found. Full repo details may be present.
 /DVWA/.git/config: Git config file found. Infos about reno details may be present.
  /DVWA/.gitignore: .gitignore file found. It is possible to grasp the directory structure.
  /DVWA/ww-content/themes/twentveleven/images/headers/server.php?filesrc=/etc/hosts: A PHP backdoor file manager was found.
  /DVWA/wordpress/wp-content/themes/twentyeleven/images/headers/server.php?filesrc=/etc/hosts: A PHP backdoor file manager was found.
  /DVWA/wp-includes/Requests/Utility/content-post.php?filesrc=/etc/hosts: A PHP backdoor file manager was found.
  /DVWA/wordpress/wp-includes/Requests/Utility/content-post.php?filesrc=/etc/hosts: A PHP backdoor file manager was found.
  /DVWA/wp-includes/js/tinymce/themes/modern/Meuhy.php?filesrc=/etc/hosts: A PHP backdoor file manager was found.
  /DVWA/wordpress/wo-includes/is/tinymce/themes/modern/Meuhy.php?filesrc=/etc/hosts: A PHP backdoor file manager was found.
  /DVWA/assets/mobirise/css/meta.php?filesrc=: A PHP backdoor file manager was found.
  /DVWA/login.cgi?cli=aa%20aa%27cat%20/etc/hosts: Some D-Link router remote command execution.
  /DVWA/shell?cat+/etc/hosts: A backdoor was identified.
 /DVWA/.dockerignore: .dockerignore file found. It may be possible to grasp the directory structure and learn more about the site.
  8074 requests: 0 error(s) and 26 item(s) reported on remote host
+ End Time:
                      2024-10-04 23:18:09 (GMT3) (45 seconds)
```

5) Сканируем веб-приложение по адресу хоста и адресу порта. (рис. (fig:005?))

```
nikto -h 127 0 0 1 -n 80
  Nikto v2.5.6
+ Target IP:
                     127.0.0.1
+ Target Hostname:
                     127.0.0.1
+ Target Port:
                      2024-10-04 23:10:46 (GMT3)
+ Server: Apache/2.4.59 (Debian)
+ /: The anti-clickiacking X-Frame-Ontions header is not present. See: https://developer.mozilla.org/en-US/docs/Web/HTTP/Headers/X-Fr
ame-Ontions
+ /: The X-Content-Type-Options header is not set. This could allow the user agent to render the content of the site in a different f
ashion to the MIME type. See: https://www.netsparker.com/web-vulnerability-scanner/vulnerabilities/missing-content-type-header/
+ No CGI Directories found (use '-C all' to force check all possible dirs)
+ /: Server may leak inodes via ETags, header found with file /, inode: 29cd, size: 622bc13a50766, mtime: gzip, See: http://cve.mitre
.org/cgi-bin/cvename.cgi?name=CVE-2003-1418
+ OPTIONS: Allowed HTTP Methods: OPTIONS, HEAD, GET, POST .
+ ///etc/hosts: The server install allows reading of any system file by adding an extra '/' to the URL.
+ /server-status: This reveals Apache information. Comment out appropriate line in the Apache conf file or restrict access to allowed
 sources. See: OSVDR-561
+ /wp-content/themes/twentveleven/images/headers/server.php?filesrc=/etc/hosts: A PHP backdoor file manager was found.
+ /wordpress/wp-content/themes/twentveleven/images/headers/server.php?filesrc=/etc/hosts: A PHP backdoor file manager was found.
  /wp-includes/Requests/Utility/content-post.php?filesrc=/etc/hosts: A PHP backdoor file manager was found.
+ /wordpress/wp-includes/Requests/Utility/content-post.php?filesrc=/etc/hosts: A PHP backdoor file manager was found.
+ /wp-includes/is/tinymce/themes/modern/Meuhy.php?filesrc=/etc/hosts: A PHP backdoor file manager was found.
+ /wordpress/wp-includes/is/tinymce/themes/modern/Meuhy.php?filesrc=/etc/hosts: A PHP backdoor file manager was found.
+ /assets/mobirise/css/meta.php?filesrc=: A PHP backdoor file manager was found.
+ /login.cgi?cli=aa%20aa%27cat%20/etc/hosts: Some D-Link router remote command execution.
+ /shell?cat+/etc/hosts: A backdoor was identified.
+ 8074 requests: 0 error(s) and 15 item(s) reported on remote host
+ 1 host(s) tested
```

Рис. 5: Сканирование по хосту и порту

Вывод

Вывод

В результате выполнения работы мы познакомились с работой базового сканера безопасности веб-сервера *nikto*, а также просканировали уязвимости в веб-приложении DVWA.

Список литературы

1) https://esystem.rudn.ru/pluginfile.php/2357153/mod_resource/content/2/005-lab_discret_sticky.pdf