



# **Acunetix Threat Level 2**

One or more medium-severity type vulnerabilities have been discovered by the scanner. You should investigate each of these vulnerabilities to ensure they will not escalate to more severe problems.

#### Scan Detail

Target

Scan Type

Start Time

Scan Duration

Requests

Average Response Time

Maximum Response Time

Application Build

pdf.ssbmultiservices.com

Full Scan

Feb 7, 2024, 8:48:21 PM GMT+8

2 minutes

11727

33ms

3443ms

v23.7.230728157







Medium



Low



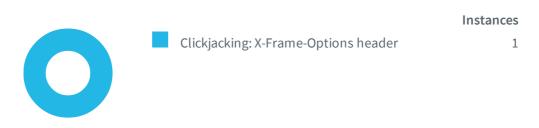
Informational

Severity	Vulnerabilities	Instances
• High	0	0
• Medium	3	3
! Low	1	1
<ul><li>Informational</li></ul>	3	3
Total	7	7

# Informational



# **Low Severity**



# **Medium Severity**



# **Impacts**

SEVERITY	MPACT
• Medium	1 Directory listings
• Medium	1 Unencrypted connection
• Medium	1 Vulnerable JavaScript libraries
① Low	Clickjacking: X-Frame-Options header
① Informational	Content Security Policy (CSP) not implemented
① Informational	1 No HTTP Redirection
<ul><li>Informational</li></ul>	Permissions-Policy header not implemented

# **Directory listings**

Directory listing is a web server function that displays the directory contents when there is no index file in a specific website directory. It is dangerous to leave this function turned on for the web server because it leads to information disclosure.

## **Impact**

A user can view a list of all files from the affected directories possibly exposing sensitive information.

# http://pdf.ssbmultiservices.com/

Verified

Folders with directory listing enabled:

- http://pdf.ssbmultiservices.com/dflip/
- http://pdf.ssbmultiservices.com/dflip/js/
- http://pdf.ssbmultiservices.com/dflip/js/libs/
- http://pdf.ssbmultiservices.com/dflip/css/
- http://pdf.ssbmultiservices.com/dflip/images/
- http://pdf.ssbmultiservices.com/dflip/images/pdfjs/
- http://pdf.ssbmultiservices.com/dflip/fonts/
- http://pdf.ssbmultiservices.com/dflip/sound/
- http://pdf.ssbmultiservices.com/dflip/images/textures/

#### Request

GET /dflip/ HTTP/1.1

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

Accept-Encoding: gzip, deflate, br

User-Agent: Mozilla/5.0 (Windows NT 10.0; Win64; x64) AppleWebKit/537.36 (KHTML, like Gecko)

Chrome/114.0.0.0 Safari/537.36 Host: pdf.ssbmultiservices.com

Connection: Keep-alive

#### Recommendation

You should make sure no sensitive information is disclosed or you may want to restrict directory listings from the web server configuration.

#### References

#### CWE-548: Exposure of Information Through Directory Listing

https://cwe.mitre.org/data/definitions/548.html

# **Unencrypted connection**

This scan target was connected to over an unencrypted connection. A potential attacker can intercept and modify data sent and received from this site.

## **Impact**

Possible information disclosure.

# http://pdf.ssbmultiservices.com/

Verified

#### Request

GET / HTTP/1.1

Referer: http://pdf.ssbmultiservices.com/

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

Accept-Encoding: gzip, deflate, br

User-Agent: Mozilla/5.0 (Windows NT 10.0; Win64; x64) AppleWebKit/537.36 (KHTML, like Gecko)

Chrome/114.0.0.0 Safari/537.36 Host: pdf.ssbmultiservices.com

Connection: Keep-alive

#### Recommendation

The site should send and receive data over a secure (HTTPS) connection.

# **Vulnerable JavaScript libraries**

You are using one or more vulnerable JavaScript libraries. One or more vulnerabilities were reported for this version of the library. Consult Attack details and Web References for more information about the affected library and the vulnerabilities that were reported.

## **Impact**

Consult References for more information.

## http://pdf.ssbmultiservices.com/

Confidence: 95%

- jQuery 1.11.0
  - URL: http://pdf.ssbmultiservices.com/
  - o Detection method: The library's name and version were determined based on its dynamic behavior.
  - o CVE-ID: CVE-2015-9251, CVE-2020-11022, CVE-2020-11023
  - o Description: Possible Cross Site Scripting via third-party text/javascript responses / In jQuery versions greater than or equal to 1.2 and before 3.5.0, passing HTML from untrusted sources even after sanitizing it to one of jQuery's DOM manipulation methods (i.e. .html(), .append(), and others) may execute untrusted code. This problem is patched in jQuery 3.5.0. / In jQuery versions greater than or equal to 1.0.3 and before 3.5.0, passing HTML containing option elements from untrusted sources even after sanitizing it to one of jQuery's DOM manipulation methods (i.e. .html(), .append(), and others) may execute untrusted code. This problem is patched in jQuery 3.5.0.
  - o References:
    - https://github.com/jquery/jquery/issues/2432
    - http://blog.jquery.com/2016/01/08/jquery-2-2-and-1-12-released/
    - https://blog.jquery.com/2020/04/10/jquery-3-5-0-released/
    - https://mksben.lo.cm/2020/05/jquery3.5.0-xss.html
    - https://jquery.com/upgrade-guide/3.5/
    - https://api.jquery.com/jQuery.htmlPrefilter/
    - https://www.cvedetails.com/cve/CVE-2020-11022/
    - https://github.com/advisories/GHSA-gxr4-xjj5-5px2
    - https://www.cvedetails.com/cve/CVE-2020-11023/
    - https://github.com/advisories/GHSA-jpcq-cgw6-v4j6

#### Request

GET / HTTP/1.1

Referer: http://pdf.ssbmultiservices.com/

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

Accept-Encoding: gzip, deflate, br

User-Agent: Mozilla/5.0 (Windows NT 10.0; Win64; x64) AppleWebKit/537.36 (KHTML, like Gecko)

Chrome/114.0.0.0 Safari/537.36 Host: pdf.ssbmultiservices.com

Connection: Keep-alive

#### Recommendation

Upgrade to the latest version.

# Clickjacking: X-Frame-Options header

Clickjacking (User Interface redress attack, UI redress attack, UI redressing) is a malicious technique of tricking a Web user into clicking on something different from what the user perceives they are clicking on, thus potentially revealing confidential information or taking control of their computer while clicking on seemingly innocuous web pages.

The server did not return an **X-Frame-Options** header with the value DENY or SAMEORIGIN, which means that this website could be at risk of a clickjacking attack. The X-Frame-Options HTTP response header can be used to indicate whether or not a browser should be allowed to render a page inside a frame or iframe. Sites can use this to avoid clickjacking attacks, by ensuring that their content is not embedded into untrusted sites.

# **Impact**

The impact depends on the affected web application.

# http://pdf.ssbmultiservices.com/

Paths without secure XFO header:

- http://pdf.ssbmultiservices.com/
- http://pdf.ssbmultiservices.com/index.html
- http://pdf.ssbmultiservices.com/dflip/images/
- http://pdf.ssbmultiservices.com/dflip/
- http://pdf.ssbmultiservices.com/dflip/images/pdfjs/
- http://pdf.ssbmultiservices.com/dflip/fonts/
- http://pdf.ssbmultiservices.com/dflip/sound/
- http://pdf.ssbmultiservices.com/dflip/images/textures/
- http://pdf.ssbmultiservices.com/dflip/css/
- http://pdf.ssbmultiservices.com/dflip/js/
- http://pdf.ssbmultiservices.com/dflip/js/libs/
- http://pdf.ssbmultiservices.com/mailman/archives/

#### Request

GET / HTTP/1.1

Referer: http://pdf.ssbmultiservices.com/

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

Accept-Encoding: gzip, deflate, br

User-Agent: Mozilla/5.0 (Windows NT 10.0; Win64; x64) AppleWebKit/537.36 (KHTML, like Gecko)

Chrome/114.0.0.0 Safari/537.36 Host: pdf.ssbmultiservices.com

Connection: Keep-alive

#### Recommendation

Configure your web server to include an X-Frame-Options header and a CSP header with frame-ancestors directive. Consult Web references for more information about the possible values for this header.

### References

#### The X-Frame-Options response header

https://developer.mozilla.org/en-US/docs/Web/HTTP/Headers/X-Frame-Options

#### **Clickjacking**

https://en.wikipedia.org/wiki/Clickjacking

## **OWASP Clickjacking**

https://cheatsheetseries.owasp.org/cheatsheets/Clickjacking\_Defense\_Cheat\_Sheet.html

#### Frame Buster Buster

https://stackoverflow.com/questions/958997/frame-buster-buster-buster-code-needed

# Content Security Policy (CSP) not implemented

Content Security Policy (CSP) is an added layer of security that helps to detect and mitigate certain types of attacks, including Cross Site Scripting (XSS) and data injection attacks.

Content Security Policy (CSP) can be implemented by adding a **Content-Security-Policy** header. The value of this header is a string containing the policy directives describing your Content Security Policy. To implement CSP, you should define lists of allowed origins for the all of the types of resources that your site utilizes. For example, if you have a simple site that needs to load scripts, stylesheets, and images hosted locally, as well as from the jQuery library from their CDN, the CSP header could look like the following:

```
Content-Security-Policy:
default-src 'self';
script-src 'self' https://code.jquery.com;
```

It was detected that your web application doesn't implement Content Security Policy (CSP) as the CSP header is missing from the response. It's recommended to implement Content Security Policy (CSP) into your web application.

## **Impact**

CSP can be used to prevent and/or mitigate attacks that involve content/code injection, such as cross-site scripting/XSS attacks, attacks that require embedding a malicious resource, attacks that involve malicious use of iframes, such as clickjacking attacks, and others.

# http://pdf.ssbmultiservices.com/

Paths without CSP header:

- http://pdf.ssbmultiservices.com/
- http://pdf.ssbmultiservices.com/index.html
- http://pdf.ssbmultiservices.com/dflip/images/
- http://pdf.ssbmultiservices.com/dflip/
- http://pdf.ssbmultiservices.com/dflip/images/pdfjs/
- http://pdf.ssbmultiservices.com/dflip/fonts/
- http://pdf.ssbmultiservices.com/dflip/sound/
- http://pdf.ssbmultiservices.com/dflip/images/textures/
- http://pdf.ssbmultiservices.com/dflip/css/
- http://pdf.ssbmultiservices.com/dflip/js/
- http://pdf.ssbmultiservices.com/dflip/js/libs/
- http://pdf.ssbmultiservices.com/mailman/archives/

#### Request

GET / HTTP/1.1

Referer: http://pdf.ssbmultiservices.com/

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

Accept-Encoding: gzip,deflate,br

User-Agent: Mozilla/5.0 (Windows NT 10.0; Win64; x64) AppleWebKit/537.36 (KHTML, like Gecko)

Chrome/114.0.0.0 Safari/537.36 Host: pdf.ssbmultiservices.com

Connection: Keep-alive

#### Recommendation

It's recommended to implement Content Security Policy (CSP) into your web application. Configuring Content Security Policy involves adding the **Content-Security-Policy** HTTP header to a web page and giving it values to control resources the user agent is allowed to load for that page.

#### References

#### Content Security Policy (CSP)

https://developer.mozilla.org/en-US/docs/Web/HTTP/CSP

## **Implementing Content Security Policy**

https://hacks.mozilla.org/2016/02/implementing-content-security-policy/

# No HTTP Redirection

It was detected that your web application uses HTTP protocol, but doesn't automatically redirect users to HTTPS.

## **Impact**

In some circumstances, it could be used for a man-in-the-middle (MitM) attack

# http://pdf.ssbmultiservices.com/

#### Request

GET / HTTP/1.1

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

Accept-Encoding: gzip, deflate, br

User-Agent: Mozilla/5.0 (Windows NT 10.0; Win64; x64) AppleWebKit/537.36 (KHTML, like Gecko)

Chrome/114.0.0.0 Safari/537.36 Host: pdf.ssbmultiservices.com

Connection: Keep-alive

#### Recommendation

It's recommended to implement best practices of HTTP Redirection into your web application. Consult web references for more information

#### References

#### **HTTP Redirections**

https://infosec.mozilla.org/guidelines/web\_security#http-redirections

# Permissions-Policy header not implemented

The Permissions-Policy header allows developers to selectively enable and disable use of various browser features and APIs.

## **Impact**

# http://pdf.ssbmultiservices.com/

Locations without Permissions-Policy header:

- http://pdf.ssbmultiservices.com/
- http://pdf.ssbmultiservices.com/index.html
- http://pdf.ssbmultiservices.com/dflip/images/
- http://pdf.ssbmultiservices.com/dflip/
- http://pdf.ssbmultiservices.com/dflip/images/pdfjs/
- http://pdf.ssbmultiservices.com/dflip/fonts/
- http://pdf.ssbmultiservices.com/dflip/sound/
- http://pdf.ssbmultiservices.com/dflip/images/textures/
- http://pdf.ssbmultiservices.com/dflip/css/
- http://pdf.ssbmultiservices.com/dflip/js/
- http://pdf.ssbmultiservices.com/dflip/js/libs/
- http://pdf.ssbmultiservices.com/mailman/
- http://pdf.ssbmultiservices.com/mailman/archives/

#### Request

GET / HTTP/1.1

Referer: http://pdf.ssbmultiservices.com/

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

Accept-Encoding: gzip,deflate,br

User-Agent: Mozilla/5.0 (Windows NT 10.0; Win64; x64) AppleWebKit/537.36 (KHTML, like Gecko)

Chrome/114.0.0.0 Safari/537.36 Host: pdf.ssbmultiservices.com

Connection: Keep-alive

### References

# Permissions-Policy / Feature-Policy (MDN)

https://developer.mozilla.org/en-US/docs/Web/HTTP/Headers/Feature-Policy

# Permissions Policy (W3C)

https://www.w3.org/TR/permissions-policy-1/

# Coverage

