

## Security Advisory

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### CVE-2021-44228 Apache Log4j

#### Revision history:

Date	Rev.	Description
12.01.2022.	4	Patch release added: HPE Intelligent Management Center (E0706 P06), Proficy Historian with Web Components (version 9.1) Workaround added: HPE SimpliVity 325 (versions 4.1.1, 4.1.0U1, 4.1.0, 4.0.1U1, 4.0.1, 4.0.0, 3.7.10U1, 3.7.10/3.7.10A, 3.7.9)
21.12.2021.	3	Patch release added: HPE 3PAR Service Processor (versions 5.x)
20.12.2021.	2	Added additional relevant vendors: Cisco, HPE, LogMeIn, NAKIVO, QNAP, Schneider Electric, TeamViewer
16.12.2021.	1	Initial release

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## 1. INTRODUCTION

A critical vulnerability in Apache Log4j identified by CVE-2021-44228 and a low severity vulnerability identified by CVE-2021-45046 have been publicly disclosed. This vulnerability allows for remote code execution by exploiting the Java Logging Library log4j2. Montelektro is aware of this vulnerability and of how it could, if exploited, potentially impact our customers' environments.

Montelektro is continuously monitoring security advisories published by vendors of the components that are used in our IT infra and PCS solutions.

This is an ongoing event, please check this advisory for frequent updates as they develop.

## 2. MONITORED PRODUCTS

Vulnerability exposure status of Montelektro PCS relevant products confirmed by their vendors.

### 2.1. AFFECTED PRODUCTS

*Table 1 - Products affected and confirmed by the vendor*

Vendor	Product	Security advisory
<b>HPE</b>	3PAR Service Processor (versions 5.x)	<a href="#">HPE Security bulletin - HPESBGN04219 rev.1 - HPE 3PAR Service Processors, Apache Log4j 2 Remote Arbitrary Code Execution and Remote Code Execution – December 21, 2021</a>
	Intelligent Management Center (E0706 P06)	<a href="#">HPE Support alert - HPE Intelligent Management Center - Security Advisory for Apache Log4j2 Vulnerability (CVE-2021-44228) – December 17, 2021</a>
	SimpliVity 325 (versions 4.1.1, 4.1.0U1, 4.1.0, 4.0.1U1, 4.0.1, 4.0.0, 3.7.10U1, 3.7.10/3.7.10A, 3.7.9)	<a href="#">HPE Security bulletin - HPESBGN04215 rev.5 - Certain HPE Products using Apache Log4j2, Remote Arbitrary Code Execution – December 18, 2021</a>
	SimpliVity OmniCube (versions 3.7.10/3.7.10A, 3.7.9)	<a href="#">HPE Security bulletin - HPESBGN04215 rev.5 - Certain HPE Products using Apache Log4j2, Remote Arbitrary Code Execution – December 18, 2021</a>
	StoreServ Management Console (SSMC) versions prior to v3.8.2.1	<a href="#">HPE Security bulletin - HPESBGN04218 rev.1 - HPE 3PAR/Primera StoreServ Management Console (SSMC), Apache Log4j 2 Remote Arbitrary Code Execution – December 18, 2021</a>
<b>NAKIVO</b>	NAKIVO Backup & Replication versions prior to v10.5.1	<a href="#">NAKIVO Knowledge base - Log4j2 (CVE-2021-44228) Vulnerability – December 15, 2021</a>
<b>Proficy / GE</b>	Proficy Historian with Web Components (version 9.1)	<a href="#">GE Digital Plant Manufacturing and Proficy Product Security Communication - December 15, 2021</a>
<b>Schneider Electric</b>	APC PowerChute Business Edition (versions 9.5, 10.0, 10.0.1, 10.0.2, 10.0.3, 10.0.4) APC PowerChute Network Shutdown (versions 4.4.1, 4.4, 4.3, 4.2)	<a href="#">Schneider Electric Security Notification - Apache Log4j Vulnerability (Log4Shell) v4.0 – December 17, 2021</a>
<b>VMware</b>	vCenter Server 7.x, 6.7.x, 6.5.x virtual appliance vCenter Server 6.7.x, 6.5.x Windows	<a href="#">VMware Security Advisory VMSA-2021-0028.3 - Updated On 2021-12-15</a>

## 2.2. UNAFFECTED PRODUCTS

Table 2 - Not affected products confirmed by the vendor

Vendor	Product	Security advisory
<b>Cisco</b>	Entire relevant portfolio	<a href="#">Cisco Security advisory - Vulnerabilities in Apache Log4j Library Affecting Cisco Products: December 2021 v1.23 – December 19, 2021</a>
<b>ESET</b>	Entire relevant portfolio	<a href="#">[ALERT8188] Information regarding the Log4j 2 vulnerability</a>
<b>HPE</b>	Aruba networking relevant portfolio	<a href="#">HPE Security bulletin - HPEsBNW04216 rev.1 - HPE Aruba Silver Peak Orchestrator, Remote Arbitrary Code Execution – December 16, 2021</a>
<b>LogMeIn</b>	Hamachi	<a href="#">LogMeIn's Response to Log4j – Remediated – publish date not specified</a>
<b>Microsoft</b>	Entire relevant portfolio	<a href="#">Microsoft's Response to CVE-2021-44228 Apache Log4j 2 2021 Dec 11, updated 2021 Dec 15.</a>
<b>Proficy / GE</b>	iFIX HMI/SCADA Webspace Licensing Historian (versions 6.0, 7.0, 7.1, 7.2, 8.0, 8.1, 9.0), Historian 9.1 ( <i>when the web components have been excluded from the install</i> ) Industrial Gateway Server, Win 911	<a href="#">GE Digital Plant Manufacturing and Proficy Product Security Communication - December 15, 2021</a>
<b>ProLeiT</b>	Entire portfolio	<a href="#">Critical vulnerability in JAVA library Log4j - (CVE-2021-44228) - Press News 12/15/2021</a>
<b>Qlik</b>	Entire relevant portfolio	<a href="#">Qlik Vulnerability Testing - Apache Log4j, reference CVE-2021-44228 (also referred to as Log4Shell)</a>
<b>QNAP</b>	Entire relevant portfolio	<a href="#">QNAP Security advisory Vulnerability in Apache Log4j Library v1.1 – December 15, 2021</a>
<b>Rockwell</b>	Entire relevant portfolio	<a href="#">Rockwell Log4Shell Vulnerability Notice - Version 1.1, 15-Dec-2021. Updated Affected Products and Risk Mitigation &amp; User Actions</a>
<b>Secomea</b>	Entire portfolio	<a href="#">Other security statements - Statement on Log4Shell vulnerability – CVE-2021-44228</a>
<b>Siemens</b>	Entire relevant portfolio	<a href="#">SSA-661247: Apache Log4j Vulnerabilities (Log4Shell, CVE-2021-44228, CVE-2021-45046) - Impact to Siemens Products v1.2</a>
<b>TeamViewer</b>	Entire portfolio (server-side patch deployed)	<a href="#">TeamViewer Security bulletins - Server-side hotfix for log4j issue, December 15, 2021</a>
<b>VMware</b>	vSphere ESXi Workstation Workstation Player Tools	<a href="#">VMware Response to CVE-2021-44228: Apache Log4j Remote Code Execution (87068) - Updated On 2021-12-15</a>

### 3. AVAILABLE MITIGATIONS AND FIXES

#### 3.1. HPE - 3PAR SERVICE PROCESSOR (VERSIONS 5.X)

[Patch released in v5.0.9.2.](#)

#### 3.2. HPE - INTELLIGENT MANAGEMENT CENTER (E0706 P06)

[Patch released for various versions.](#)

Workaround available: [HPE Support alert - HPE Intelligent Management Center - Security Advisory for Apache Log4j2 Vulnerability \(CVE-2021-44228\) – December 17, 2021, chapter Details.](#)

#### 3.3. HPE - SIMPLIVITY 325 (4.1.1, 4.1.0U1, 4.1.0, 4.0.1U1, 4.0.1, 4.0.0, 3.7.10U1, 3.7.10/3.7.10A, 3.7.9)

Patch release pending.

Workaround available: [HPE SimpliVity - Systems Running With VMware vCenter 6.5X, 6.7x and 7.x Are Impacted By Apache Log4j2 Vulnerability \(CVE 2021-44228 and CVE 2021-45046\).](#)

#### 3.4. HPE - SIMPLIVITY OMNICUBE (VERSIONS 3.7.10/3.7.10A, 3.7.9)

Patch release pending.

No workaround available at the moment.

#### 3.5. HPE - STORESERV MANAGEMENT CONSOLE (SSMC) VERSIONS PRIOR TO V3.8.2.1

[Patch released in v3.8.2.1.](#)

#### 3.6. NAKIVO - BACKUP & REPLICATION VERSIONS PRIOR TO V10.5.1

[Patch released in v10.5.1.](#)

Manual fix instructions available: [NAKIVO Knowledge base article Log4j2 \(CVE-2021-44228\) Vulnerability, chapter Manual Fix.](#)

### 3.7. PROFICY / GE - PROFICY HISTORIAN WITH WEB COMPONENTS (V9.1)

Patch released: [Proficy Historian with Web Components SIM 91](#).

Workaround available: [GE Digital Plant Manufacturing and Proficy Product Security Communication - December 15, 2021 – Chapter Recommended Mitigations](#).

### 3.8. SCHNEIDER ELECTRIC - APC POWERCHUTE BUSINESS EDITION (VERSIONS 9.5, 10.0, 10.0.1, 10.0.2, 10.0.3, 10.0.4)

Patch release pending.

Workaround available: [Schneider Electric Security Notification - Apache Log4j Vulnerability \(Log4Shell\) v4.0 – December 17, 2021 – Table Affected Products, column Recommended Mitigation](#).

### 3.9. SCHNEIDER ELECTRIC - APC POWERCHUTE NETWORK SHUTDOWN (VERSIONS 4.4.1, 4.4, 4.3, 4.2)

Patch release pending.

Workaround available: [Schneider Electric Security Notification - Apache Log4j Vulnerability \(Log4Shell\) v4.0 – December 17, 2021 – Table Affected Products, column Recommended Mitigation](#).

### 3.10. VMWARE - VCENTER SERVER 7.X, 6.7.X, 6.5.X VIRTUAL APPLIANCE

Patch release pending.

Workaround available: [VMware Workaround instructions to address CVE-2021-44228 in vCenter Server and vCenter Cloud Gateway \(87081\)](#).

### 3.11. VMWARE - VCENTER SERVER 6.7.X, 6.5.X WINDOWS

Patch release pending.

Workaround available: [VMware Workaround instructions to address CVE-2021-44228 in vCenter Server Windows \(87096\)](#).

## 4. MITIGATION RECOMMENDATIONS

As a general security measure, Montelektro strongly recommends protecting network access to devices with appropriate mechanisms.

Workaround deployment on affected systems which are not exposed to the outside world should be postponed until final patch is released by the vendor.

Patch planning and administration guidelines from Montelektro PCS IT maintenance and security whitepaper should be considered during the patch deployment.

An active SLA contract can be used to support the installation of the patch on components supplied by Montelektro.



## 5. REFERENCES

- Cisco. (2021, December 19). *Cisco Security advisory - Vulnerabilities in Apache Log4j Library Affecting Cisco Products: December 2021 v1.23*. Retrieved from Cisco Security Advisories: <https://tools.cisco.com/security/center/content/CiscoSecurityAdvisory/cisco-sa-apache-log4j-qRuKNEbd>
- ESET. (2021, December 15). *[ALERT8188] Information regarding the Log4j 2 vulnerability*. Retrieved from <https://support.eset.com/en/alert8188-information-regarding-the-log4j2-vulnerability>
- GE. (2021, December 15). *GE Digital Plant Manufacturing and Proficy Product Security Communication*. Retrieved from [https://digitalsupport.ge.com/en\\_US/Article/GE-Digital-Plant-Manufacturing-Log4j-Product-Communication-GED-21-02](https://digitalsupport.ge.com/en_US/Article/GE-Digital-Plant-Manufacturing-Log4j-Product-Communication-GED-21-02)
- GE. (2022, January 5). *GE Digital Plant Manufacturing and Proficy Log4j Product Communication GED 21-02 DPM*. Retrieved from GE Customer Center: [https://digitalsupport.ge.com/communities/en\\_US/Article/GE-Digital-Plant-Manufacturing-Log4j-Product-Communication-GED-21-02?Type=Alert\\_kav](https://digitalsupport.ge.com/communities/en_US/Article/GE-Digital-Plant-Manufacturing-Log4j-Product-Communication-GED-21-02?Type=Alert_kav)
- HPE. (2021, December 17). *HPE Support alert - HPE Intelligent Management Center - Security Advisory for Apache Log4j2 Vulnerability (CVE-2021-44228)*. Retrieved from HPE Support center: [https://support.hpe.com/hpesc/public/docDisplay?docId=emr\\_na-a00120130en\\_us](https://support.hpe.com/hpesc/public/docDisplay?docId=emr_na-a00120130en_us)
- HPE. (2021, December 18). *HPESBGN04215 rev.5 - Certain HPE Products using Apache Log4j2, Remote Arbitrary Code Execution*. Retrieved from HPE Support center: [https://support.hpe.com/hpesc/public/docDisplay?docLocale=en\\_US&docId=hpesbgn04215en\\_us](https://support.hpe.com/hpesc/public/docDisplay?docLocale=en_US&docId=hpesbgn04215en_us)
- HPE. (2021, December 18). *HPESBGN04218 rev.1 - HPE 3PAR/Primera StoreServ Management Console (SSMC), Apache Log4j 2 Remote Arbitrary Code Execution*. Retrieved from HPE Support center: [https://support.hpe.com/hpesc/public/docDisplay?docLocale=en\\_US&docId=hpesbgn04218en\\_us](https://support.hpe.com/hpesc/public/docDisplay?docLocale=en_US&docId=hpesbgn04218en_us)
- HPE. (2021, December 21). *HPESBGN04219 rev.1 - HPE 3PAR Service Processors, Apache Log4j 2 Remote Arbitrary Code Execution and Remote Code Execution*. Retrieved from HPE Support center: [https://support.hpe.com/hpesc/public/docDisplay?docLocale=en\\_US&docId=emr\\_na-hpesbgn04219en\\_us](https://support.hpe.com/hpesc/public/docDisplay?docLocale=en_US&docId=emr_na-hpesbgn04219en_us)
- HPE. (2021, December 16). *HPESBNW04216 rev.1 - HPE Aruba Silver Peak Orchestrator, Remote Arbitrary Code Execution*. Retrieved from HPE Support center: [https://support.hpe.com/hpesc/public/docDisplay?docLocale=en\\_US&docId=hpesbnw04216en\\_us](https://support.hpe.com/hpesc/public/docDisplay?docLocale=en_US&docId=hpesbnw04216en_us)
- HPE. (2022, January 6). *HPE Support alert - HPE Intelligent Management Center - Security Advisory for Apache Log4j2 Vulnerability (CVE-2021-44228, CVE-2021-45046, CVE-2021-45105)*. Retrieved from HPE Support center: [https://support.hpe.com/hpesc/public/docDisplay?docId=emr\\_na-a00120130en\\_us](https://support.hpe.com/hpesc/public/docDisplay?docId=emr_na-a00120130en_us)
- HPE. (2022, January 5). *HPE Support alert - HPE SimpliVity - Systems Running With VMware vCenter 6.5X, 6.7x and 7.x Are Impacted By Apache Log4j2 Vulnerability (CVE 2021-44228 and CVE 2021-45046)*. Retrieved from HPE Support center: [https://support.hpe.com/hpesc/public/docDisplay?docId=emr\\_na-a00120260en\\_us](https://support.hpe.com/hpesc/public/docDisplay?docId=emr_na-a00120260en_us)
- LogMeIn. (2021, December). *LogMeIn's Response to Log4j — Remediated*. Retrieved from Support portal: <https://support.logmeininc.com/pro/help/logmeins-response-to-log4j>
- Microsoft. (2021, December 15). *Microsoft's Response to CVE-2021-44228 Apache Log4j*. Retrieved from <https://msrc-blog.microsoft.com/2021/12/11/microsofts-response-to-cve-2021-44228-apache-log4j2/>

- Montelektro. (2019, July). *Process Control System – IT maintenance and security Whitepaper*. Retrieved from <https://www.montelektro.hr/wp-content/uploads/2021/12/White-paper-PCS-IT-maintenance-and-security-R01.pdf>
- NAKIVO. (2021, December 15). *Log4j2 (CVE-2021-44228) Vulnerability*. Retrieved from Knowledge Base: <https://helpcenter.nakivo.com/display/KB/Log4j2+%28CVE-2021-44228%29+Vulnerability>
- NIST. (2021, December 16). *CVE-2021-44228 Detail*. Retrieved from National Vulnerability Database: <https://nvd.nist.gov/vuln/detail/CVE-2021-44228>
- ProLeiT. (2021, December 15). *Critical vulnerability in JAVA library Log4j - (CVE-2021-44228) - Press News*. Retrieved from [https://www.proleit.com/news-events/press/?tx\\_news\\_pi1%5Bnews%5D=349&tx\\_news\\_pi1%5Bcontroller%5D=News&tx\\_news\\_pi1%5Baction%5D=detail&cHash=8a167e2c359107f1a6d16749b55114f3](https://www.proleit.com/news-events/press/?tx_news_pi1%5Bnews%5D=349&tx_news_pi1%5Bcontroller%5D=News&tx_news_pi1%5Baction%5D=detail&cHash=8a167e2c359107f1a6d16749b55114f3)
- Qlik. (2021, December 15). *Vulnerability Testing - Apache Log4j, reference CVE-2021-44228 (also referred to as Log4Shell)*. Retrieved from <https://community.qlik.com/t5/Support-Updates-Blog/Vulnerability-Testing-Apache-Log4j-reference-CVE-2021-44228-also/ba-p/1869368>
- QNAP. (2021, December 15). *Vulnerability in Apache Log4j Library*. Retrieved from QNAP Security Advisories: <https://www.qnap.com/en/security-advisory/qa-21-58>
- Rockwell. (2021, December 15). *Rockwell Log4Shell Vulnerability Notice - Version 1.1*. Retrieved from [https://rockwellautomation.custhelp.com/app/answers/answer\\_view/a\\_id/1133605](https://rockwellautomation.custhelp.com/app/answers/answer_view/a_id/1133605)
- Schneider Electric. (2021, December 17). *Security Notification - Apache Log4j Vulnerability (Log4Shell)*. Retrieved from <https://www.se.com/ww/en/download/document/SESB-2021-347-01/>
- Secomea. (2021, December 13). *Other security statements - Statement on Log4Shell vulnerability – CVE-2021-44228*. Retrieved from <https://www.secomea.com/support/cybersecurity-advisory/>
- Siemens. (2021, December 16). *SSA-661247: Apache Log4j Vulnerabilities (Log4Shell, CVE-2021-44228, CVE-2021-45046) - Impact to Siemens Products v1.2*. Retrieved from <https://cert-portal.siemens.com/productcert/pdf/ssa-661247.pdf>
- TeamViewer. (2021, December 15). *Security bulletins - Server-side hotfix for log4j issue*. Retrieved from Trust Center: [https://www.teamviewer.com/en/trust-center/security-bulletins/hotfix-log4j2-issue/?\\_ga=2.206685072.242790736.1639989472-1764969916.1639989472](https://www.teamviewer.com/en/trust-center/security-bulletins/hotfix-log4j2-issue/?_ga=2.206685072.242790736.1639989472-1764969916.1639989472)
- VMware. (2021, December 15). *VMware Response to CVE-2021-44228: Apache Log4j Remote Code Execution (87068)*. Retrieved from <https://kb.vmware.com/s/article/87068>
- VMware. (2021, December 15). *VMware Security Advisory VMSA-2021-0028.3*. Retrieved from <https://www.vmware.com/security/advisories/VMSA-2021-0028.html>
- VMware. (2021, December 16). *VMware Workaround instructions to address CVE-2021-44228 in vCenter Server and vCenter Cloud Gateway (87081)*. Retrieved from [https://kb.vmware.com/s/article/87081?lang=en\\_US](https://kb.vmware.com/s/article/87081?lang=en_US)
- VMware. (2021, December 15). *VMware Workaround instructions to address CVE-2021-44228 in vCenter Server Windows (87096)*. Retrieved from <https://kb.vmware.com/s/article/87096>