

OPENSSH SCP - CVE-2020-15778

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Summary

In July 2020, a vulnerability was disclosed that could allow an SCP client's user to run arbitrary commands on a remote SCP server. This vulnerability could be used by a malicious ACOS administrator to impact SCP servers. However, ACOS does not expose the "scp" command directly to administrators of ACOS systems. The parameters (fields) are processed by the ACOS CLI and GUI backend to generate "scp" commands in ACOS. The parameter structures and backtick characters needed to exploit this issue are detected when parsed and will result in syntax errors.

Item		Score		
#	Vulnerability ID	Source	Score	Summary
1	CVE-2020-15778	CVSSv3	7.8 High	openssh: scp allows command injection when using backtick
				characters in the destination argument ^[1]

Affected Releases

The table below indicates releases of ACOS exposed to this vulnerability and ACOS releases that address them. ACOS release families not indicated below are unaffected by these vulnerabilities.

Customers using affected ACOS releases can overcome vulnerability exposures by updating to the indicated resolved release. If the table does not list a corresponding resolved or unaffected release, then no ACOS release update is currently available.

Releases A	ffect	ed	Releases Resolved or Unaffected
5.1.0	-	5.2.1-Px	None
5.0.1-TPS	-	5.0.2-TPS-Px	None
4.1.4-GR1	-	4.1.4-GR1-Px	None
3.2.5	_	3.2.5-Px	None

Workarounds and Mitigations

To mitigate this vulnerability, ensure that administrative access to ACOS devices is constrained to only trusted administrators.

If needed, an additional mitigation can be to ensure communication between ACOS devices and SCP servers is secured via local or network firewalls which are configured to block SCP connections from the ACOS devices. Since this will block SCP file transfers from the ACOS device, use alternate secure file transfer methods when managing and configuring these devices. Other ACOS secure file transfer methods available include SFTP and HTTPS, which are not exposed to this vulnerability.

Software Updates

Software updates that address these vulnerabilities are or will be published at the following URL:

https://support.a10networks.com/



Vulnerability Details

The following table shares brief descriptions for the vulnerabilities addressed in this document.

CVE-2020-15778 ** DISPUTED ** scp in OpenSSH through 8.3p1 allows command injection in the scp.c toremote function, as demonstrated by backtick characters in the destination argument. NOTE: the vendor reportedly has stated that they intentionally omit validation of "anomalous argument transfers" because that could "stand a great chance of breaking existing workflows."

Related Links

 Ref #
 General Link

 [1]
 NIST NVD, CVE-2020-15778

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Acknowledgements

None

Modification History

Revision	Date	Description
1.0	2022-10-31	Initial Publication
2.0	2024-10-31	Update, scp CLI command will not accept back-ticks in scp parameters.

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