

Essential 8 and the software supply chain

Paul McCarty - Founder SecureStack paulm@securestack.com









SecureStack CEO

STARTUPS | DEVSECOPS | SNOWBOARDING















AUSTRALIAN



What does Essential 8 have going for it?

- Easy to understand
- Describes controls that can be used anywhere
- Good penetration into mainstream
- Multiple maturity levels





What does Essential 8 NOT do very well?

- Reads as an enterprise Windows & desktop framework
- Not very inclusive
- Seems genuinely ignorant of the rest of IT





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THE ESSENTIAL 8

Application Control

Patch Applications

Configure Microsoft Office Macro Setting

User Application Hardening

Restrict administrative

privileges

Patch Operating Systems

Multi-factor authentication

Regular Backups





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APPLICATION CONTROL





Control what binaries are allowed to run on Windows Desktop

Define what applications can run in the users browser via CSP, SRI, etc





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PATCH APPLICATIONS





Make sure that desktop applications are up to date

Make sure that all application components are up to date & all CI/CD envs are up to date





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CONFIGURE MICROSOFT OFFICE MACRO SETTING





Disable Microsoft Office macros

Yeah, naw.





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USER APPLICATION HARDENING





Stop using browser technology from 2004

Encryption, TLS 1.3, HSTS, client side hardening, CSP, WAF, CDN, secure frameworks







RESTRICT ADMINISTRATIVE PRIVILEGES





Don't use admin, don't run apps as admin

Separate dev, staging, prod. Least permissions for CI/CD and app, no IAM *.*





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PATCH OPERATING SYSTEMS





Patch the Windows OS

Scan for out of date packages. Current container images, CI/CD environments, don't use pinned versions





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MFA





Users use MFA to log into apps, SaaS tools

Same same





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REGULAR BACKUPS





Backups of important data, software, creds, and configurations stored centrally

Backups of all source code, creds, configurations stored centrally





https://github.com/SecureStackCo/Essential8-SDLC

Essential 8 mapping to ISM mapped to SDLC

Mitigation Strategy	Maturity Level Two	Maturity Level Three	SDLC
Application control	0843, 1490, 1657, 1660, 1661	0843, 1490, 1656, 1657, 1658, 1544, 1659, 1582, 1660, 1661, 1662, 1663	1536, 1757
Patch applications	1690, 1691, 1693, 1698, 1699, 1700, 1704	1690, 1691, 1692, 1693, 1698, 1699, 1700, 1704, 0304	0380, 0402, 0938, 1467, 1483, 1754





Paul McCarty

y @eastsidemccarty

paulm@securestack.com



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Australian Signals Directorate

ACSC Australian **Cyber Security** Centre





