

The Impact of Known Vulnerabilities on Layered Solutions (Work in Progress)

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Research Question

To gauge the assurance of a hypothetical layered security solution consisting of two redundant mechanisms, can well, through observation and analysis of published vulnerabilities for these two mechanisms, identify windows of opportunity where the solution as a whole could have feasibly been compromised?

Approach

- Identify two security products to represent a CSfC (Commercial Solutions for Classified) style layered solution
- Collect data for all published vulnerabilities for these products
- Record the publish dates of vulnerabilities which represent a complete compromise of the product
- Record the date these vulnerabilities were patched
- Measure how often both products within the solution have open vulnerabilities at the same time
- Build a tool to automate this process as efficiently as possible

