



Course material

Course:

Understanding the digital supply chain and its stakes for humanitarian actors

Video:

1.2.1 The Software Supply Chain

Concepts (extracted from automatically generated subtitles):

Software supply chain attacks. Overview of the software supply chain. Different components. Source code. Secure software development operations. Key challenges of software. Supply chain of software. Software supply chain consisting of the company. Day-to-day life of individuals. Big picture. Valuable information. Diverse stakeholders. Case studies. Module. Companies.



[to video sequence search](#)

(within Understanding the digital supply chain and its stakes for humanitarian actors.)



[to video](#)

Center for Digital Education. More educational support material here:

<https://www.epfl.ch/education/educational-initiatives/cede/educational-technologies-gallery/boocs-en/>
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THE HARDWARE AND SOFTWARE SUPPLY CHAINS

The Software Supply Chain

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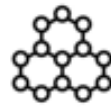
notes

summary

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Introduction to the Software Supply Chain



Overview of the Supply Chain



Introduce the different components



Case studies

Welcome to the module on software supply chain attacks. After highlighting the big picture, we will dive into an overview of the software supply chain,

notes

summary

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Software Supply Chain Attacks can:



Disrupt Services



Disrupt Functionalities



Expose Data

introduce the different components to highlight secure software development operations or DevSecOps, followed by some case studies. Software supply chain attacks can severely impact

notes

summary

0m 13s



Software Supply Chain Attacks can:



Disrupt Services



Disrupt Functionalities



Expose Data

the day-to-day life of individuals and companies by disrupting services, functionalities, and allowing attackers to steal data in attacks. The supply chain of software is incredibly complex with many moving parts.

notes

summary

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Key Challenges



- **Massive Complexity**
- **Fast pace of development**

The two key challenges of software are the massive complexity and the incredibly fast pace of development where software can be quickly updated but may even more quickly be obsolete or out of date.

notes

summary

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Key Challenges



Stakeholders

Companies, manufacturers, vendors
and open-source developers.

There are diverse stakeholders along the software supply chain consisting of the company itself, manufacturers that provide source code or binary only modules,

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summary

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Is Software Eating the World?



vendors selling software, and even open source developers that offer their software without cost. Software is eating the world and leapfrogs processes,

notes

summary

1m 1s



Is Software Eating the World?



but also exposes their users to threats and attacks. Vulnerabilities in software allow attackers to gain unintended access to data and processes, thereby exposing secrets

notes

summary

1m 13s



Image reference



In order of apperance

PICTURE1 : Supply Chain concept by tppapatt from Adobe Stock

PICTURE2 : Smartphone components isolate on white by poravute from Adobe Stock

PICTURE3 : System software update, data upgrade or synchronize with progress bar by SMUX from Adobe Stock

allowing attackers to steal valuable information or even valuable items. To protect the software supply chain, we must integrate security into all steps of the complex chain and educate all stakeholders.

notes

summary

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