Lehrstuhl für Sicherheit in der Informatik
Prof. Dr. Claudia Eckert

Announcement: Student job/internship in cooperation with Fraunhofer AISEC, Garching

Security of Video Game Consoles

Motivation and Task Description

Current-gen video gaming consoles are shipped with several protection measures included. For security research, this offers the possibility to study state-of-the-art embedded security with relevant consumer electronics devices at hand.

The focus of the work is the analysis of the security of **one** of the following consoles:

- Nintendo Switch

- Microsoft XBox One

- Sony PlayStation 4

For this, the architecture of the console including the implemented security measures is documented. Known attack vectors are researched and classified with the goal of reproducing them. Also, concepts for new attack vectors can be developed and implemented. Security tests are developed and executed on the console hardware.

Requirements

- Knowledge on hardware/software architecture, programming, and IT security
- Experience in working with embedded hardware
- Knowledge/experience on reverse engineering and penetration testing is beneficial

Contact

Please apply to all contacts listed below. Make sure to include your CV and a current grade report in your email.

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