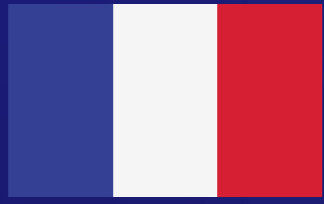




CERBERUS

Child Exploitation Response by Beating Encryption and Research to Unprotect Systems



Forensic Laboratory of the French Gendarmerie (IRCGN)



Netherlands Forensic Institute (NFI)



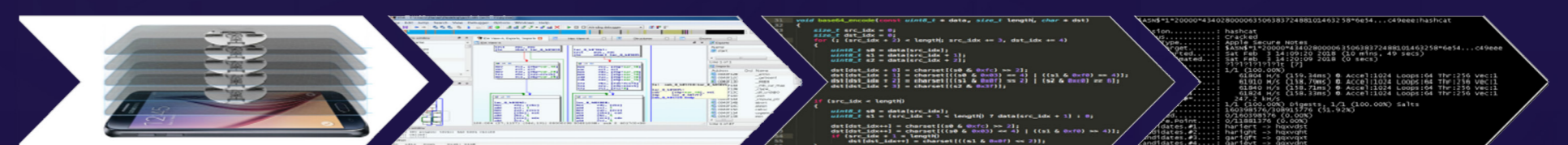
University College Dublin (UCD)



CHAIN OF TRUST

Data processing has become a real challenge for investigators since electronic devices are almost systematically encrypted. These encrypted devices are widely used especially by anarchists, child abusers, drug dealers and terrorists.

The CERBERUS project aims at handling the complete security chain, starting from the hardware layer, to the system layer, all the way to the application layer. Password cracking becomes feasible only once the multiple cryptographic steps have been identified and understood.



PASSWORD CRACKING PLATFORM

Creation of a password cracking platform that may be used by any EU LEA for any case.

Serving as a first layer of decryption, it is a complementary solution to EC3's own infrastructure.

This platform is guaranteed to function on the long run.

Due to the fast-paced evolution of encryption and decryption technologies, this topic will always be an important matter. The platform will thus need to keep evolving with the new technologies and IRCGN will keep working on R&D over time.

It will allow investigators to crack passwords used by criminals to protect their data (child pornographic content, banking transactions, etc.) or their communications. Judges will have the capacity to prosecute offenders more effectively by having all evidence at their disposal; evidence that were until then hidden due to strong passwords.



DELIVERABLES & SYNERGIES

- R&D on hardware solutions to extend password cracking capabilities.
- Smart dictionaries and rules generation.
- Fundamental research on deleted or temporary contents of social messaging services.
- Regular workshops and conferences with other LEA. These events aim at sharing knowledge and working together on common issues.



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