Encryption challenges in the French and European regulatory space

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Overview

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Encryption: a maturing debate in France and in the European Union

Use case: overview of the French legal framework

- A very short history
- State of play

Encryption: a maturing debate

Code ←→ Language ←→ Mystery

Back to cyphers and code breaking : Lockpicking is a matter of time

A change of scale with the democratisation of the Internet

- →Big data and real time analysis: the fear of surveillance
- → Social acceptability of new and emerging technologies

Encryption: a maturing debate

A **growing concern** for security and the loss of privacy on the Internet

From freedom of speech, to data protection and freedom of assembly -> Effective implementation of fundamental rights and freedoms

Encryption as a key tool for security and promoting fundamental rights but also perceived as an obstacle to law enforcement

- A mistrust towards encryption
 - Considered a weapon of war → diplomatic and military use
 - Drastic control
- A prior authorisation system
- Encryption key length limitation: 40-bits, 128-bits
- Cumbersome procedure and complex legal regime

En 1939, décret pris en application de l'article 1^{er} du décret du 18 avril 1939 fixant le régime des matériels de guerre, armes et munitions

Les « machines cryptographiques » sont classées aux côtés des dispositifs de visée, de conduite de tir ou de détection dans les matériels de guerre en 1^{re} catégorie comptant également les « Fusils, mousquetons, carabines de tous calibres conçus pour l'usage militaire »

- increased competition and technological advancement A gradual easing with the development of the Internet
- Loi 10 juillet 1991 relative au secret des correspondances émises par voie de télécommunications > Principle of the secrecy of correspondence

- A need to protect electronic communication in a globalisation context
- A number of laws: 26 July 1996, 15 November 2001 and then 21 june 2004
- A new chapter of the crypto wars?

Article 30 of the law establishes freedom of use of encryption means in France

A declaration or an authorisation process are still required for supplying, importing and exporting cryptology equipment and services

→ The French cybersecurity agency ANSSI is in charge of evaluating requests

Law n° 2004-575 of 21 June 2004 on confidence in the digital economy.

Title III on Safety in the digital economy – Chapter 1 – Cryptology methods (articles 29 to 40)

Decree N° 2007-663, provide a list of encryption means eligibility to declaration and authorisation exceptions (Annex I and II)

ANSSI is in charge of prevention, defence and awareness-raising

The OCLCTIC, the French Central Cybercrime Prevention Office is in responsible for cybercrime prevention Law n° 2004-575 of 21 June 2004 on confidence in the digital economy

Title III on Safety in the digital economy – Chapter 1 – Cryptology methods (articles 29 to 40)

Use of encryption seen as an aggravating circumstance

Article 32 GDPR on Security of processing: state of the art e.g. as appropriate pseudonymisation and encryption of personal data

Article 434-15-2 Code pénal: obligation to comply with the legal requirements associated with encryption

Lifting of confidentiality

→ Article 230-1 Code de procédure pénale

Obligation to cooperate

→ Article L. 871-1 Code de la sécurité intérieure

- -Case Law: French Constitutional Court's decision in 2018, no 2018-696 QPC
- -Backdoors are just another security breach
- -The abuses of the few should not be blamed on everyone <-> search for balance
- -Key need to build trust and protect the confidentiality of electronic communications

Merci!

Internet made in France

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