

De Cifris Schola Latina Schola Latina

DIPARTIMENTO DI INFORMATICA











Wednesday 13th April 2022 – at 15.00 Conference

Marco Cesati

Università di Roma Tor Vergata

A new idea for RSA backdoors

Abstract: We present a new method to inject backdoors in RSA and other cryptographic primitives based on the Integer Factorization problem for balanced semi-primes. The method relies on mathematical congruences among the factors of the semi-primes modulo a large prime number, which acts as a "designer key" or "escrow key". In particular, two different backdoors are proposed, one targeting a single semi-prime and the other one a pair of vulnerable semi-primes.

Dipartimento di Matematica e Fisica - Università Roma Tre Aula 311 - Edificio C - Largo San Leonardo Murialdo 1 https://bit.ly/3wViuZK

Contact person: Marco Pedicini

CONTATTI

Iniziativa De Componendis Cifris

seminari@decifris.it seareteria@decifris.it