

Title (en)  
HARDWARE AUTHENTICATION TOKEN WITH REMOTE VALIDATION

Title (de)  
HARDWARE-AUTHENTIFIZIERUNGSTOKEN MIT FERNVALIDIERUNG

Title (fr)  
JETON MATÉRIEL D'AUTHENTIFICATION À VALIDATION DÉPORTÉE

Publication  
**EP 3959629 A1 20220302 (FR)**

Application  
**EP 20731904 A 20200424**

Priority  
• FR 1904394 A 20190425  
• FR 2020050702 W 20200424

Abstract (en)  
[origin: WO2020217030A1] The present invention relates to a hardware authentication token intended for being connected to a computer terminal. This token comprises a confirmation button, a processor and a secure memory area where a first private key is stored. The terminal can ask the user to authenticate using the token by transmitting a first nonce to the user. After the confirmation button has been pressed, the token generates a second nonce, encodes it using ultrasonic signals and transmits it, via an acoustic channel, to the user's smartphone. The token determines from the response whether the second nonce has been signed with a second private key belonging to the user and, if so, returns the first nonce encrypted by the first private key to the computer terminal in order to authenticate the user.

IPC 8 full level  
**G06F 21/34** (2013.01)

CPC (source: EP KR US)  
**G06F 21/34** (2013.01 - EP KR US); **G06F 21/602** (2013.01 - KR); **G06F 21/64** (2013.01 - KR); **H04L 9/30** (2013.01 - KR); **H04L 63/0853** (2013.01 - US); **H04L 9/0825** (2013.01 - US)

Citation (search report)  
See references of WO 2020217030A1

Designated contracting state (EPC)  
AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)  
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DOCDB simple family (publication)  
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