

Malware Developing Guide: Encryption and Decryption

Jutiphat Chatsomsanga, Chawalit Benjangkaprasert

Department of Computer Engineering, School of Engineering
King Mongkut's Institute of Technology Ladkrabang, Bangkok, Thailand.
62601049@kmitl.ac.th, chawalit.be@kmitl.ac.th

Abstract— This research aims to understand malware from malware author's view. Starting from Ransomware, we attempt to develop ransomware written in python and encrypt all files in Windows platform without doing harm to crucial system files. In this research we use Asus K550J laptop with Windows 10 education (Build 19042) as a victim machine. We ran encryption and decryption program with different privilege and observe the results as well as time takes to encrypt and decrypt files. Results show that encryption process is much slower than decryption process and both encryption and decryption work slower in the bigger file size.

Keyword— Malware, Ransomware, Python, Encryption, Windows



Jutiphat Chatsomsanga received his B.Eng. in information engineering from King Mongkut's Institute of Technology Ladkrabang, Bangkok, Thailand in 1990. He is now studying master's degree in information engineering. His current research interests are in Cryptography, Information security and malware.



Chawalit BENJANGKAPRASERT received his M.Eng. degree from King Mongkut's Institute of Technology Ladkrabang, Bangkok, Thailand in 1990. In 2006, he received Doctor degree in engineering from Tokai University, Japan. He is currently an associate professor in Department of Computer Engineering, School of Engineering, King Mongkut's Institute of Technology Ladkrabang. His current research interests are in signal processing, wireless communication system, antenna design and machine learning.