

Interoperability and Security Management for Complex Systems

Costel CIUCHI, Cătălina GHERGHINA, Gabriel PETRICĂ

Secretariatul General al Guvernului, București, România; Vodafone România, București;
Laboratorul EUROQUALROM, Facultatea de Electronică, Telecomunicații și Tehnologie
Informației, Universitatea POLITEHNICA din București, România
costel.ciuchi@gmail.com, katalina.gherghina@gmail.com, gabriel.petrica@upb.ro

Abstract

The need to exchange data among organizations entails opening communications to ensure controlled access to internal resources of an entity. The adoption of interoperability standards coupled with complex analysis of safety and of modes of data access / transfer is an important component of information management strategy within an organization. The diversity of working technologies (proprietary, open source) requires the development of punctual analyses for each flow involving interchange of data and specific measures. The new security context in the online environment implies a punctual approach of complex systems in the information technology area. High frequency of incidents and the importance / criticality of data that are subject to cyber-attacks require a substantial change in the use and management for the component of interoperability of services and systems. Ensuring data and information protection, sharing necessary information to other entities - organizations require development (even from the design phase) of some evaluation components, of some resilience and survival skills in various critical situations (natural disasters, cyber-attacks).

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