

Introduction and Scope

The PICASSO project organised a participatory webinar on **"Standardization and its impact on EU-US ICT collaboration"**.

With this webinar, PICASSO brought forward policy recommendations designed to improve EU/US ICT-orientated collaborations – specifically in the technological domains associated with 5G networks, Big Data, and IoT/CPS. The focus was on the implications of fragmentation of standard setting processes around the three technological domains, taking into account the different approaches towards interoperability and standardization being taken in the USA and in Europe and the risks likely to affect the global market opportunities for ICTs in the two different regional landscapes.

Background Notes

The participatory and interactive webinar intended to validate initial conclusions based on a Policy Brief on Standardization and its impact on EU/US ICT Policy collaboration prepared by the [PICASSO ICT Policy Expert Group](#). Following the webinar the Policy Briefing was updated with content stemming from the webinar discussions and the final version can be found [here](#).

Agenda

PICASSO Welcome and purpose of the call

Maarten Botterman, PICASSO Policy Expert Group Chairman

Introduction to EU-US Standardization policy issues relating to ICT development

Dr. David Farber, Carnegie Mellon University, IEEE fellow, ACM fellow

Keynote speeches

Olaf Kolkman, ISOC Chief Internet Technology Officer

Chris Greer, Senior Executive, NIST

Introducing the three domains - 5G, Big Data, IoT/CPS

Yaning Zou, PICASSO 5G Networks Expert Group Manager

Prof. Ray Walshe, Member of PICASSO Big Data Expert Group

Christian Sonntag, PICASSO IoT/CPS Expert Group Manager

Introduction and Participatory discussion:

Focus per domain on cybersecurity issues and its affections to EU-US collaboration

Organizing Committee

Policy Expert Group Chair: *Maarten Botterman*, GNKS Consult, The Netherlands

Policy Expert Group Member: *Jonathan Cave*, Warwick University, United Kingdom

Marta Calderaro, APRE, Italy

Margot Bezzi, APRE, Italy

Topic leads

5G Networks:

Yaning Zou, Technische Universität Dresden, Germany

Big Data:

Ray Walshe, Dublin City University, Ireland

IoT/CPS:

Christian Sonntag, Technische Universität Dortmund, Germany

Technicalities

Webinar Date: 29th September 2017

Duration: approx. 90 minutes

Participation: Free of Charge

Technical System: Adobe Connect

Recording, Presentations and Policy Brief at:

www.picasso-project.eu

Webinar

Results

ICT is deeply affecting everything we do. The challenge for ICT standards is that they can hardly be narrowly defined as they need to relate to domain specific requirements with regards to e.g. security, privacy, performance. Participants appreciated the explanation of Jonathan Cave that highlighted the trade-offs and drivers.

Olaf Kolkman, Chief Internet Technology Officer at ISOC, pointed at the European Rolling Plan which is developed by the EU MSP on ICT Standardisation as an example of a multi-annual overview of the needs for preliminary or complementary ICT standardization activities in support of the EU policy activities, as a demonstration that “standards matter” also for how technology based on it works out in society.

Chris Greer, NIST Senior Executive for Grids, explained that standardization as such could freeze out innovation, in particular in ICT areas that relate to many different sectors. In the NIST community, the principle of Pivotal Points of Interoperability is developed to find consensus on standardized interfaces that deal with composition of CPS without constraining innovation.

This was followed by short interventions by the PICASSO Expert group representatives on what standardization means for their domain:

- With regards to **5G networks**, the target is to submit initial technology submission to ITU-R WP5D meeting #32, June 2019 and detailed specification submission to ITU-R WP5D meeting #36, October 2020. Whereas in the past, only telecom companies set the standard, the IP base and network virtualization technology now also requires internet based standards prepared in IETF context.
- With regards to **Big Data**, standardisation aims to provide a common terminology, recommendations and requirements for data collection, visualization, analysis and storage. From several viewpoints standardisation is already happening, but a unified evaluation standard or benchmarks to balance the computing efficiency of Big Data with rigorous mathematical methods does not exist, yet.
- With regards to **Cyber Physical Systems** and **Internet of Things**, interoperability is a key challenge in the IoT and CPS domains. Standardisation is an important building block to achieve interoperability. Joint work on international standards and interoperability may be more feasible than close-to-market collaboration since it usually requires companies to release less sensitive IPR).

Main Conclusions

Standards are in many ways rapidly becoming “guidelines of good practice” rather than “strict rules to adhere to”. We concluded that for EU/US collaboration it mostly makes sense to stimulate participation of sponsored research and innovation in global standardisation platforms, such as IETF, ITU, IEEE etc., rather than at regional level. Furthermore, standards should aim at setting a minimal responsible level, and not less than that. This is because every application of standards in ICT will also need to adapt to the specific requirements of that application in its specific context.

43 Registered Participants from all over the world

