



Crowncom 2012

The 7th International ICST Conference on
Cognitive Radio Oriented Wireless Networks and Communications
18th – 20th June 2012 - Stockholm, Sweden

Call for papers

Crowncom is a prime event on Cognitive Radio and the 2012 edition will be hosted in the Scandinavian pearl of Stockholm, Sweden. The program will feature several Keynote speeches, special sessions, workshops and interesting social events.



Scope

Cognitive radio provides a flexible platform that enables the design of systems using the spectrum in radically new ways. How to harness the power the cognition offers, is still an open problem. New schemes for spectrum utilization have to be power efficient, be applicable in a large scale networks, and be able to co-exist with legacy systems. Regulatory rules and conformance test procedures need to be defined to assure the protection of the legacy systems. In order to make the cognitive radio a success story also the market mechanisms and value chains need to be defined. Spectrum trading and dynamic access schemes should encourage efficient usage of the spectrum and collaboration among the stakeholders. This conference provides a venue for researchers to propose new solutions to the technical, regulatory and techno-economical problems related to the cognitive radios.

Track 1 – How to efficiently implement cognitive radio?

- Flexible PHY solutions
- Wideband, cooperative, compressed, and multi-antenna spectrum sensing
- Primary secondary co-operation, overlay and underlay methods, interference alignment
- Hardware implementation issues, testbeds and demonstrators

Track 2 – How to efficiently to utilize a cognitive radio?

- Multiple access control and QoS provisioning
- Geo-location data base solutions, combined geo-location and sensing
- Inter-system interference modeling and coordination, co-existence solutions
- Self-organization
- Radio resource management & network optimization
- Performance evaluation and capacity assessment

Track 3 – How to regulate the use of cognitive radio?

- Spectrum etiquettes for unlicensed bands
- Primary system and secondary system co-existence policies
- Software regulation/ standardization and equipment certification
- Defining and enforcing spectrum licenses and easements
- Industrial and government roles dynamic spectrum access

Track 4 – How to make business with cognitive radio?

- Business models, pricing issues, value chains in dynamic spectrum access
- Market trends and market mechanisms for secondary spectrum usage
- Dynamic spectrum auctions and spectrum trading
- Business opportunity assessment of dynamic spectrum access

Paper submissions

All accepted and presented papers will be included in the Crowncom 2012 Conference Proceedings, application for IEEE Xplore publication in process (Crowncom 2006-2011 have been included in IEEE Xplore. Please refer to the conference website for updated information). Proceedings published with IEEE are submitted for inclusion to EI Engineering Index (Compendex), Google Scholar, ISI Proceedings. All further information including submission guidelines can be found at: www.crowncom.org

Important dates

Paper submission due: 16th January, 2012
Acceptance notifications: 27th February, 2012
Camera-ready submissions: 23rd March, 2012

