

HYCON2 Workshop on Energy: closing remarks and discussion

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Brussels; September 3, 2012

- **ICT as infrastructure, control as the “smarts”**

- Control should leverage ICT advances: 4G LTE, cloud, multicore, . . .

- **Embracing complexity with control: large-scale, networked, stochastic systems, with dynamics and feedback**

- Control challenges motivated by ICT: e.g., algorithms for synchronization and coordination of large-scale complex systems

- **New horizons for control research: dynamic markets, human-in-the-loop systems**

- Targeting critical complex systems: smart grids, process industries, transportation, cities and infrastructures, . . .

- From control performance to societal benefit: fuel efficiency, renewables penetration, sustainability, transportation safety, . . .

- Beyond simulations: test beds for validating our research

- Enhancements to established, successful techniques: model-predictive control

- Frameworks of new and renewed interest: energy-based descriptions, game theory, consensus algorithms