

IEEE CSS Technical Committee Hybrid Systems

Meeting at the 2017 American Control Conference

Ricardo Sanfelice

Department of Computer Engineering
Hybrid Systems Laboratory
University of California, Santa Cruz



Agenda

1. Introduction
2. Membership information
3. TC Webpage
4. TC Projects/Activities
 - ▶ Update on recent TC report
 - ▶ Update on CSM column about TC activities
 - ▶ Update on TC Newsletter
 - ▶ Focused research meeting at “research station”
with [M. Prandini](#), [R. Jungers](#), and [M. Zamani](#)
 - ▶ Update on hybrid systems entry at Wikipedia.org
[update for Alessandro Abate](#)
 - ▶ Discussion on changing TC name
 - ▶ Discussion on book/collection/special issue project

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- ▶ The TC is part of the organization of the invited sessions:
 - ▶ “Recent Advances in Stability and Control of Hybrid Systems” at the IFAC NOLCOS Conference in August 2016
 - ▶ One session on variational analysis and three sessions on event-triggered control at the IEEE CDC in December 2016
- ▶ This is our first TC meeting this year.

TC Google Group

- ▶ TC Webpage

<http://hybrid-systems.ieeecss.org>

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- ▶ **NEW** Quarterly newsletter

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- ▶ **We need a mechanism to report activities**

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**At the 2016 CDC TC meeting we decided to work towards
a proposal for a Dagstuhl seminar**

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 - ▶ Techniques for the synthesis of algorithms should incorporate **information about the computations required to be performed when implemented**, and **quantify the degradation of performance** while guaranteeing certain fundamental properties.

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 - ▶ Techniques for the synthesis of algorithms should incorporate **information about the computations required to be performed when implemented**, and **quantify the degradation of performance** while guaranteeing certain fundamental properties.
 - ▶ The development of such synthesis techniques requires a radical change in the way algorithms for cyber-physical systems are designed.

TC Activity: “Hybrid System” Wikipedia.org entry

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- ▶ **NEW:** Joint TC effort to update the entry
(lead by Alessandro Abate)

1. Overview
2. Modeling Frameworks
3. Analysis Tools
4. Simulation tools
5. Further reading
6. References

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- ▶ What are the advantages and disadvantages of changing the name to

IEEE CSS TC on Hybrid and Cyber-Physical Systems

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Thank you for your support and participation!