Formal Verification of Cyber Physical Systems - A Survey

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Abstract

Cyber physical systems (CPS) areubiquitous in various safety and mission critical domains including medical devices, avionics and autonomous driving systems. The verification of CPS is a challenging task due to the involvement of interlinked continuous and discrete dynamics. In this presentation, we will provide an overview of the verification different aspects of CPS using different formal verification techniques including model checking, automated and interactive theorem proving.

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