AN INTEGRATED APPROACH FOR MODELLING MECHATRONIC SYSTEMS

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Abstract: The chapter addresses the issues of modeling and simulation for a mechatronic system. The integration process in mechatronic systems creates high dependencies between all the components. When such a system is design the approach used must takes into account all the system components. Because of the complexity of the real systems the traditional modeling approach using classical methods can be a very hard task. The paper presents an integrated mechatronic environment for modeling and simulation. This method is applied for two mechatronic systems which consist of two planar micro parallel robots with two degrees of freedom (DOF).

Key words: mechatronic, parallel robot, integration, virtual prototype, simulation

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