FMI Toolbox for MATLAB®/Simulink enables easy to use integration of physical models developed in state of the art modeling tools in the MATLAB®/Simulink environment. The toolbox relies on the open FMI standard and is ideal for control systems development.

High-fidelity physical models are key components in development of control systems and contribute to increased quality and shorter development cycles. Modeling languages such as Modelica are commonly used to develop accurate simulation models of systems in a wide range of domains, including mechanics, electronics, and thermodynamics.

The toolbox links state-of-the-art FMI compliant tools, including AMESim, Dymola and SimulationX to the MATLAB®/Simulink environment. Support for the FMI standard ensures flexibility and cross-platform interoperability.

The Toolbox enables simulation of FMUs as part of Simulink models and in MATLAB scripts. In addition, Simulink models can be exported into Model Exchange or Co-simulation FMUs. Hardware In the Loop (HIL) simulation is supported on dSPACE DS1006 systems.

**THE FUNCTIONAL MOCK-UP INTERFACE**

The Functional Mock-up Interface (FMI) is an open standard for exchange of dynamic models, targeting tool interoperability and model reuse. FMI compliant models (Functional Mock-up Units (FMUs)), are self-contained compiled models which can be integrated in a wide range of applications where dynamic models are needed. Modeling IP is protected since only compiled code and interface definitions are distributed in FMUs. FMI technology is adopted by more than 60 open source and commercial tools enabling easy exchange of compiled models.

For more information see: [www.fmi-standard.org](http://www.fmi-standard.org)