Schaeffler approves SimulationX as the number one tool for modeling and calculating dynamic systems

The Schaeffler Group with its brands INA, FAG and LuK is a leading manufacturer of rolling bearings and linear products as well as a renowned supplier to the automotive industry of high-precision products and systems for engines, transmissions and chassis applications.

The group of companies stands for exceptional customer focus, innovative ability and the highest possible level of quality. Approximately 61,000 employees at over 180 locations in more than 50 countries worldwide generated sales of 7.3 billion euros in 2009. This makes the Schaeffler Group one of the largest German and European industrial companies in family ownership.

Challenge
Modeling Dynamic Systems
Placing high demands on the performance and lifecycle of their components and proving proper functionality to OEMs, drive components and electromechanical-hydraulic interactions in valves have to be calculated and modeled. Also, component models are transferred to OEMs in order to be integrated in the overall system model.

Solution
SimulationX Professional Edition
SimulationX is used for the virtual development of rolling bearings, linear systems, synchronizer components and further components for engines, transmissions, and drive trains. Via an interface, SimulationX is coupled to Schaefflers’ own tools for bearing calculation and simulation whilst engineers use SimulationX for dynamic and FEM calculations.

Benefits
Highest Quality Assurance
The multi-domain functionality of SimulationX facilitates the modeling of complex, dynamic mechatronics systems. Thanks to the intuitive, user-friendly graphical user interface and the powerful libraries, Schaeffler engineers design automotive components that meet and, moreover, exceed their customers’ expectations in terms of NVH, lifecycle, performance, and quality.