



The Formula SAE [FSAE] Senior Design Team has chosen to participate in the 2009 FSAE Michigan Competition [FSAEM]. This international competition challenges undergraduate students to act as design consultants in the development of a prototype vehicle for a limited production run of a one-off open wheel Formula style racecar. The intended market is the non-professional weekend autocross racer. The vehicle will be evaluated at competition for its commercial potential, which includes all aspects of automotive engineering: design, manufacturing, testing, developing, marketing, management and finances. This project will detail the management process of the FSAE vehicle development.

The requirements of the Society of Automotive Engineers [SAE] are such that promotes safety of the vehicle and of the driver and students. Stevens Institute of Technology, as a major stakeholder in the success of the vehicle has provided significant financing and intends to use the project to further the education of its undergraduates and to show the capabilities of a Stevens education to prospective students.

The development process consists of many steps that will need to be successfully and accurately planned and controlled in order to achieve the customer requirements. Most will need to be completed concurrently to achieve the agreed delivery date of May 13, 2009. They include research, design, documentation, marketing, securing funding, part and tool procurement, fabrication, assembly, testing and delivery to competition in Michigan. These processes have been planned, implemented and controlled using this management process.

The FSAE Senior Design Team has worked closely with the FSAE Club at Stevens, a Registered Student Organization [RSO]. Together, the club and the team have successfully completed the development processes necessary in prototyping a suitable vehicle for the 2009 FSAEM Competition.

With the successful completion of the 2009 vehicle, it is the Teams hope that a more permanent FSAE Club be established at Stevens Institute of Technology. This project is intended to assist all future FSAE teams at Stevens with their development and management process.