

Why Do Engineers at Top Performing Companies Use Simulation?

Best practices get best results. If you want to be a top-performing company, you need to meet your cost targets while staying under your budget and ahead of your deadlines. But how do you do that in a world where your designs have to go from the engineers to the analysts and back again before you can even prototype? By empowering your design engineers to use simulation.

Simulation applications like SOFTWARE allow your design engineers to analyze and validate the performance of 3D models before you build a physical prototype. Simulation allows you to build half as many prototypes and shrinks your time-to-market and rework by a third. If your engineers used simulation to work smarter and faster, what impact would that have on your bottom line?

An engineer can do basic simulation at any point in his or her design process. But the companies that get the best results from simulation start using it in the concept phase and continue to use it often throughout their design cycle. This lets engineers keep real-world performance in mind and optimize for cost and quality, while still allowing them to innovate.

A recent report from the Aberdeen group shows that [best-in-class manufacturers gain a competitive advantage by using simulation technology](#). According to Aberdeen's research, best-in-class small and medium firms are:

- 21% more likely to use simulation for informing trade-off decisions when determining optimal system architectures.
- 55% more likely to use simulation tools that look at product behavior at a system level, which offers better visibility into how the components will interact with each other.
- 42% more likely to evaluate multiple physical forces simultaneously.

If you're ready for your engineers to start using simulation, what is the best way to do that? We've created an infographic about the top five best practices for empowering design engineers with simulation.

Your first step is to establish management support. When you can show your managers the benefits of simulation to your company as well as to your customers, you shouldn't have any problem getting them onboard.

Want to see the rest of our tips? Download the [Top 5 Best Practices for Empowering Design Engineers with Simulation](#). And share it with your colleagues. When they find out how much time and rework they can save by using simulation, you'll be the office hero.