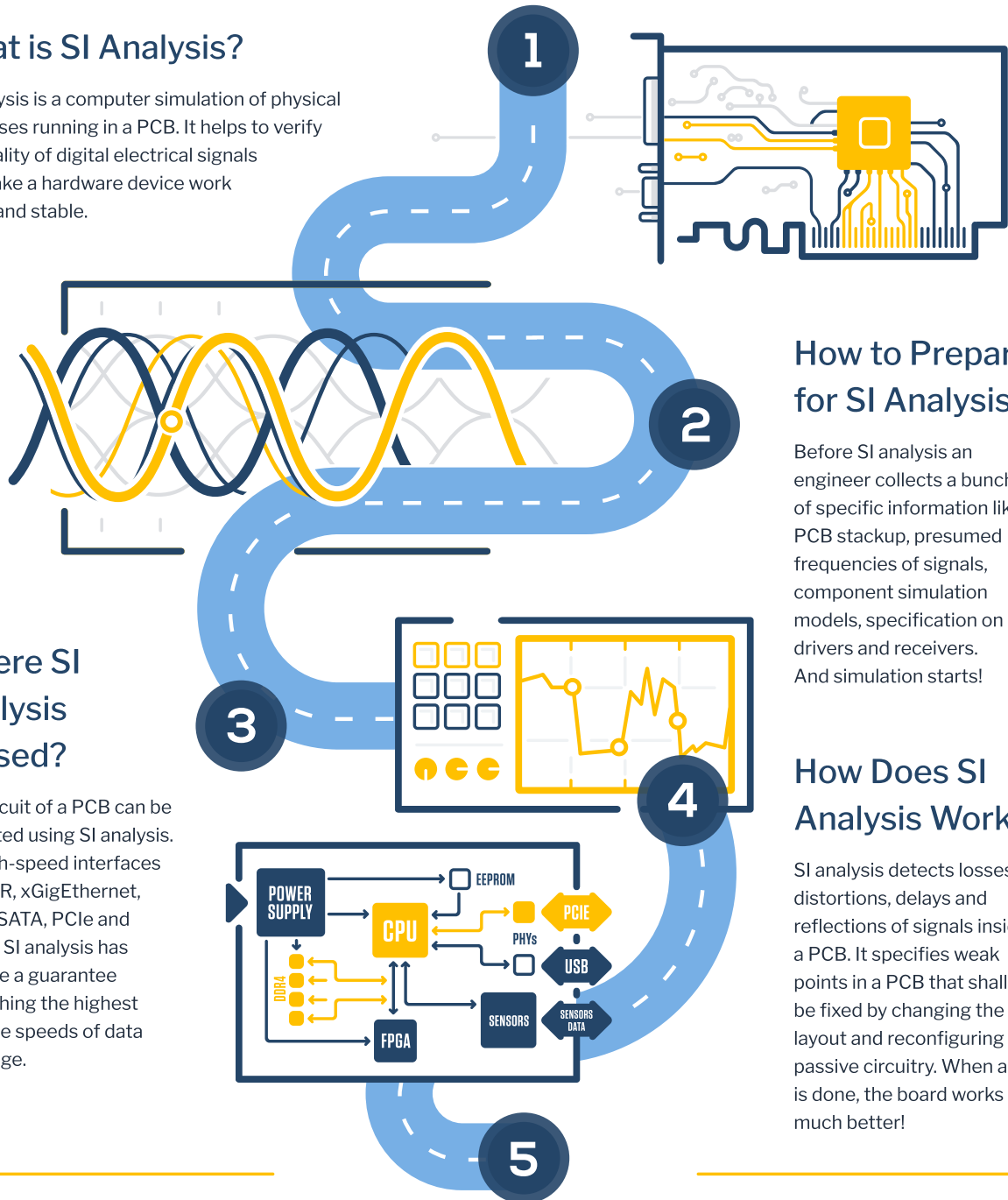


SI ANALYSIS



What is SI Analysis?

SI analysis is a computer simulation of physical processes running in a PCB. It helps to verify the quality of digital electrical signals and make a hardware device work faster and stable.



Where SI Analysis is Used?

Any circuit of a PCB can be simulated using SI analysis. For high-speed interfaces like DDR, xGigE ethernet, HDMI, SATA, PCIe and others, SI analysis has become a guarantee of reaching the highest possible speeds of data exchange.

How to Prepare for SI Analysis?

Before SI analysis an engineer collects a bunch of specific information like PCB stackup, presumed frequencies of signals, component simulation models, specification on drivers and receivers. And simulation starts!

How Does SI Analysis Work?

SI analysis detects losses, distortions, delays and reflections of signals inside a PCB. It specifies weak points in a PCB that shall be fixed by changing the layout and reconfiguring passive circuitry. When all is done, the board works much better!

What Benefits Does SI Analysis Bring?

SI analysis allows engineers to make electronic boards work more stable on higher frequencies. Managers like it because the number of prototyping cycles drops and products get faster to the market.

