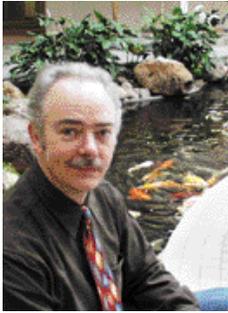


FROM THE EDITOR

A Tale of Two Giants...



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Once upon a time there were two electronic giants, struggling for dominance in the Valley of Silicon. They were unfriendly rivals; each making similar products, each holding on to an equal share of the marketplace, each “leapfrogging” the other with new designs. When Giant X introduced a new MP3 player, for example, Giant Y would soon introduce one with more features at a lower cost. And, because they used the same basic components, design methods, and manufacturing processes, they each remained “competitive,” but their profit margins were atrocious. The competition was fierce; life was uncertain; no one smiled.

Then one bright morning (after reading a particularly insightful editorial in the Xcell Journal), Giant X awoke from a vivid dream in which he saw the future. He thought “What if I could create new products that never had to be replaced? What if I could sell customized features, options, and complete new designs, and download them to my customers, anywhere in the world, over the Internet? That’s like manufacturing something once, but selling it many times over!” He knew it was the next “big thing.” He grinned a big toothy grin.

Giant X began designing all his new products using the latest programmable logic technology (from

Xilinx of course). The new FPGAs and CPLDs were amazing; they were dense, fast, inexpensive, and required little power; they were easy to use because the development tools were fast and efficient, and there was a lot of Intellectual Property (cores) available to make his life easy. Plus, with Xilinx technology, he could provide an Internet interface to all of his products and easily download almost any new design the market demanded. “Simply brilliant!” remarked the press. “Amazing!” remarked his customers. “Highly profitable!” said his shareholders. Everyone grinned big toothy grins, except Giant Y of course.

It wasn’t long before Giant Y’s market share began to nosedive. In a panic he worked night and day to keep up with the almost daily introduction of new products, features, and options from Giant X; but he could no longer compete using his old technology. Greatly embarrassed, Giant Y quietly packed his bags and left town; he was never heard from again.

The moral of this story is clear. Low-cost, high-performance programmable logic, reprogrammed remotely, is the obvious next step in the evolution of logic design—the advantages are overwhelming.

This issue of Xcell will show you some of our latest, low-cost, remotely-reprogrammable giant killers. **X**