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Est. 1988

Statement of Volatility
PN: PCIeAlteraCycloneIV

Manufacturer Part Number: PCIeAlteraCycloneIV, includes all types (-LVDS, 485, etc.)

Manufacturer Part Description: PCIe with user programmable FPGA, RS485 and LVDS options, TTL IO, PLL

Memory Type: FLASH, SRAM, FIFO

Memory Size: Tundra [IDT] Tsi384: Internal registers for configuration, FIFO memory to support link traffic. FIFO on PCIe lanes includes Four, 128-byte read completion buffers. FIFO on PCI(x) bus is a 4K byte read completion buffer.

Memory Size[FPGA's]: varies with installed FPGA. Xilinx [XCSLX100] and Altera[EP4CE115F29I8]

Volatility: Both FPGAôs: SRAM and FIFO memories cleared by power cycle. FLASH is retained through power cycle. FLASH is not accessible by user for writing or read-back. FLASH is used to reload FPGA at power-on. Tundra: FIFO memory is continuously rewritten during operation and effectively cleared by this process.

User Accessible: SRAM within FPGA is configured into registers etc. FPGA features are R/W [in many cases] to user software. SRAM contents are lost at power down and re-written with base design from FLASH upon power-on. Tundra: EEPROM can be used to store Bridge configuration values by the user. FIFO within Bridge is not user accessible in the traditional sense as the PCIe traffic is flowing through these memories without user control

Clearing Procedure: FPGAôs Power cycle or re-write data stored contents per approved procedure. SRAM model for internal and FIFO. Tundra: Use, and Power cycle for FIFO memory.

Notes or Warnings: None