

LVDS I/O IP High Frequency Transceiver

SILVACO

Overview

Silvaco's Low Voltage Differential Signaling (LVDS) IO library is a high-frequency interface that uses differential signals for data transmission. Typical LVDS I/O applications include displays, printers, and other high-speed data interfaces. This LVDS IP includes a transmitter, receiver, and a novel equalization design supporting programmable pre-emphasis at the transmitter. Operating at 1 GHz, this LVDS supports data transfers rates up to 2 Gbs. Including built-in termination resistors, DFT compliance, and robust ESD, this LVDS I/O delivers the most reliable performance and is silicon proven.

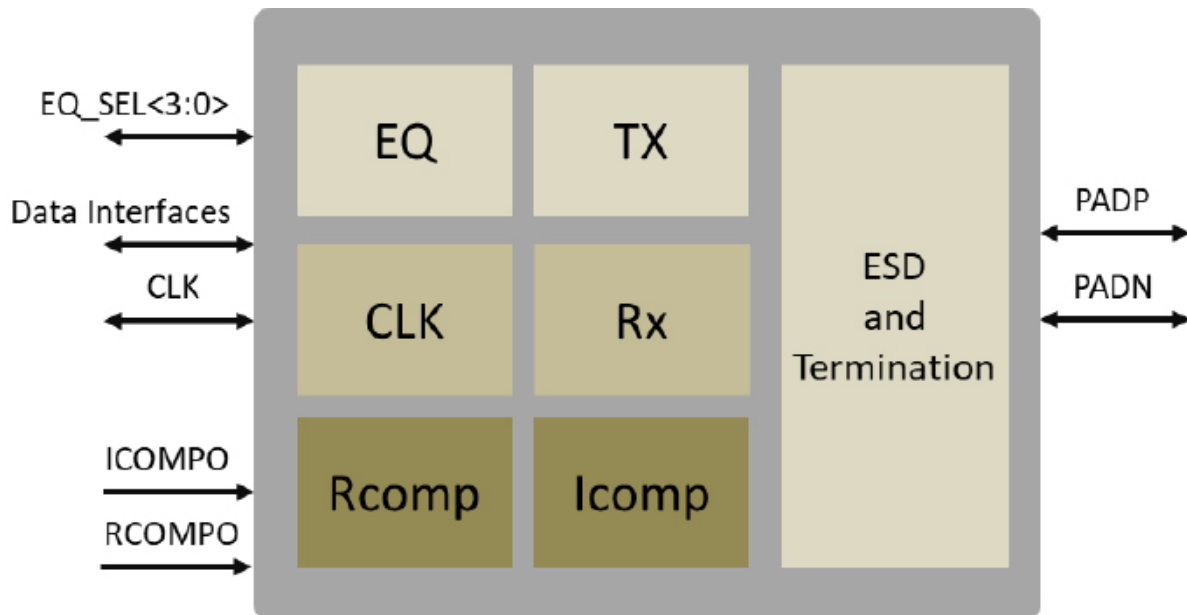
Highlights

- Up to 1 GHz operation (2 Gbs)
- Novel equalization with programmable emphasis
- Compensation block provides PVT-invariance
- Built-in termination resistors
- Common mode support of both RX and TX
- 2 KV HBM ESD compliance
- Operating temperature of -40°C to 125°C
- Silicon proven

Deliverables

- Models
- IBIS
- Timing
- LEF
- GDSII
- Datasheet

Block Diagram



Performance, area, and power specifications are available upon request.