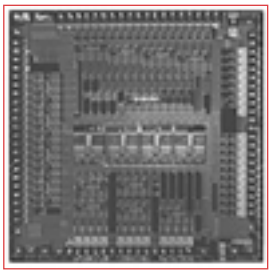
BROADCOM®

# BCM8112 PRODUCT Brief



# 16-BIT LVDS AND 64-BIT LVPECL INTERFACE

## BCM8112 FEATURES

- **64:16 MUX with single-ended LVPECL 155.52/166.65-Mbps data inputs and LVDS 622.08/644.45-Mbps differential data outputs**
- **16:64 DEMUX with LVDS 622.08/644.45 Mbps differential data inputs and 155.52/166.65 Mbps series terminated logic (STL) single-ended data outputs**
- **On-chip 64 x 9 FIFO to eliminate system timing issues**
- **Core power supply: 1.8V**
- **I/O power supplies: 1.8V LVDS, 3.3V STL, and 3.3V CMOS**
- **Power consumption: 1700 mW typical**
- **Standard CMOS fabrication process**
- **452-pin BGA package**

## SUMMARY OF BENEFITS

- **Compliant with industry standards such as: Optical Internetworking Forum (OIF), Telcordia, and ITU-T standards.**
- **High level of integration allows for higher port density solutions.**
- **CMOS-based device uses the most effective silicon economy of scale.**
- **Low power consumption eliminates the need for external cooling sources.**
- **Target applications:**
  - OC-192/STM-64 transmission equipment
  - SONET/SDH optical modules
  - ADD/DROP multiplexers
  - Digital cross-connects
  - ATM switch backbone
  - SONET test equipment
  - Terabit routers
  - Edge routers

### Application Block Diagram