

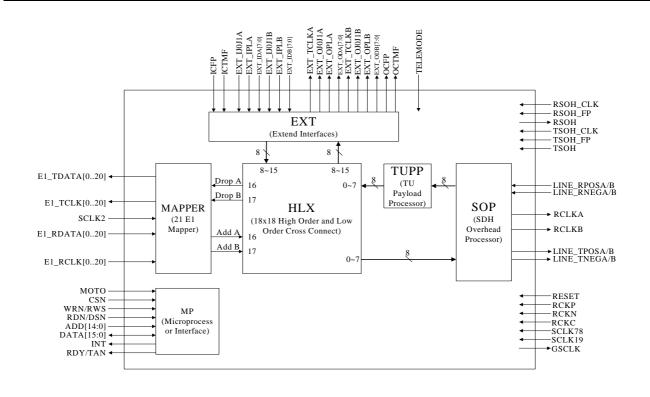
## STM-1/4 Single Chip Add/Drop Multiplexer System device

### www.daOVERVIEW

The CP1121A is one of the OPTRANS series chips designed by Chiphomer Technology Limited. It is extended to provide a flexible, low cost System-on-chip (SOC) solution for fast growing metropolitan transmission market, especially in Multi-service Transport Platform (MSTP) and Customer Premises Equipment (CPE) applications. It integrated one SDH overhead processor for dual STM-4 or dual STM-1, one extend interface for dual STM-4s or dual STM-1s, a tributary unit payload processor for 8 STM-1, E1 mapper for asynchronous mapping and demapping of 21 port E1, a 18 X 18 high and low order cross connecter.

## FEATURES

- SDH Overhead Processor
  - Dual channel SDH STM-4 or STM-1 Serial LVDS interfaces
  - Dual channel multi-rate CDR macro is integrated
  - High jitter performance complies with ITU-T specification
  - Regenerator and multiplex section overheads are terminated
  - High order AU-4 pointer interpretation and generation
  - VC-4 path overheads termination
  - Full access SOH through external serial interfaces
  - Support path loop-back
  - Support Multiplex Section Protection Switch
- TUPP



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TEBGA421 -40 ~ 85℃



**Product Brief** 

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Process TU-12/TU-3 Pointer

www.datasheet4u.cAligns SDH tributary unit within 8 STM-1.

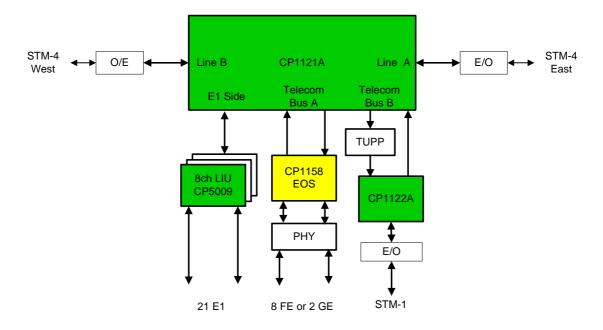
- TU3 or TU12 modefor every TUG3 in AU4
- Bypass mode for VC-4 Applications
- Extended interface supports
  - Two byte-width 19.44 Telecom Bus, or two byte-wide 77.76MHz Telecom Bus, or
  - Two 2bit-width 77.76MHz Telecom Bus
- 21 channel E1 mapper
  - 21 channels E1 asynchronous mapping and de-mapping to/from a STM-1.
  - 1+1 path protection, re-timing mode for channel #0 to #7
- High and low order cross connecter
  - 18 X 18 STM-1 non-blocking switching for high order or low order
- Provides 16-bit Intel/Motorola microprocessor interface .
- 1.8V/3.3V power supply. 3.3V CMOS I/O. LVDS I/O
- Supports IEEE 1149.1 boundary scan
- Operating Industrial temperature range:  $-40^{\circ}$ C ~  $85^{\circ}$ C
- Maximum power consumption less then 2.9W
- TEBGA 421 package

## APPLICATIONS

- SDH Add/Drop Multiplexers
- Multi-service Transport Platform (MSTP)

SDH Ternimal Multiplexers Customer Premises Equipment (CPE)

# **TYPICAL APPLICATION**



#### **Related Products** CP5009 8ch E1/T1/J1 LIU CP1181 21ch E1/T1 Mapper CP1122A

STM-1 single chip Add/Drop Multiplexer System Device