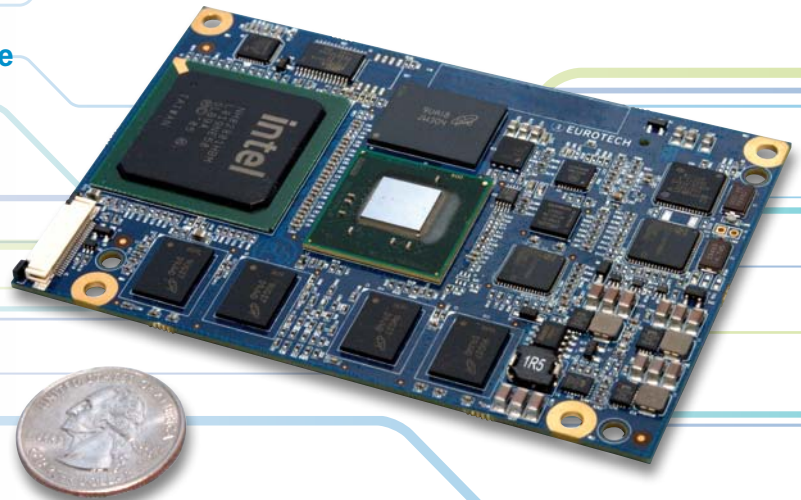


## Catalyst LP

- Dual core for high-speed applications
- 400MHz graphics engine
- High bandwidth I/O
- Eurotech's Everyware Software Framework helps speed up development time while making application development portable and robust
- Full-featured, application-ready development kits



### FEATURES

**CPU** – Intel Atom N450 and D510 with Intel ICH8M companion chip

**Memory/boot options** – Up to 2GB of DDR2 SDRAM, SD/MMC slots, dual SATA, and SSD Flash support up to 32GB

**Multimedia** – VGA, 18-bit color LVDS, dual display, Intel® HD Audio

**Mechanical** – Fanless 67 x 100 mm form factor

**Power management** – Power management across operating systems with consumption specs at 7W – 9W typical for single core and 11W – 13W typical for dual core

**Connectivity & I/O** – PCIe, Gigabit Ethernet and USB 2.0

**Operating system** – Pre-loaded Windows Embedded Standard or Wind River Linux

**Software framework** – Eurotech's Everyware™ Software Framework based on Java VME, with simplified foundation bundles supported allowing for fast application-specific code development.

The Catalyst LP, based on the Intel Atom N450 and D510 processors and the Intel ICH8M companion chip, offers dual core processing, high end graphics, rich high speed I/O, and more. All of this capability is brought out in the fanless 67 x 100 mm form factor typical of the Catalyst product family.

With a 400MHz graphics engine, the Catalyst LP offers high-performance graphics with 2-D and 3-D visualization for markets where high-resolution displays are critical, such as in digital signage. In addition, high bandwidth I/O capability and data storage interfaces like SATA make the Catalyst LP ideal for applications requiring extensive data retrieval and processing such as those in the industrial, medical, or human-machine interface markets. The compact, fanless design is well suited for devices both small and powerful.

The Catalyst LP supports Windows Embedded Standard and Wind River Linux 3.0. Support for Eurotech's Everyware™ Software Framework (ESF) and Eurotech Device Cloud (EDC) are coming soon. Contact us for availability.

### System Architecture

|                             |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
|-----------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| PROCESSOR                   | <ul style="list-style-type: none"> <li>Intel® Atom™ Processor N450 (single core)</li> <li>Intel® Atom™ Processor D510 (single core)</li> <li>Intel® ICH8M companion chip</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| RAM MEMORY                  | Up to 2GB DDR2 SDRAM at 667MHz                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
| FLASH MEMORY                | Optional on-board SSD Flash support up to 32GB                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
| OPERATING SYSTEM            | <ul style="list-style-type: none"> <li>Windows Embedded Standard</li> <li>Wind River Linux</li> <li>Other RTOS (contact for details)</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
| SOFTWARE FRAMEWORK          | Everyware™ Software Framework                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
| NETWORK                     | 10/100/1000 BASE-T Ethernet (magnetic only resident on carrier board)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |
| USB                         | <ul style="list-style-type: none"> <li>9x USB 2.0 ports</li> <li>USB port disable capability</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
| I2C                         | I2C bus                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
| LPC                         | LPC bus                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
| SM Bus                      | SM Bus interface                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
| VIDEO                       | <ul style="list-style-type: none"> <li>1x LVDS interface with 18-bit color</li> <li>1x VGA interface</li> <li>Dual independent display output capability</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| AUDIO                       | Intel® High Definition Audio                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
| TRUSTED PLATFORM MODULE     | TPM available on set configurations                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| EXPANSION BUSES             | <ul style="list-style-type: none"> <li>4x one-lane PCIe interfaces or optionally 1x four-lane</li> <li>2x SATA interface</li> <li>2x SD/MMC interfaces</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
| POWER                       | 3.3V and 5.0V (± 5%)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
| TEMPERATURE                 | Operating: 0°C to +70°C                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
| PHYSICAL                    | Dimensions: 67 x 100 mm                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
| ADAPTER BOARD EXPANDABILITY | Customization options include:<br>Serial ports (RS-232, RS-485, optically isolated)<br>4/5/8-wire touchscreen interface<br>Parallel port<br>Digital I/O<br>Analog I/O<br>CanBUS<br>Microphone and speaker audio                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
| ORDER CODES                 | <ul style="list-style-type: none"> <li>900125-1006R: Catalyst LP Module Intel Atom D510 (dual core), C Temp, 1.6GHz, 1GB DRAM</li> <li>900125-1007R: Catalyst LP Module Intel Atom D510 (dual core), C Temp, 1.6GHz, 2GB DRAM, 8GB Flash SSD, TPM</li> <li>900125-1008R: Catalyst LP Module Intel Atom N450 (single core), C Temp, 1.6GHz, 1GB DRAM</li> <li>CTLP1007: Catalyst LP Development Kit, Catalyst LP Module Intel Atom D510 (dual core), C Temp, 1.6GHz, 2GB DRAM, 8GB MMC, 4GB CompactFlash®, TPM</li> <li>CTLP1008: Catalyst LP Development Kit, Catalyst LP Module Intel Atom N450 (single core), C Temp, 1.6GHz, 1GB DRAM, 4GB CompactFlash®</li> </ul> |

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