



- **Highly Integrated Intel® Atom™ E6xx**
- **Small, Fanless 67x100mm Form Factor**
- **Ultra Low Power**
- **Gb Ethernet, CAN bus, USB**
- **LVDS and SVDO Graphical Interfaces**
- **Extended Temperature**
- **Professional Services**

## Features

**Powerful** - Based on the Intel Atom E6xx series, the Catalyst TC brings out a long list of I/O and multimedia capabilities directly onto the module for truly integrated embedded design capabilities

**Small** - The Catalyst TC is part of the Catalyst line (67x100mm format) of CoM products for logical migration in next generation designs

**Ultra Low Power** - Eurotech's low power design expertise is brought out with the Catalyst TC, which consumes between 2-3W and enables rugged fanless designs

**Extensive I/O** - With the Catalyst TC, embedded designs have direct access to I/O capabilities on the module such as Gigabit Ethernet, CAN bus, USB 2.0, and serial ports

**Extended Temperature** - Supports wide operating temperature (-40 to +85°C), conformal coating options, and soldered memory

**Professional Services** - Cuts Time-To-Market with Eurotech Professional Services, which include deep module customization, BIOS personalization, carrier board and system design and production

## Description

The Catalyst TC is a low-power, high performance Small Form Factor CoM, based on the Intel Atom E6xx processors family. Targeted for embedded devices which require extremely power-stingy and small designs, the Catalyst TC leverages the high level of integration offered by the Atom E6xx processor series to deliver a robust solution in the same 67x100mm form factor that made Eurotech Catalyst family so powerful in the industrial, gaming, transportation, defense, and medical applications.

The Catalyst TC fits into small embedded devices that need to be mindful of size and power consumption. With so many features coming out directly on the module, such as CAN bus, USB, serial ports, LVDS and VGA interfaces, HD audio, and PCIe buses, OEMs can focus on designing very small devices that can run on battery for longer than ever before. Regarding memory and storage, the Catalyst TC offers DRAM, SATA, SD, and on-board flash to make a truly flexible solution. The Catalyst TC comes in both commercial and industrial operating temperature ranges.

For customers who need the power of Windows, the Catalyst TC supports Windows 7 as well as WES and Windows CE. Wind River Linux is also supported, including dev kits that offer LiveUSB, a powerful program which allows developers to effortlessly create applications in the Linux environment much more quickly than traditional methods.

## Specifications

|                       |                |  |
|-----------------------|----------------|--|
| <b>PROCESSOR</b>      | CPU            | Atom E6xx, up to 1.6GHz – Intel Platform Controller Hub (PHC) EG20T                |
| <b>MEMORY</b>         | RAM            | Up to 2GB DDR2 Integrated  |
| <b>STORAGE</b>        | Embedded       | Optional On-board 4GB/16GB SSD – Factory Option: up to 64GB                        |
|                       | SATA           | 1x SATA 2.0  |
|                       | Other          | Factory Option: 1x IDE Interface   |
| <b>I/O INTERFACES</b> | Ethernet       | 1x 10/100/1000Mbps with RGMII Interface  |
|                       | USB            | 9x USB 2.0 Including 1x Configurable USB Host/Client                               |
|                       | Serial         | Up to 4x RS-232/RS-485 (1x Full, 3x 3-wires), 1x UART (Debug)                      |
|                       | CAN bus        | 1x CAN bus 2.0   |
|                       | Digital I/O    | 5x GPIO  |
|                       | Video          | 1x LVDS Interface with 24-bit Color, 1x SDVO Interface                             |
|                       | Audio          | Intel High Definition Audio  |
|                       | PCI Express    | 3x PCIe x1   |
|                       | SPI            | Yes  |
|                       | LPC            | Yes  |
|                       | I2C            | 2x I2C   |
|                       | SMBus          | Yes  |
|                       | Other          | 1x JTAG, 2x Secure Digital / Multi Media Card (MMC) Interfaces                     |
| <b>OTHER</b>          | TPM            | Factory Option   |
| <b>POWER</b>          | Consumption    | 2-3W Typ   |
|                       | Management     | Advanced Power Control, System Health/Environmental Monitor, ACPI Power Management |
| <b>ENVIRONMENT</b>    | Operating Temp | - 40 to +85°C  |
|                       | Storage Temp   | - 40 to +85°C  |
| <b>MECHANICAL</b>     | Dimensions     | 67x100mm (LxW) - Catalyst Form Factor  |
| <b>SOFTWARE</b>       | OS             | Wind River Linux 7, WES 7, Windows CE, Windows 7 Support                           |
|                       | IoT Framework  | Everyware Software Framework Ready   |