

Manufacturer: **Hatteland Display AS**

Product: **Rackmount Computer**

Type: **HT 416 STy-Axxx Models** (y=OS, xxx=Config)

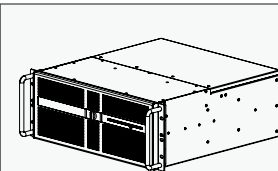
Last Revised: **04 Aug 2014**
Revision#: **26**

Rackmount Computer

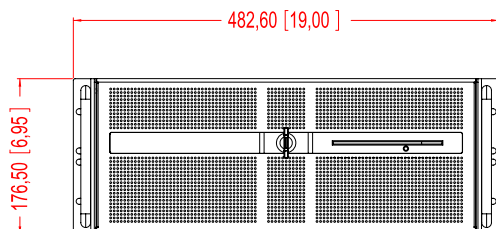
Features:

HT 416 Maritime Rackmount Computer Models. Next generation computer that features the latest Intel® processor technology. The standard model is aimed/designed to be used in marine applications. Normal installation is indoors and mounted into a standard 19" rack.

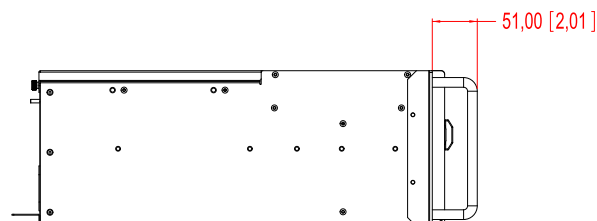
The 4U computer is designed to handle a large number of hardware configurations, both with respect to Hatteland Display defined options such as; HDD, customer additional hardware and customer designed PCI card. The unit is RoHS Compliant.



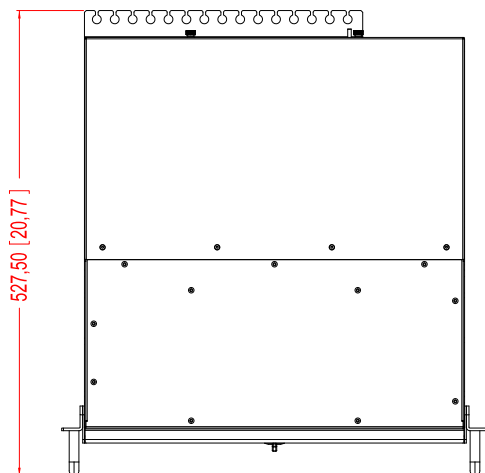
FRONT VIEW



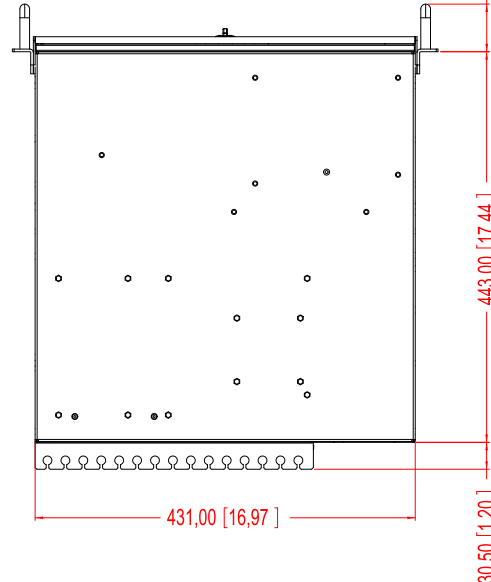
SIDE VIEW



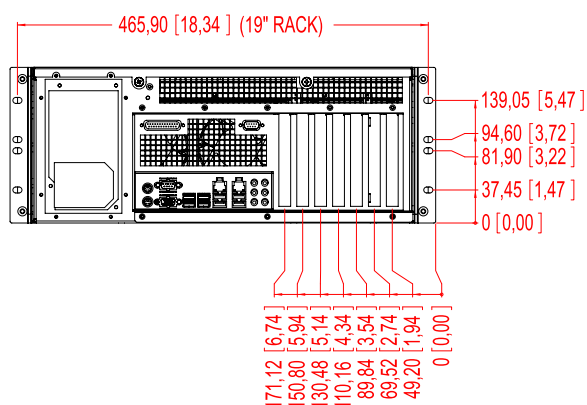
TOP VIEW



BOTTOM VIEW



BACK VIEW



TECHNICAL DESCRIPTION

Computer Specifications: (Standard model)

• Installed Operating System	: None for standard version (check Accessories / Options below for OS options)
• System Chipset	: Intel® Q965 ICH8D0
• Graphics	: Integrated VGA Chipset, Supports CRT interface.
• Graphics Resolution	: Max 2048 x 1536 @ 85Hz
• BIOS	: AMI 8MB Flash
• PCI Slots	: 5 x PCI Slots 32-bit, 3V and 5V Interface, Full Height and Full Length
• PCIe-X1 Slots	: 1 x PCIe X4, Full Height and Full Length
• PCIe-X16 Slots	: 1 x PCIe X16 (add2), Full Height and Full Length (Graphic mode)
• Media Drive	: 1 x Slim DVD-RW/CD-RW Dual Recorder/Player
• Parallel Port (LPT)	: 1 x Bi-Directional Centronics (SPP/ECP/EPP)
• Serial Ports	: 1 x RS-232
• Serial Ports	: 1 x RS-232/RS-422/RS-485** (electrical isolated)
** Note: Isolated RS485, currently limited to 19200baud	
• Ethernet	: 2 x 10/100/1000Mbps Gigabit LAN, Realtek RTL8111B
• USB Ports	: 8 x USB 2.0 + 2 x internal USB2.0
• Keyboard Port	: Standard PS/2 mini DIN connector
• Mouse Port	: Standard PS/2 mini DIN connector
• Audio	: On-board Audio Controller, AC97 Codec (7.1 channels, HD Audio) Line In, Line Out, Mic In
• Speaker	: On-board
• Power Manager	: ACPI

External Connector Type:

1 x HD DB15F

1 x DB25F
1 x DB9M
1 x DB9F2 x RJ-45
8 x USB Type A
1 x PS/2
1 x PS/2
6 x JACKS

Power Specifications:

Power Supply Options:

• 115&230VAC - 50/60Hz	: HT 416 STx-Axxx model (400W - Autorange)
• Power Consumption - Operating	: 100W (TYP)

STD IEC

Available Models:

HT 416 STD-A340 with:

1 x Intel® Core™2 Duo Desktop CPU E6400 - 2.13GHz, 1066MHz FSB, 2MB L2 Cache
2 x 1 GB installed (Dual Channel DDR2 800/667MHz SDRAM, 240-pin DIMM)
1 x 500GB or more* 3.5" SATA, 7200 RPM, 8MB Cache
1 x Microsoft® Windows® Embedded Enterprise (XP Professional Eng w/SP2c, 32bit)

HT 416 STD-A244 with:

1 x Intel® Core™2 Duo Desktop CPU E6400 - 2.13GHz, 1066MHz FSB, 2MB L2 Cache
2 x 1 GB installed (Dual Channel DDR2 800/667MHz SDRAM, 240-pin DIMM)
1 x 500GB or more, 3.5" SATA, 7200 RPM, 8MB Cache
2 x Intel® 10/100/1000Mbps Ethernet (Teaming, Low Profile) - RJ45.
1 x Matrox P690 PCIe-X16, 128MB, Max 2048x1536 @ 85Hz with 2 x 29P DVI-I*
1 x Microsoft® Windows® Embedded Enterprise (XP Professional Eng w/SP2c, 32bit)
* If 1600x1200 resolution is used, DVI signals must be set to CVT-RB (Coordinated Video Timing-Reduced Blanking) mode manually.

* Size indicated is the lowest size available/approved for current revision of data sheet. The unit will support increased disk space in future. Please contact sales for up-to-date status.

Available Accessories:

- HT 00250 OPT-A1 = 2 x 20" ball bearing sliding rail and mounting kit for 19" Rack
- JH C01MF A-A = 1 x USB Cable 1m, Type A to Chassis mount receptacle
- HT 00300 MSOS = OS options -> <http://www.hatteland-display.com/os>

*Please see user manual/datasheet for more information

Models without/with OS:

- HT 416 ST0-Axxx = No OS
- HT 416 STD-Axxx = Microsoft® Windows® Embedded Enterprise (Win XP Pro Eng w/SP2c, 32bit)
- HT 416 ST3-Axxx = Microsoft® Windows® Embedded Enterprise (Win Server 2003 Eng, 32bit)
- HT 416 ST7-Axxx = Microsoft® Windows® Embedded Enterprise (Win 7 Pro Eng, 32bit)
- HT 416 ST8-Axxx = Microsoft® Windows® Embedded Enterprise (Win Server 2008 Eng, 32bit)

For a full overview of typenumbers, please review the following link: www.hatteland-display.com/pdflink/ind100780-5.php

MECHANICAL DESCRIPTION

Physical Considerations:

- 431.00 (W) x 176.50 (H) x 443.00 (D) mm (main chassis w/o handles etc)
- 16.97" (W) x 6.95" (H) x 17.44" (D) (main chassis w/o handles etc)
- Weight: 25 kg (approx)
- Power button, power led and HDD Led in front
- Black (EP0301-4040627) Heavy-duty steel 4U Rackmount chassis
- Easy Removable air filter and lockable front hatch door
- Supports 6 x 5¼" disk bays (4 x 5¼" + 2 x slim, one used for air flow)
- Supports 4 x 3½" disk bays
- Supports rear cable strain reliefs with grounding thread
- Supports rear PCI card support holder, fixed to chassis
- 5 x Internal Cooling fans such as: High & Low pressure, PSU, CPU & PCI.

Environmental Considerations:

- Operating : Temperature -15 deg. C to +55 deg. C
Humidity up to 95%
- Storage : Temperature -20 deg. C to +60 deg. C
Humidity up to 95%

Safety Considerations:

Even although the test conditions for bridge units provide for a maximum operating temperature of 55°C, continuous operation of all electronic components should, if possible, take place at ambient temperatures of only 25°C. This is a necessary prerequisite for long life and low service costs.

Compass Safe Distance : HT 416 STx-Axxx Standard: 135cm - Steering: 90cm

APPROVALS & CERTIFICATES

This product have been tested / type approved by the following classification societies:

IEC 60945 4th (EN 60945:2002)
ClassNK - Nippon Kaiji Kyokai

DNV - Det Norske Veritas
GL - Germanischer Lloyd

ABS - American Bureau of Shipping
LRS - Lloyd's Register of Shipping

IACS E-10
EU RO MR - Mutual Recognition

BV - Bureau Veritas