

ProPanel® TC2100

Zone 1 non-purged embedded computer

- zone 1 non-purged thin client / embedded controller
- 15" sunlight-viewable lcd
- smallest in class, ideal for rig-up/ rig-down
- standard i.s. ethernet, rj45 connection
- touchscreen option available
- USB and wireless options available
- i.s. ethernet hub option available



Azonix, utilizing its core competency in certifying equipment for hazardous areas, and its understanding of rig floor surface equipment, has developed the ProPanel TC2100.

The TC2100 is a stand-alone embedded computer. It is designed to fit remote terminal applications as a thin client or embedded controller. This hardware platform is built to survive the abuse of the rig floor environment while providing important benefits such as low weight and small size. This, as well as easy connections, make the TC2100 an ideal solution for "rig-up/rig-down" applications.

The TC2100 is an extension to the Azonix ProPanel® Thin Client product line, and is based on the same architecture as the TC2500. The TC2100 has a larger 15" LCD screen and higher resolution, to be able to display more information. Targeted at MWD/ LWD, mudlogging and data-rich applications, this Thin Client version has additional optional features such as larger Flash memory capacity, optical Ethernet and an integrated Ethernet hub.

The TC2100 runs an embedded XP platform communicating Ethernet over copper fiber or wireless, and remains operational in extremes of temperatures and vibrations.

A Cost-Efficient Solution for a Remote Terminal

Azonix Thin Clients eliminate labor and expense inherent in setup time and cabling installation of rig-floor surface equipment computers. The system is also ideal for mobile interface with remote gas compression stations and other Zone 1 equipment.

- **Fast rig-up/rig-down times** compared to other computer setups
- **Low maintenance costs** due to use of standard RJ45 or wireless connectors and cables (avoiding EEx'd connectors, antenna, and armored cable)
- **Low service and support cost** due to modular design, which is simple to troubleshoot and repair
- **Field-proven ProPanel® technology** offers the longest service life available, for the lowest overall cost of ownership

ProPanel® TC2100 Applications

Azonix' Thin Client design pushes ProPanel further into the realm of point-of-attack applications for operations in hazardous areas, such as skids, gas compression stations, remote installations, offshore rigs, harsh industrial environments, marine applications and more.

- **The TC2100 is a portable, rugged controller/monitor** that can be transported from site to site or easily mounted for permanent installations
- **The wireless option** provides high-security, high-speed communications for fast rig-up/ rig-down in difficult installation locations, eliminating prohibitive cabling cost and labor

SPECIFICATION

Processor

1GHz Intel Embedded Processor

Operating System

Embedded XP O/S SP2 with .NET 2.0 Framework

LCD and Backlight

15" (1024 x 768) with sunlight-viewable capability

Flash Memory

Default 1GB with expansion up to 16 GB

User Interface

Integrated membrane keys

Glass-based touch screen (optional)

Memory (RAM)

1 GB

INPUT/OUTPUT

Power

Rig Universal A.C. power input, armored cable through EEx'e terminals or EEx'd connector

Signals

Keyboard, Serial and Ethernet (RJ45) - All I.S. to allow easy connections with devices

USB Option

Intrinsically safe USB 2.0 with current limitation of 150 mA

Ethernet Switch Option

3-port I.S. Ethernet switch integrated inside the TC2100

CERTIFICATION

Zone1 (ATEX)

ENVIRONMENTAL

Temperature

-40°C to +50°C in direct sunlight (1kW/m²)

Shock

15G, 11ms pulse in all 3 axis

Vibration

3G, 10 Hz to 500 Hz in all 3 axis

Sealing

NEMA4

MECHANICAL

Enclosure material

Aluminum with <3% Magnesium

Dimensions (approx.)

43cm (W) x 41cm (H) x 19cm (D)

17.0" (W) x 16.0" (H) x 7.5" (D)

Weight

Base Unit 49.6 lbs / 22.5kg

Optional Modules:

ES1000 1.5 lb / 0.68kg

Wireless Module 1.5 lb / 0.68kg

USB Module 1.0 lb / 0.45kg

Mounting

Desk and Wall Mount standard

Yolk Mount Kit and Visor (optional)

WIRELESS OPTION

Communications

Industry standard IEEE 802.11b supports high level of security and high data band width

Radio Characteristics

2.4 - 2.4835 GHz DSSS / distance ~2500' L.O.S. (line-of-sight)

Antenna Interface

Intrinsically Safe - does not require EEx'd antenna or armored cable / lightning suppressor

Antenna

"N" type reverse polarity connector (Optional)

Certification

Zone 1

Connections

Standard connectors (vs. EEx 'd) for easy rig-up and rig-down, lower operation cost



Rear view of TC2100



Intelligent connectivity with Intel Inside®.

The given data is only intended as a product description and should not be regarded as a legal warranty of properties or guarantee. In the interest of further technical developments, we reserve the right to make design changes.