Network Time Displays

**Features**

- Digital Clock Automatically Synchronizes with NTP servers over Ethernet Network
- 0.5", 3.2" or 5" display sizes
- Remote network management
- Time Zone and Daylight Savings support
- Multiple colors
- Optional Network Time Server version with built-in GPS receiver
- Optional built-in IRIG B time code reader

Brandywine’s family of Network Time Displays provides maintenance-free display of time. They receive their time over a standard computer network, by interrogating a network time server.

The Network Time Displays use the Internet standard for time transmission, Network Time Protocol (NTP) to synchronize themselves automatically to a network time server.

Using existing standard network cabling and makes installation of the Network Time Displays simple and straightforward. No dedicated wiring is required when using the Ethernet as the synchronizing source.

Once connected to the network, the displays can automatically receive a network address using DHCP protocol. Software utilities are provided that will automatically identify any Network Time Displays on the network, to allow configuration from a single PC. Individual displays have the capability of displaying their own address by means of a rear panel push button, which can also be used to set the display brightness.

Time can be displayed as either 12 hour or 24 hour time format. A built-in web browser allows the user to control which time source will be used, time zone and daylight savings set-up and display brightness. Full password protection for changing settings is provided on all units.

All displays include an RS232/422 broadcast time port, with user specified time message for synchronizing external equipment. All displays may also be
synchronized from an RS232/422 ASCII serial source or
optionally, an analog time code such as IRIG-B.

Network Time Displays are available in either 4 digit
(HH:MM) or 6 digit configurations (HH:MM:ss).

Network Time Displays are available in a variety of
configurations, including:
- A desktop/console mount unit with 0.5" characters
- A 1U 19" rack mount unit with 0.5" characters
- A wall/ceiling mounted unit with 3.2" character
  height
- A wall/ceiling mounted unit with 5.0" character
  height suitable for larger public spaces.

Specifications

Network Protocols
NTP      SNTP      DHCP      TCP/IP      UDP

Module Connections
Network: 10/100 baseT Ethernet
Connector: RJ45
Serial Output: RS232 or RS485 (link selected)
Baud rate: 1200-115200 baud
Connector: DB9

Synchronized Inputs
Standard
Ethernet: NTP
ASCII: Standard protocol below, others available on special order
  Hardware: RS232/485 (link selected)
  Baud rate: 2400, E, 7, 1
Optional: GPS Receiver IRIG B time code

Overall Dimensions

<table>
<thead>
<tr>
<th></th>
<th>4 DIGIT</th>
<th>6 DIGIT</th>
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</thead>
<tbody>
<tr>
<td>0.54 Console</td>
<td>N/A</td>
<td>1.85&quot;x 7.44&quot;x 4.75&quot;</td>
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<tr>
<td>0.54&quot; Rack Mount</td>
<td>N/A</td>
<td>1.75&quot;x 19&quot;x 4.5&quot;</td>
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<tr>
<td>3.2&quot; Wall Mount</td>
<td>6&quot;x 10.5&quot;x 2.62&quot;</td>
<td>6&quot;x 15&quot;x 2.62&quot;</td>
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<tr>
<td>5&quot; Wall Mount</td>
<td>8&quot;x 18.3&quot;x 2.75&quot;</td>
<td>8&quot;x 25&quot;x 2.75&quot;</td>
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<tr>
<td>Power</td>
<td>95-265 VAC Universal</td>
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Power 95-265 VAC Universal
### Ordering Information

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<th>4 DIGIT</th>
<th>5 DIGIT</th>
<th>6 DIGIT</th>
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<tbody>
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<tr>
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<td>061000056</td>
<td>061000057</td>
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<tr>
<td>Yellow</td>
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<td>061000076</td>
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<td>061000087</td>
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<tr>
<td><strong>W/ GPS</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Red</td>
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<tr>
<td>Yellow</td>
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<tr>
<td>Blue</td>
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<tr>
<td><strong>W/IRIG B</strong></td>
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<tr>
<td>Red</td>
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<td>061000100</td>
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<tr>
<td>Blue</td>
<td>061000094</td>
<td>061000098</td>
<td>061000101</td>
</tr>
</tbody>
</table>

### Setup

**System:**
- **IP Address:**
- **Device IP Address:** 0.0.0.0
- **Device Subnet Mask:** 0.0.0.0
- **Device Gateway:** 0.0.0.0

**NTP Server:**
- **NTP IP Address:** 192.168.1.36
- **Restart control loop:**
- **Client Interval:** 60 seconds

### Time Settings

**Serial Output (TOI):**
- **Format:** 00:00:00 00:00:00 00:00 00
- **Band:** 2400
- **Data Bits:** 0
- **Stop Bits:** 1
- **Parity:** None

**Time Zone Settings:**
- **Time Zone:**
- **Automatic adjustment:**

**Daylight Saving Time:**
- **Daylight saving offset (DST):**
- **Daylight saving start:**
- **Daylight saving end:**

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