Description

The NetLink module is part of FLEXPOWER's patented power management system for security and life safety applications. The NetLink NL1 is a two port network module within the FlexPower system that communicates and controls power status over a local or wide area network. The NL1 provides two SPI ports for connection to FlexPower devices that enables monitoring and control of the power system. Typical data gathered and reported includes operational fault status, power supply output voltage, battery charging voltage, battery charging current, and fire alarm input status.

Automated reports may be generated on any detected fault condition, battery aging, fire alarm interface activation, and event activation, or on a time base for scheduled confirmation of proper operation. A time and date stamped log of the past 100 events is kept as history in a buffer and may be accessed as a scheduled report, or immediately on an alert or occurrence. The buffer is updated once per hour with all parameters in normal range.

In addition to the two SPI ports, the NL1 provides two current sensor inputs, a remote temperature sensor input, a volt meter input, and a contact monitor input. The contact monitor input may be programmed to respond to either a normally open or normally closed contact or voltage presence or loss. Two outputs are also provided for use in power cycling external equipment with a Lifesafety power Relay Module or interfacing to the C8 or M8 modules. The NS2 accessory module can also be used for controlling external equipment from the network or internet. The NS2 output controller module is typically used in an AC FlexPower system (FPA wallmount, RA rackmount).

Features and Functions

Monitoring and reporting FlexPower systems for
- System integrity / battery health / output condition

Remote diagnostics and service features
- Monitor health and status of host power supply and battery set
- Auto-schedule, test, and report battery standby time
- Remote supervision of battery’s state of charge
- Monitoring of internal cabinet temperature
- Remote power cycling control of external equipment
- Time / date stamp system log reports of last 100 events

Email notification on
- AC and system fault conditions
- Aging battery
- Drained battery
- Fire Alarm Interface (FAI) activation
- External Event activation

SNMP notification
- Version 1, 2, or 3

Electrical Ratings

<table>
<thead>
<tr>
<th>Specification</th>
<th>9 to 30 VDC</th>
</tr>
</thead>
<tbody>
<tr>
<td>Input Operating Voltage</td>
<td>9 to 30 VDC</td>
</tr>
<tr>
<td>Input Operating Current</td>
<td>60 mA nominal</td>
</tr>
<tr>
<td>Network Data Rate</td>
<td>10/100 Mbps</td>
</tr>
<tr>
<td>Voltage Measurement Range</td>
<td>1 to 30 VDC ±5%</td>
</tr>
<tr>
<td>Current Measurement Range</td>
<td>0 to 20A ±0.1A ±5% of reading</td>
</tr>
<tr>
<td>Event Input</td>
<td>9 to 32 VDC</td>
</tr>
<tr>
<td>Output 1, 2 Max Sink Current</td>
<td>50 mA nominal</td>
</tr>
</tbody>
</table>

Agency Listings
UL2044, UL294, UL60950-1

Ordering

<table>
<thead>
<tr>
<th>Mechanical Information</th>
</tr>
</thead>
<tbody>
<tr>
<td>NL1          2 Port Network</td>
</tr>
</tbody>
</table>

Provided with Cables, Mounting Hardware

Monitoring / Reporting / Test / and Control Functions

Monitored Parameters
- Power Supply Output Voltage
- AC Fault Status
- System Fault Status
- Fire Alarm Input Status
- Battery Voltage
- Battery Charge Current
- Battery Age
- Total Number of System Faults
- Total Number of AC Faults
- DC Load Current (system or battery)
- DC Output Voltage (system and battery)
- Event 1 (user specified)

Programmable Functions
- AC Fault Delay
- System Fault Delay
- System Install Date
- Reset Fault Counters
- Optimal Battery Charge Current
- Reset Battery Age Counter
- Battery Replacement Period

Control Functions
- Output 1 (on or off)
- Output 2 (on or off)

Event-triggered Email Alerts & Reports
- AC Fault Occurrence
- System Fault Occurrence
- FAI Activation Occurrence
- Low Battery Occurrence
- Battery Load Test Completed
- General System Status Report
- Scheduled System Service Due Alert
- Battery Replacement Due Alert
- Event Activation Alert (user specified)

Test Functions
- Battery run time capacity
- Battery state of charge
**Module Connections**

![Diagram of Module Connections](Image)

**NL1 Browser Home Screen**

Home screen command center
- Visual alert of system status
- Fault and system history
- FAI drop status
- Battery charge condition
- Battery service notification
- Battery run time test activation
- Current sensor reading
- Voltage sensor reading
- Event activation condition
- Service due report
- Device on/off control

**Report Screen**
- Set up screen
- What to report, when to report

**Configure Screen**
- Network, email, SNMP settings
- Current sensor calibration
- Battery life/capacity setting

**Programming Screen**
- Set FPO battery charge current
- Set fault report delays
- Reset timer for new battery install
- Reset fault counters

**Tools Screen**
- Upgrade software
- System reboot
- System activity log

---

**LifeSafetyPower.com**

(888) 577-2898  
info@lifesafetypower.com

Specifications subject to change without notice.

© 2013 LifeSafety Power Inc. All rights reserved. LifeSafety Power and FlexPower are registered trademarks of LifeSafety Power Inc. All other trademarks and copyrights are the property of their respective owners.

P01-272A  12/13

LifeSafety Power, Inc.  
750 Tower Road, Unit B  
Mundelein, IL 60060 USA

---

See NL1 installation

**Note**
AC networked systems have a simpler PowerCom screen outlined in red