

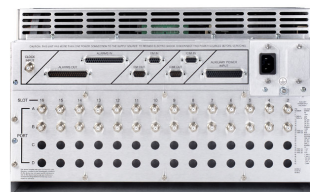
## Prisma II Platform Overview



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## Prisma II Chassis - Functions

- The Prisma II Chassis provides the following functions
  - Houses the Fan Tray
  - One or Two Power Supplies
  - All application modules and ICIM
  - Distributes electrical power to all modules
  - Transports communication and control signals from the application modules to the ICIM, LCI software or TNCS software



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## Prisma II Chassis - Components



- The Prisma Platform consists of the following standard and optional products
  - Prisma II Chassis
  - Prisma II Fan Tray
  - Prisma II Power Supplies
  - Prisma II Intelligent Communications Interface Module (ICIM)
  - Prisma II Application Modules
  - Local Craft Interface (LCI) Software
  - Transmission Network Control System (TNCS) Software

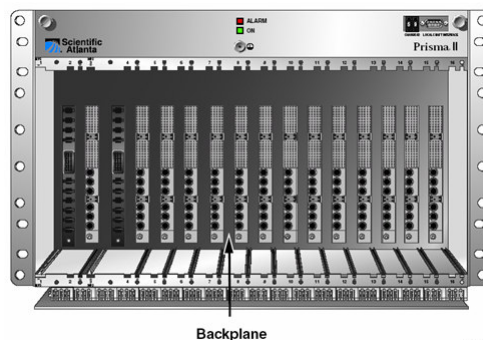
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## Chassis Backplane



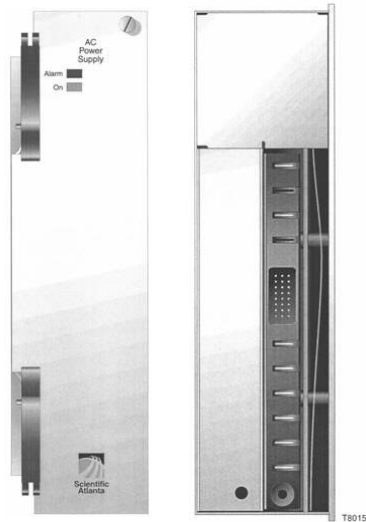
- Consists of the inside and outside rear panel of the chassis through which the electrical, communication and RF connections are made to each module in the Prisma II platform.
- The connectors are inherently self-guiding and allow a blind mate connection



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## Power Supply



- Front panel has a green ON indicator and a red ALARM indicator
  - ON indicator illuminates when external power has been applied
  - ALARM indicator illuminates when the power supply has a problem supplying one of the required output voltages to the power chassis

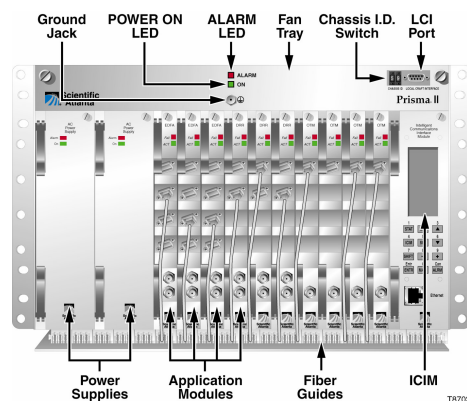
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## Redundant Powering



- When two power supplies are installed they load share
  - There is no switch to fail if one of the PS modules fail.
  - The load is simply taken over by the second PS module.
- The two power supply slots (1 & 3) are located on the left side of the chassis
  - Slots 1 & 2 are typically used for primary power and slots 3 & 4 for the second power supply
  - If no second power supply is used the space should be filled with a power supply blank.
- The power supplies have internal fans that provide airflow for cooling.



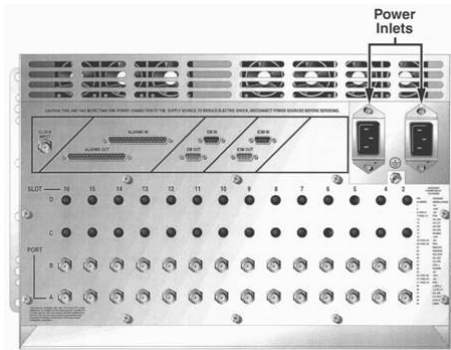
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## Powering the Chassis



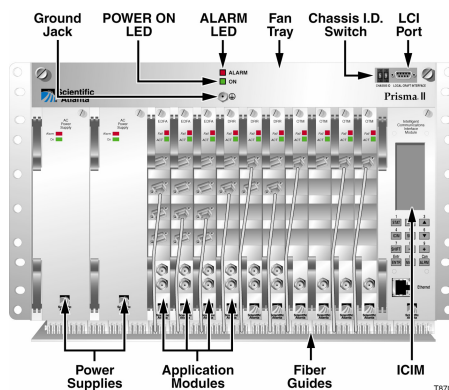
- The power supplies receive electrical power from the power inlets located on the rear of the chassis.
- A power cord is used to supply AC to the AC power inlet
- A DC mating connector should be placed on the DC leads and inserted into the DC power inlets
- DC and AC power inlets can be intermixed on one chassis



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## Fan Tray

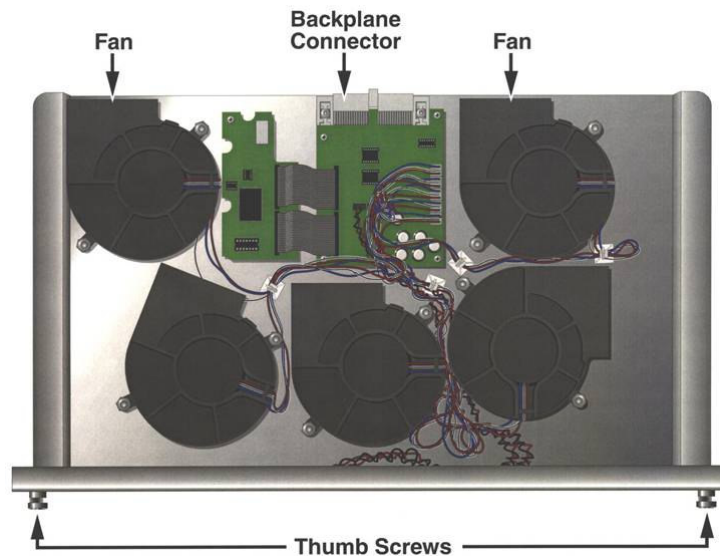


- Located at the top of the chassis
- Provides cooling to the chassis and application modules
- Provides temperature and power supply information to monitoring devices
- Available in either front or rear exhaust models
- Fan Tray can be removed for maintenance or inspection by loosening the two screws located on either side of the front panel.
- DO NOT operate a chassis without a fan tray.

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## Top view of Fan Tray



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## Prisma II Intelligent Communications Interface Module



- Technician Friendly: Enables Easy Set-up, Monitoring and Maintenance of all Modules
- Optimized For S-A's TNCS/ROSA Network Management System Integration
- Single ICIM Supports Up To 140 Modules ... Saves Space and Cost
- Provides RS-485, RS-232, Ethernet, RF Communications Interfaces
- Designed For Future Enhancements ... Direct SNMP Communications, Remote Monitoring, and Downloadable Software - Future Proofing Network

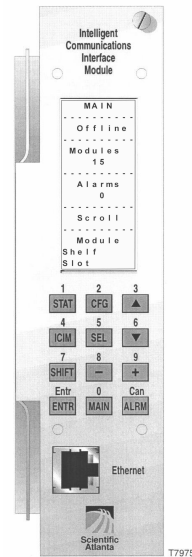
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## ICIM



- LDC Screen
  - Displays the ICIM menus, alarms, and status information
- 12-key numeric keypad
  - Used to navigate the ICIM's menus and configure the applications modules
- Ethernet Connector
  - Directly connects the ICIM to a network
    - *Future applications*



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## ICIM Keypad Functions



Button	Function
STAT	Displays status information for the selected module.
CFG	Displays configuration information for the selected module.
ALRM	Displays all of the parameters in alarm for a selected module.
▲	Moves the menu selection area up.
▼	Moves the menu selection area down.
SEL	Selects the highlighted parameter.
ICIM	Displays ICIM module information such as firmware version, serial number, and baud rate.
SHIFT	Shifts function of a keypad button to the function or number label just above that button.
—	Decreases numerical readings of selected configuration parameters.
+	Increases numerical readings of selected configuration parameters.
ENTER	Enters input data (if valid).
MAIN	Exits the current menu and displays the MAIN menu.

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## Operating the ICIM



- Upon installation of the ICIM it will operate without the aid of an operator.
- Unless it generates alarms or your system configuration changes, you should not need to make any adjustments beyond the initial setup.

```

MAIN
-----
Offline
-----
Modules
  15
-----
Alarms
  0
-----
Scroll
-----
Module
Shelf
Slot
    
```

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## Main Menu - ICIM



Display	Description
Offline	Indicates TNCS communication status with the ICIM
Modules	Indicates the number of modules in the ICIM domain
Alarms	Displays the number of modules that are in alarm. Selecting this option allows scrolling through all modules in alarm condition
Scroll	Allows scrolling through all modules in the ICIM domain
Module Shelf Slot	Allows selection of any specific module in the ICIM domain

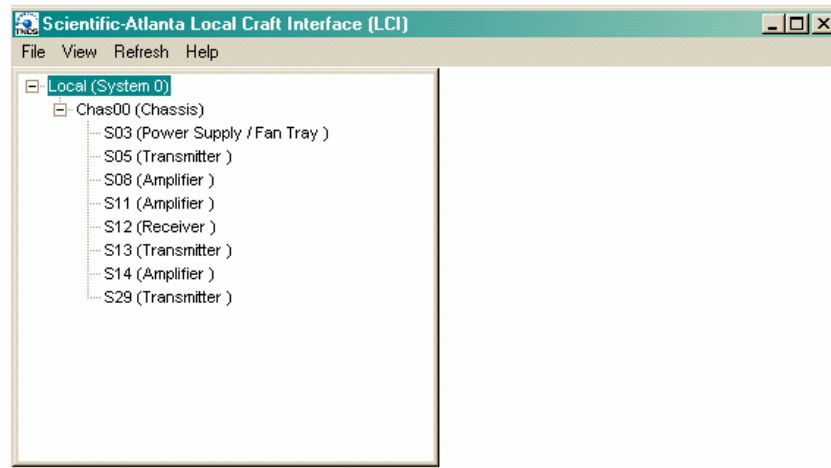
```

MAIN
-----
Offline
-----
Modules
  15
-----
Alarms
  0
-----
Scroll
-----
Module
Shelf
Slot
    
```

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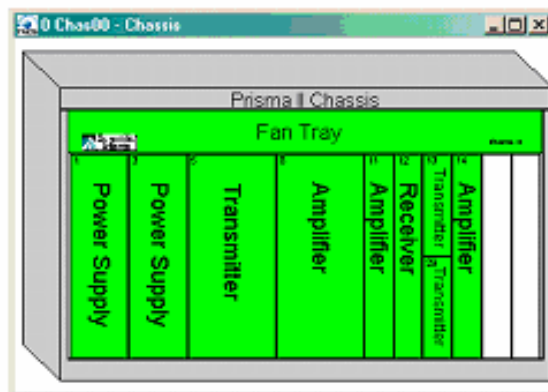
## Main Menu - LCI Software



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## Main Menu - LCI Software



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# Main Menu - LCI Software



Chas00:529 p2H01a Transmitter

### 1310nm High Density Transmitter

Parameters		Minor Alarm		Major Alarm		Major Alarm	
Present Value	Present Status	Nominal Value	Low Limit	High Limit	Low Limit	High Limit	
Laser Temperature	40.6 Normal	40.0	-5	5	-15	15	deg-C
Laser Bias Current	69.0 Normal	70.0	-10	10	-20	20	mA
RF Input Power	0.0 Normal	0.0	5.0	5.0	1.000	7.5	dB
Optical Output Power	4.4 Normal	4.4	0.5	0.5	1.0	1.0	dBm

#### Alarms

Summary Status: Normal  
 Communication Status: Normal  
 Laser Enable Status: Normal  
 CW Mode Status: Normal  
 Power Supply Status: Normal

#### Status

Module Temperature: 29.2 deg-C  
 TEC Current: 88.2 mA  
 Laser RF Drive: 1.0 dB

#### Controls

Enable Laser: On  
 CW Mode: Off  
 Low RF Alarm Inhibit: Off  
 Master Master  
 RF Drive Level: 0.0 dB  
 AGC: Off

#### Properties

Devtype Revision: 1.02  
 Name: S29  
 Graphic:  
 Service Name:  
 Symbol:  
 Device Location:  
 Alias:  
 Notify Set A:  
 Notify Set B:  
 M&C-Scan: On Scan  
 Maintenance Mode: Normal  
 Poll Counter: 1444  
 Script:  
 Comm Alarm Threshold: 1 %  
 Comm Quality: 29  
 Address:  
 Port: COM1  
 Description: 1310nm High Density Transmitter  
 Software Revision: 1.01  
 Script Version:  
 Serial Number: ABCDEFGK  
 Time Of Service: 4 Hrs  
 Day Code: A05  
 Module Type: 1000

Start Scientific-Atlanta Lo... 1310 screen shots for ma... 9:58 AM

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# Main Menu - LCI Software



Change Value Dialog

Chas00:529  
 1310nm High Density Transmitter  
 Optical Output Minus High Limit  
 Range(s): 0.0, 50.00

Command to:

Cancel Execute

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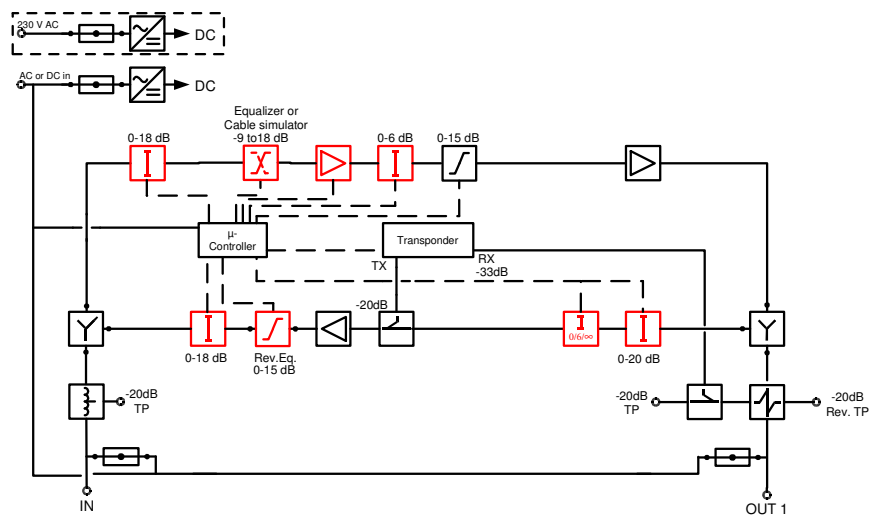
## Compact EGC Mini Amplifier 93240



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## EGC Mini Amplifier 93240



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## Compact EGC Mini Amplifier



- Ease-of-use by electronic controlled settings
  - Downstream
    - *Input attenuation*
    - *Input equalizer / input cable simulator*
    - *Different gain settings (28 dB – 38 dB)*
    - *Interstage attenuator*
    - *Interstage equalizer*
  - Upstream
    - *Input attenuation*
    - *Output equalizer*
    - *Output attenuation*
- 3 ways of accessing menus:
  - Traditional menu structure
  - Short cuts for often used (numbers on cover)
  - Menu numbers



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# Thank you !

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