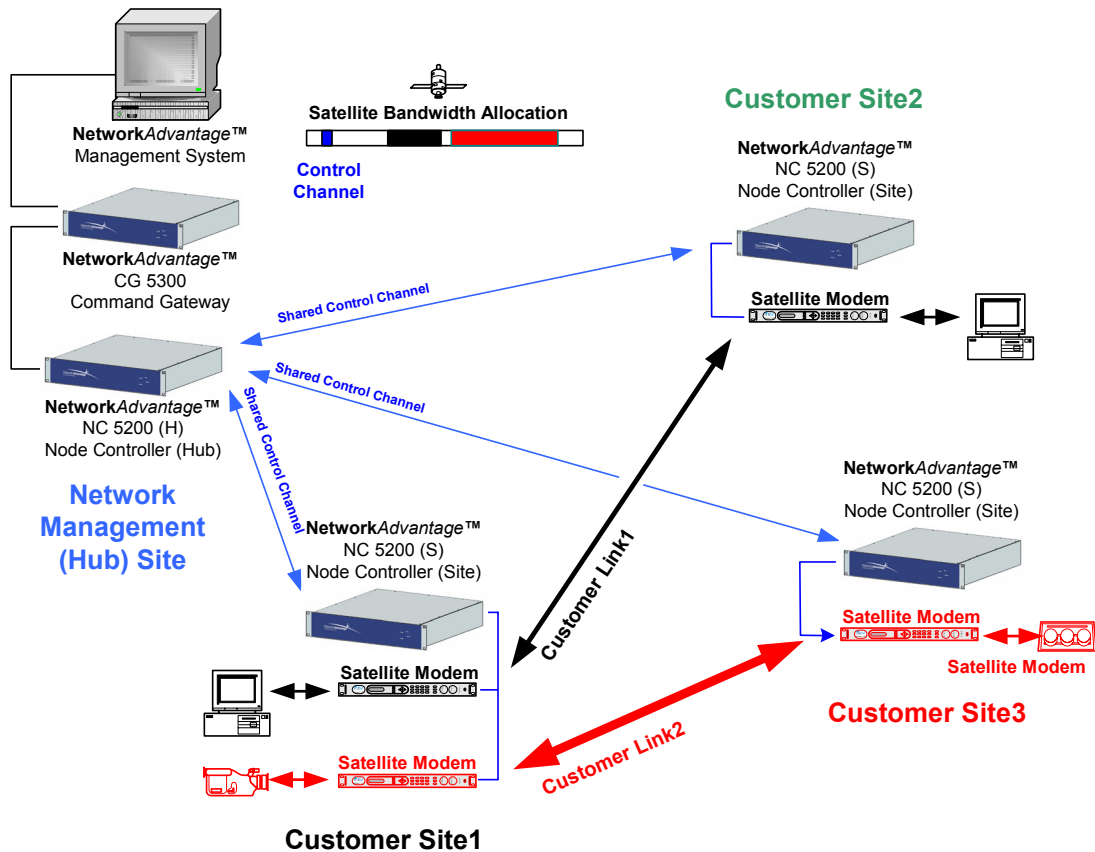


System Overview

NetworkAdvantage™ is the service and bandwidth management solution for satellite data communications networks

Enabling you to:

- **Manage** your satellite bandwidth
- **Quickly and easily bring-up circuits, when needed, for as long as needed, at the bandwidth required, to suit your application!**



BENEFITS	APPLICATIONS
<ul style="list-style-type: none"> • Better utilise your bandwidth • Bandwidth freedom to meet your needs • Flexibility & ease to modify circuit capacity • Save circuit administration time • Improve control of your network • Immediate visibility of network activity 	<ul style="list-style-type: none"> • Multicasting & Streaming • Data Distribution and Large File Transfer • Circuit Restoration • SCADA • Data Storage/Security • Videoconferencing

NetworkAdvantage™

- **Flexibly and dynamically allocates** satellite transmission links opening the door to a number of **new business** opportunities.
- **Removes barriers** to satellite data communications allowing you to meet new market requirements while maximising bandwidth utility.
- **Offers freedom.**

Can NetworkAdvantage™ fit into your existing network?

Yes it can! **NetworkAdvantage™** operates an open system platform and can be retrofitted into installed networks. Drivers are available for a number of common satellite modems.

NetworkAdvantage™ can manage links up to the maximum data rate capability of your satellite data communications traffic network.

How does it work?

Using the **NetworkAdvantage™** Management System, an operator establishes satellite transmission circuits between hub and remote sites as required (creating point-to-point, point-to-multipoint or mesh networks). The Command Gateway allocates bandwidth from the bandwidth pool and assigns frequencies to the remote sites at the appropriate time. The Node Controller at the hub and Node Controllers at remote sites communicate directly with satellite modems to control the transmission and to monitor status. Communication between the hub and remote sites is via a dedicated low bandwidth control channel. Transmission can be established directly between remote sites, without passing via the hub.

NetworkAdvantage™ Management System is the core management software suite and graphical user interface comprising:

- Configuration and administration of Node Controllers, bandwidth availability, transmission schedules and customers.
- Database, storing network & customer information, activity records and logs.
- Bandwidth server, allocating scheduled bandwidth or '**Bandwidth on Demand**'.
- Reports for usage tracking and billing.

Transmission supported:

- One-way – simplex.
- Two way - duplex (symmetrical and asymmetrical).
- Multicast (broadcast).

Overlay:

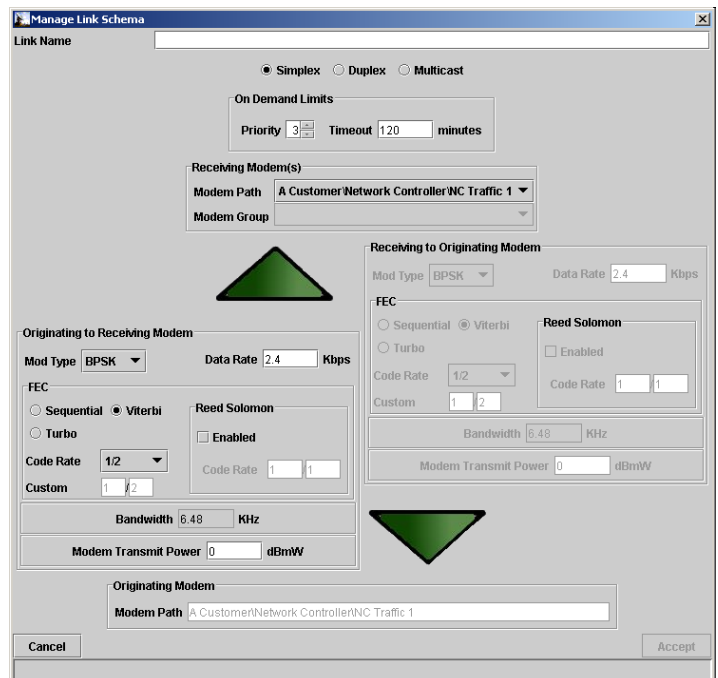
The **NetworkAdvantage™** enhanced management capabilities can be applied to new networks or retrofitted to existing Single Channel Per Carrier (SCPC) networks for improved bandwidth efficiency. Support is available for many industry satellite modems.

Components:

CG 5300 Command Gateway - a computer appliance controlling the core of the managed satellite system. It controls satellite bandwidth allocation and the system database software. In addition to a powerful CPU, the Command Gateway includes a hard drive (in RAID array) for system and satellite data storage, and processes commands received by the graphical user interface computer and the Node Controllers.

NC 5200 (H) Node Controller (Hub) - a dedicated satellite network management and control appliance typically located at the satellite network hub. It is dedicated to communicating with remote Node Controllers via the control channel and controlling satellite traffic modems located at the hub.

NC 5200 (S) Node Controller (Site) - a dedicated satellite network management and control appliance typically located at a remote satellite network termination site, interfacing with local satellite traffic modems. Sporting a powerful CPU and solid state disk, the Node Controller (Site) can manage transmission and monitor status of several traffic modems.



Link Manager