

NEO[®] Modular Platform



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NEO® Modular Platform

The Advanced, Integrated Platform Designed to Grow With Your Business

NEO® is Harris Corporation's premier advanced application modular platform. NEO hosts a vast array of advanced applications designed to offer high performance, high value and a compact form factor, while simultaneously simplifying integration and operational requirements. NEO advanced applications include the award-winning NEO VR digital video recorder, the IconLogo™ branding system and the MTG-3901 master timing generator, as well as a comprehensive selection of NEO Simplicity™ integrated video and audio processing modules. These applications extend the practicality of NEO beyond conventional modular applications.

Flexible Configurations

Available in both 1RU and 3RU frames, NEO allows you to effortlessly configure and re-configure your infrastructure to deliver the functionalities for any combination of analog, SDI and HDTV formats.

Scalable Architecture

With NEO, you can scale your system your way, at your own pace. Any new product can be added to NEO without interfering with other products within the frame. Combine multiple NEO, 6800+™ and X85™/X75™ processing products together using a common control infrastructure.

Local and Remote Control

Control NEO in many ways: right from the card edge using the highly intuitive card-edge control interface; locally at the frame with a front-mounted control panel; and remotely

using the Harris® NUCLEUS™ networking control panel, CCS Navigator™ control and monitoring software or third-party control applications.

Innovative Functionality

NEO modules deliver not only conventional functions such as conversion, synchronization, distribution and monitoring, but also innovative new functionalities such as reference and timing generation, content storage, content branding, contribution quality, audio compression and multisource display processing.

Plug-and-Play Installation

Install the modules into the frame, and connect them into your system. Then take immediate control with the card-edge controls. There is no need for any system configuration to immediately use NEO products.

Card-Edge Interface

NEO has revolutionized the card edge. Beyond providing LEDs for major and minor alarms, each module features a highly legible 64x16 pixel VFD (Vacuum Fluorescent Display) that allows you to not only monitor, but also control all parameters and settings on the card.



Neoscope™

Extend the revolutionary functionality of the NEO platform's card-edge control interface to include hard-level confidence monitoring. Select modules add visual display to the 64x16 pixel VFD interface so you can confirm video signal presence at a glance.



DejaView™

The NEO resource communication module stores the current settings and parameters of each module. When you hot-swap any module, you can instantly restore last-known good parameters without having to manually reset them, ensuring a seamless and accurate swap and minimizing downtime.



Control Panel

The 1RU NEO local control panel provides both local control of NEO modules and remote control of other Command Control System™ (CCS)-enabled devices on your Ethernet network. A similar 1RU remote control panel provides control of all CCS control devices. These include both NEO and 6800+ products and the versatile X85/X75.



Alarms

Alarms for function modules, fans and power supplies display major (red) and minor (yellow) alarms on the card edge, on the front of the frame, on local and remote control panels and on CCS software applications. Rear contact closures can feed into your alarm system to trace alarms to the rack level.



Flexible Connectivity

NEO offers a variety of specific input/output back modules to fit your wiring plan. Any function module can be hot-swapped without having to reconnect any cables.



Power Supply and Cooling

Self-contained, front-swappable, high-efficiency power supply modules plug into both 1RU and 3RU units and operate anywhere in the world. Integrated, front-swappable cooling fans are provided on the 1RU and 3RU models.



Centralized Operations on Ethernet

The NEO platform's Ethernet-ready architecture makes it easy to reduce costs by centralizing your network operations. You'll also be ready for new IP-based applications, such as video over IP. Because all NEO products support CCS protocols, you can use CCS applications and CCS control panels to manage every NEO product from anywhere within your worldwide network. You can even control NEO from third-party control systems using CCS gateways. This advanced, integrated architecture reduces your need for equipment and simplifies your network so you can significantly reduce operating and maintenance costs.

Free Up Valuable Slot Space

NEO means doing more with less. NEO offers innovative module architectures that consolidate functions and use the NEO platform's distributed intelligence features to let modules work together in real time, allowing you to get more functionality from your system design.

Engineer Out Complexity From Your Network

In many organizations, traditional infrastructures have become a tangled environment of mismatched devices and questionable network access that demand constant, costly, hands-on care. NEO is part of a standardized Harris product offering that communicates seamlessly with all the devices on your network — even third-party technology. It keeps your operations running smoothly without downtime.



NEO® Modular Platform

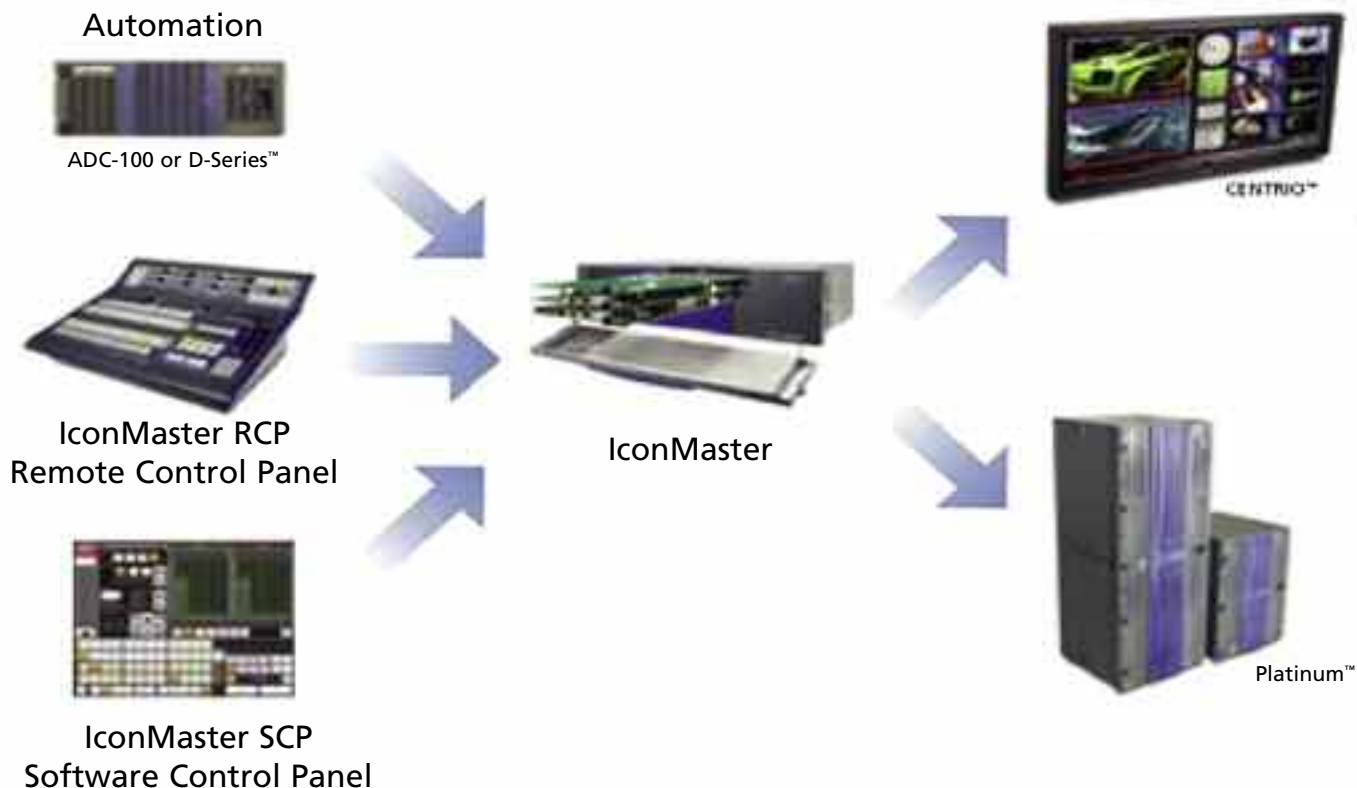
Add New Functionality Beyond the Conventional

NEO modules can handle more than you've dreamed of asking a conventional platform to do: content branding, multisource display processing, reference and timing, content storage and content ingest quality. Let NEO take care of them all, while you find productive new uses for the valuable rack space, workstations and time that NEO frees up for you. Start thinking about NEO as a cost-containment center, and you will appreciate its unconventional value.

Icon Series™ Master Control and Branding Solutions

The master control and branding the market demands requires flexible and sophisticated on-air presentations. The market also requires an advanced, future-proofed family of products that allow broadcasters to meet and surpass the requirements of today's television market. The Icon Series — IconMaster™, IconLogo™ and IconKey™ — is the premiere family of master control and branding products, providing you with the tools to capture your audience's attention, all within the NEO modular platform.

The Icon Series provides HD/SD configurability with the best channel density available. The modularity of the products allows for scalability and flexibility, and integration with other NEO modules for signal conversion, audio manipulation and other critical functions creates a fully customizable master control and channel branding system.



Advanced HDTV Conversion

The NEO XHD-3903 series is the newest in the Harris family of advanced, broadcast-quality HDTV conversion products. NEO XHD-3903 is the ideal solution for up, down and cross conversion — at a very competitive price.

Encompassing 3 Gb/s 1080p high-definition up-, down- and cross-converter modules that perform many of the key functions of the X85/X75 HD in a compact, modular design, the NEO XHD series features fast switching between SD and HD in the input embedded audio pass-through, audio and video synchronization, closed captioning transcoding and optional discrete AES audio support. There are options available for I-WINGS, graphics keying, Dolby® and DTS

Neural Technologies advanced audio processing and a second frame synchronizer. Designed for the broadcast television, news, cable and post production markets, the NEO XHD platform has the extra benefit of enhanced functionality with the addition of any of a comprehensive array of NEO modules, including NEO IconLogo, NEO VR and NEO Simplicity™ products.

In addition to supporting the open and documented CCS Protocol™, the NEO XHD series modules offer optional SNMP support, direct to the frame, with support of both SNMP v1 and SNMP v2c. SNMP support is key for facility-wide monitoring applications and offers an industry-standard interface to address

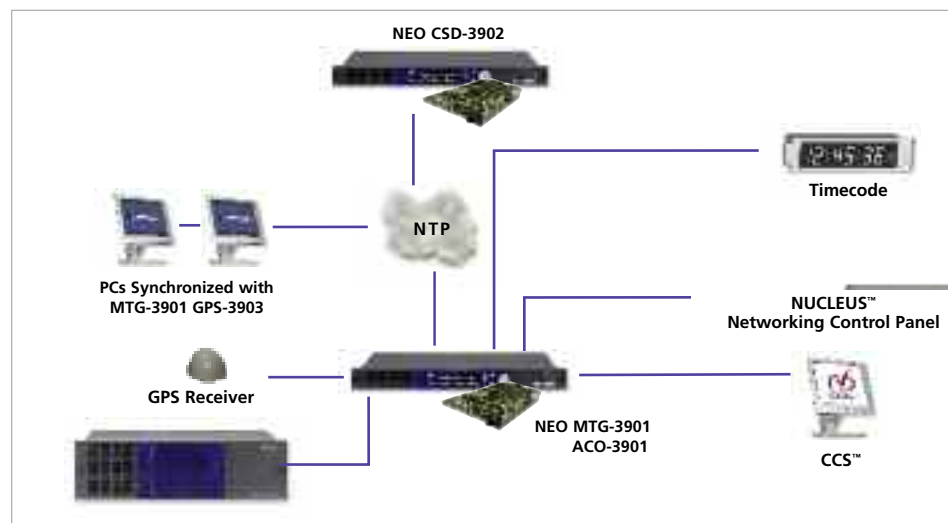
interoperability between multiple vendors.

The NEO XHD series is a complete HDTV platform. Whether you need to perform upconversion, downconversion, cross-conversion or require an all-in-one conversion solution, the NEO XHD platform has the perfect module for every conversion application.



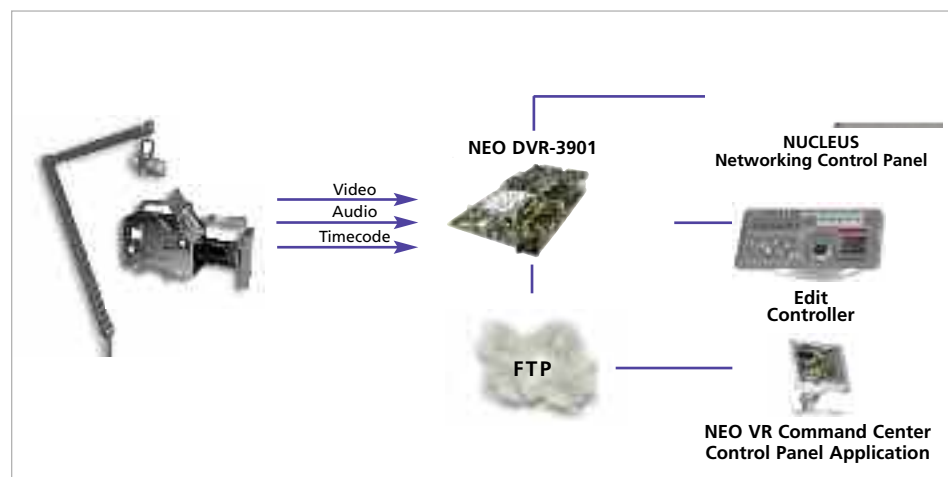
Reference and Timing

NEO offers the TSG-3901 HDTV modular test signal generator, the most advanced modular test signal generator available. The TSG-3901 can simultaneously generate HD-SDI, SDI, analog video, audio and AES test signals while offering maximum reliability with its automatic changeover system. Complementing the TSG-3901 are the MTG-3901 master timing generator, ACO-3901 automatic changeover and CSD-3902 clock system driver, leveraging the inherent performance, reliability and density of the NEO platform and reaffirming Harris Corporation's leadership in reference signal systems.



NEO VR

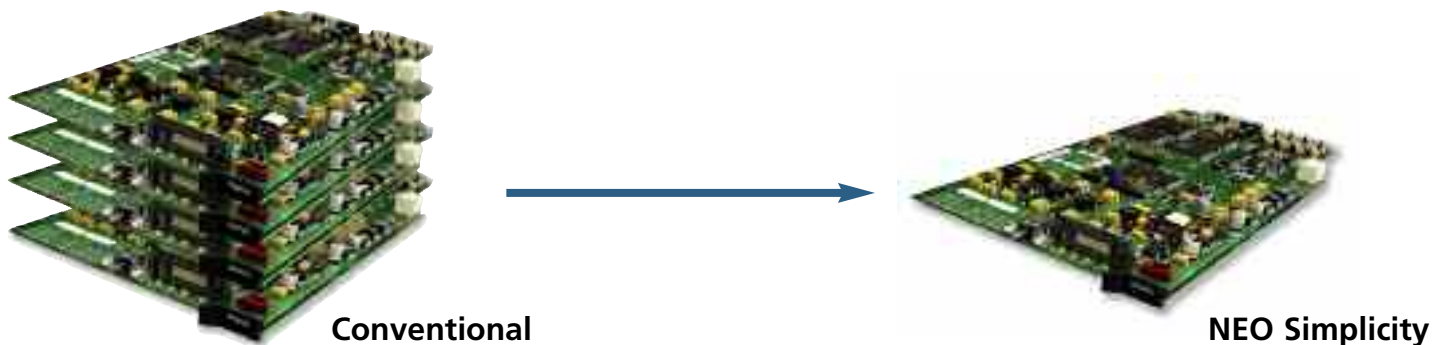
NEO VR is an integrated compression engine and hard drive that allows you to record audio and video feeds with time code. The module features analog and digital interfaces, random access and high-density storage, with a maximum storage capacity of two hours of audio and video at the lowest compression setting. Ethernet connectivity allows you to store and distribute signal information throughout your network. NEO VR is deal for production, master control and mobile environments.



NEO® Modular Platform

Free Up Valuable Slot Space

NEO modules give you all the functionality you need now and in the coming years — but that just begins to explain their value to your operations. NEO offers two advanced module architectures, Simplicity™ and Combo, which dramatically expand functionality while using fewer modules. These synergies allow you to save slot space so you can scale up existing functionality by simply plugging in a new module.



Simplicity

NEO Simplicity modules give you the flexibility to consolidate video and audio synchronization, processing and demultiplexing/multiplexing — all on a single module. This not only frees up slot space and reduces cost, but also maximizes the amount of integrated functionality per frame. A 3RU NEO frame can manage 12 full broadcast signals (video and audio). From this foundation, you can scale up your audio processing capacity for surround sound and multilingual applications.

Video/Audio Simplicity



Video and Audio Combo

NEO® Combo modules are individual audio modules and video modules with additional audio or video functionality that use the NEO platform's built-in communications to automatically synchronize audio to the video signal. This ensures constant lip sync as you scale up your audio processing capacity for surround sound and multilingual applications.

Video
Combo



+

Audio
Combo



Single Function

NEO single-function modules give you conventional functionality plus the advanced functionality you need to process, convert, source select, back-up switch, and monitor signals — from any format, to any format, including analog, digital and high definition. Each NEO module features advanced plug-and-play installation, card-edge interface and flexible, independent back-module connections so you can be up and running fast.

Single-Function Module



Engineer out complexity in your network

NEO is a remarkably intelligent solution. You can plug in new NEO products without updating any device drivers, and all NEO products can be managed on the network with ease through an intuitive software interface. The result is an integrated infrastructure that gives you more real-time control over more components, more easily, by fewer staff. It is a simple concept that gives you powerful control over profitability.

Smarter Operations

Advanced concepts are engineered into NEO to improve operations management so you can maintain higher levels of uninterrupted airtime and lower your operations costs.

Prevent Downtime

- Add a redundant Ethernet resource module as needed. If one fails, the redundant module will switch over automatically and provide notification over the network.
- Add an extra power supply for full backup of fully loaded frames. Notification is provided in case of fan and power supply failure.
- Add NEO backup switchers so that primary feeds of any signal type will switch over to secondary sources upon signal loss or relay bypass on power failure to the frame.



Backup Power Supplies

Identify Problems Earlier

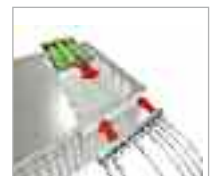
- Resource communications modules allow you to monitor the settings and parameters of each module remotely over Command Control System (CCS) networks.
- Neoscope provides hard confidence monitoring so you can confirm video signal presence at a glance.
- Remote alarms for modules, fans and power supplies are communicated by the resource module over the CCS network.



Neoscope™

Fix Problems Faster

- Advanced card edge features 64x16 pixel fluorescent display and LED indicators with simplified, intuitive control and monitoring.
- DejaView intelligence built into the optional resource communications NEO module lets you hot-swap any module and instantly reset previously set parameters.
- Independent back modules allow you to hot-swap modules without disconnecting cables from the frame.



Module Independence

Keep Ahead of Maintenance Costs

- Every NEO frame is shipped with an integrated Web server as the free device configuration application, which enables operators to upgrade module firmware and set basic network-related configurations.

Advanced Network Control

The NEO platform's smart components can communicate directly with CCS applications so you can control and monitor everything from anywhere. Maintaining the quality of your infrastructure has never been this easy or this fast. Alarm data renders up from the infrastructure into the CCS Navigator. Then, from your workstation, you can drill down through the network and make any adjustment to the module, whether it's on the other side of your building or on the other side of the globe.



ONE Company for Workflow Solutions Throughout the Media Chain

Harris is the ONE company delivering interoperable workflow solutions across the entire media delivery chain — providing today's broadcaster with a single, integrated approach to capitalize on the benefits of IT and mobile applications. By providing unparalleled interoperability across our product portfolio, Harris is able to offer customers integrated solutions that improve workflows, save money, enable new revenue streams and provide a migration path to emerging media business models. To meet the evolving needs of broadcast, distribution, government agencies and entertainment businesses, Harris is the ONE answer for change.

Service And Support

At Harris, we are committed to customer service excellence. It is our goal to provide the highest level of support by applying a simple rule: We take ownership of helping our customers succeed. Our support teams consist of innovative technical experts who support all situations regarding product performance, integration and operational processing. We are adept at providing proven solutions, making workflows better and ensuring reliability of the product and system. At Harris, our experienced and dedicated teams stand ready to help you meet your goals for premium product performance, 100% up-time and reduced maintenance investment.

Warranty

Because we want to assure you that Harris stands beside its products and system solutions, our products carry a standard set of warranty services, which are competitive with — and in some cases outperform — others in the industry.

Service Packages

We offer value-add services that allow you to customize the level of services you need in meeting mission-critical performance levels. Our service package options offer many ways to upgrade your standard warranty by choosing the All-Inclusive OnePak, or by selecting individual services from our extensive portfolio. Our service and support advisors can assist in the selection of the individual services that best suit your requirements.

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For more information, please visit www.broadcast.harris.com/neo.

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