

# AURORA INGEST

## INGEST MANAGEMENT SYSTEM



**System Guide**  
Software Version 7.0



Affiliate with the N.V. KEMA in The Netherlands



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# AURORA INGEST

## INGEST MANAGEMENT SYSTEM

**System Guide**  
Software Version 7.0

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# Grass Valley Product Support

To get technical assistance, check on the status of a question, or to report a new issues, contact Grass Valley Product Support via e-mail, the Web, or by phone or fax.

## Web Technical Support

To access support information on the Web, visit the product support Web page on the Grass Valley Web site. You can download software or find solutions to problems.

**World Wide Web:** <http://www.grassvalley.com/support/>

**Technical Support E-mail Address:** [gvgtechsupport@grassvalley.com](mailto:gvgtechsupport@grassvalley.com)

## Telephone Support

Use the following information to contact Product Support by phone.

## International Support Centers

Our international support centers are available 24 hours a day, 7 days a week.

Support Center	Toll free	In country
France	+800 80 80 20 20	+33 1 48 25 20 20
United States	+1 800 547 8949	+1 530 478 4148

## Authorized Local Support Representative

A local support representative may be available in your country. To locate a support center during normal local business hours, refer to the following list. This list is regularly updated on the website for Grass Valley Product Support

(<http://www.grassvalley.com/support/contact/phone/>)

After-hours local phone support is also available for warranty and contract customers.

Region	County	Telephone
Asia	China	+86 10 5883 7575
	Hong Kong, Taiwan, Korea, Macau	+852 2531 3058
	Japan	+81 3 6848 5561
	Southeast Asia - Malaysia	+603 7492 3303
	Southeast Asia - Singapore	+65 6379 1313

<b>Region</b>	<b>County</b>	<b>Telephone</b>
Pacific	India	+91 22 676 10300
	Australia	1 300 721 495
	New Zealand	0800 846 676
	For callers outside Australia or New Zealand	+61 3 8540 3650
Central America, South America	All	+55 11 5509 3440
North America	North America, Mexico, Caribbean	+1 800 547 8949; +1 530 478 4148
Europe	UK, Ireland, Israel	+44 118 923 0499
	Benelux – Netherlands	+31 (0) 35 62 38 421
	Benelux – Belgium	+32 (0) 2 334 90 30
	France	+800 80 80 20 20; +33 1 48 25 20 20
	Germany, Austria, Eastern Europe	+49 6150 104 444
	Belarus, Russia, Tadjikistan, Ukraine, Uzbekistan	+7 095 258 09 20; +33 (0) 2 334 90 30
	Nordics (Norway, Sweden, Finland, Denmark, Iceland)	+45 40 47 22 37; +32 2 333 00 02
	Southern Europe – Italy	Rome: +39 06 87 20 35 28 ; +39 06 8720 35 42. Milan: +39 02 48 41 46 58
	Southern Europe – Spain	+34 91 512 03 50
	Switzerland	+41 56 299 36 32
	Middle East, Near East, Africa	Middle East
Near East and Africa		+800 80 80 20 20; +33 1 48 25 20 20

# Chapter 1

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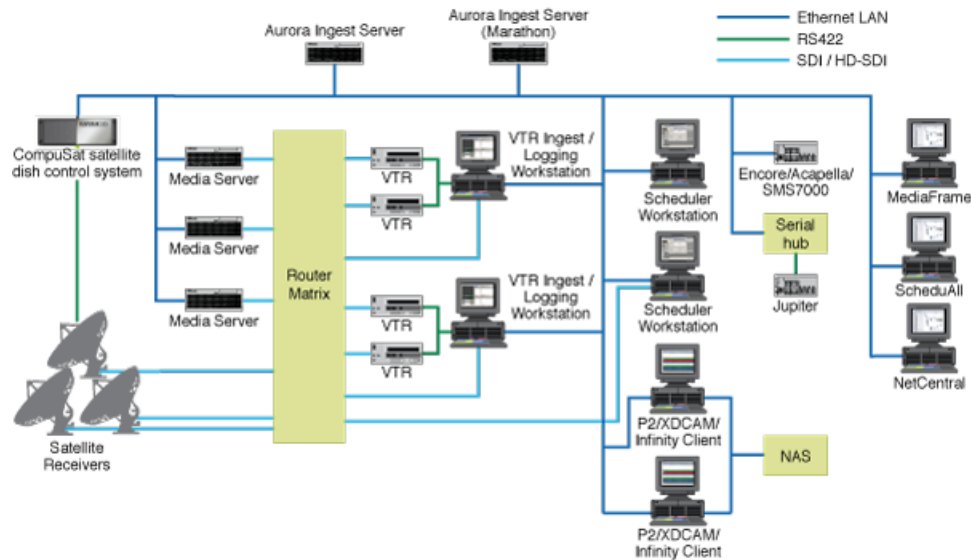
## ***Introducing Aurora Ingest***

This section contains the following topics:

- *Introducing Aurora Ingest*
- *About Aurora Ingest workstations*
- *About Aurora Ingest applications*
- *Integration with Aurora Suite and third-party products*
- *Understanding Status Colors*

## Introducing Aurora Ingest

Aurora Ingest is an automated media digitization system, made up of several integrated applications, that allows you to ingest footage from VTRs, feeds from a router, or files from multiple Digital Media Cameras and Digital Media Recorders, all directly to a media server in your operation.



The Aurora Ingest system supports the K2 Media Server and Media Client system, K2 Summit Production Client system and M-Series iVDR (Intelligent Video Disk Recorder). You can configure your system to record clips into two servers in parallel. If one server fails or has inadequate storage, only the recording on that server will be stopped. When the system continues to the next clip, the storage capacity on both servers is checked again, allowing parallel recording to resume if storage is made adequate.

Raw footage comes from a VTR connected directly to the Aurora Ingest workstation, a CompuSat satellite dish control system, a router source or a removable media device. While you connect the media servers to the Aurora Ingest workstation using AMP Sockets, you need RS-422 connection from the VTR to the Aurora Ingest workstation to have control of the VTR in the Aurora Ingest windows. For router sources, Aurora Ingest supports the SMS 7000, Acappella, Encore control and Jupiter systems. For removable media, Aurora Ingest supports devices such as Infinity, Panasonic P2, Sony XDCAM and JVC.

The integration of MediaFrame with Aurora Ingest adds asset management feature and metadata capabilities to the system. With MediaFrame asset management tools, users can apply, add, edit and search metadata of assets created within the ingest process. Users can also play low-resolution video versions of ingested assets. Aurora Ingest Server monitors the connection to the MediaFrame server, displays the connection status and attempts to reconnect when the connection is broken. MediaFrame

components are also utilized in Aurora Ingest components such as Scheduler, VTR Ingest and RMI.

## **About Aurora Ingest workstations**

Aurora Ingest has a client/server architecture that allows for multiple simultaneous users. It supports simultaneous event creation, event modification, event deletion, event monitoring, and resource viewing from multiple workstations.

Each workstation can control up to eight VTRs for batch list creation and batch ingest. You can work with either directly attached VTRs and dedicated server ports or through a router.

You can trigger multiple channel records from disparate sources simultaneously and schedule record events without reference to physical server port. Aurora Ingest automatically allocates any available port as determined at the optimum time before the record event is scheduled to begin. RS-422 router level control allows any router-connected VTR to be controlled by any Aurora Ingest channel.

## **About Aurora Ingest applications**

Aurora Ingest consists of the following applications:

- Aurora Ingest Server lets you configure the other Aurora Ingest applications for batch or feed events, as well as monitor the status of the media servers, database server, MediaFrame server, routers, CompuSat satellite dish control system, and channels. You can also access logs and manage user accounts for Aurora Ingest clients.
- VTR Controller lets you monitor and manage the VTRs you use with VTR Ingest.
- VTR Ingest lets you ingest footage from VTRs and import or export Edit Decision Lists (EDLs). Supporting up to eight channels, VTR Ingest can record footage with configurable handle durations. It lets you set VTR mark points using either the PC keyboard or the mouse. You can ingest a single item or build a batch list of items to capture from multiple tapes. You can also create a batch list offline and then import the list into VTR Ingest as a common EDL. Once you create a batch list, you can optimize the list by timecode, which allows the material to be ingested in the shortest time possible, or manually arrange the batch list items in order to prioritize immediately needed clips.
- Scheduler lets you schedule ingest feed events from a media server, CompuSat satellite dish control system, VizuAll Inc.'s ScheduALL application, router source or VTR. You can also schedule events to record, up to three years in advance, on each server channel, including recurring events. Schedule Viewer provides an easily readable way to see all channels and more specifically the task assigned to each channel.

- Removable Media Interface (RMI) lets you ingest files from multiple Infinity Digital Media Cameras and Digital Media Recorders, as well as Sony XDCAM and Panasonic P2 removable media devices.

If you use Aurora Playout as a playback system in your operation, you can ingest clips directly to an Aurora Playout rundown by linking clips to an Aurora Playout placeholder at the point of scheduling a record or importing a removable media.

## Integration with Aurora Suite and third-party products

Aurora Ingest is integrated with other applications in the Aurora Suite and third-party products.

In addition to serving as a metadata entry and transfer application for metadata created in the newsroom computer system (NCS), it supports:

- Mark In/Out of incoming feed material, allowing direct assignment of field-edited material to Aurora Playout placeholders.
- Add, apply, search, edit metadata of assets and play low-resolution video versions of ingested assets via the MediaFrame plug-in, an asset management tool utilized by all products within Aurora Suite.
- Scheduling integration with Vizual, Inc.'s ScheduALL application, enabling events scheduled on Aurora Ingest to appear on ScheduALL and vice versa.

## Understanding Status Colors

Each event entry displays a certain color according to its status.

Row Background Color	Description
Red	The entry is recording.
Gold	The entry is cued and is next to record.
Green	The entry has finished recording.
Blue	The Scheduler entry is ready to record.
Black	The channel is reserved for a specific recording at that time.
Purple	The entry failed to record. See the Error Message field for more information.
Gray	The entry time has elapsed, probably due to a conflict with another recording.

Users can customize status color of events in Aurora Ingest - Scheduler by changing the color configuration in the Scheduler application.

## ***Preparing for installation***

This section contains the following topics:

- [\*Installing Aurora Ingest\*](#)
- [\*About SiteConfig\*](#)
- [\*Aurora Ingest installation checklists\*](#)

## Installing Aurora Ingest

Grass Valley supplies a CD containing Aurora Ingest software and documentation. For some of the Aurora Ingest components, Grass Valley also supplies hardware.

The Aurora Ingest - Server can be supplied with all the necessary hardware and software installed. The software for the other Aurora Ingest components can be installed on any PC which meets the system requirement for that component. After installing Aurora Ingest, the software license number needs to be obtained. Refer to *Aurora Ingest Release Notes* for instructions on obtaining the software license number.

For initial install of Aurora Ingest within your operation, SiteConfig is the recommended tool for network configuration and software deployment. For upgrading Aurora Ingest from a previous version, you can either upgrade using SiteConfig or upgrade manually using the Aurora Ingest CD. Refer to *Aurora Ingest Release Notes* for detailed instructions on upgrading Aurora Ingest.

## About SiteConfig

ProductFrame is an integrated platform of tools and product distribution processes for system installation and configuration. SiteConfig is a ProductFrame application and it is the recommended tool for network configuration and software deployment.

You can use SiteConfig as a stand-alone tool for planning and system design, even before you have any devices installed or cabled. You can define networks, IP addresses, hostnames, interfaces, and other network parameters. You can add devices, group devices, and modify device roles in the system.

As you install and commission systems, SiteConfig runs on the control point PC. It discovers devices, configures their network settings, and manages host files. SiteConfig also manages software installations and upgrades and provides a unified software package with verified compatible versions for deployment across multi-product systems.

You should use SiteConfig for network configuration and software deployment at installation and throughout the life of the system in your facility. This enforces consistent policy and allows SiteConfig to keep a record of changes, which makes the system easier to maintain and aids in troubleshooting should a problem arise.

SiteConfig displays information from a system description file, which is an XML file.

SiteConfig operates in different modes that correspond to a system's life-cycle phases: network configuration, software deployment, and software configuration. You can expand nodes and select elements in the tree view and the list view to view and modify networks, systems, individual devices, software deployment, and configuration settings.



## Aurora Ingest installation checklists

Use the following sequence of checklists to guide the overall task flow of installing and commissioning an Aurora Ingest system.

### Pre-installation planning checklist with SiteConfig

Task	Comment
<input type="checkbox"/> Get the Aurora Ingest Software CD	—
<input type="checkbox"/> Check hardware specification requirements for Aurora Ingest components	The minimum and recommended system specification requirements are listed in <i>Aurora Ingest Release Notes</i>
<input type="checkbox"/> Install SiteConfig on a control point PC within your network operation	Before you install SiteConfig, you would need to create a system description for the system if there isn't one already installed
<input type="checkbox"/> Get Grass Valley software prerequisite file	Make the prerequisite file accessible to the SiteConfig control point PC
<input type="checkbox"/> Get Aurora Ingest software installation (*.cab) file	Make the (*.cab) file accessible to the SiteConfig control point PC
<input type="checkbox"/> Get GVG_MLib (*.cab) file for Aurora Ingest Server installation	Make the (*.cab) file accessible to the SiteConfig control point PC
<input type="checkbox"/> Get GVG_MLib, Generic iSCSI and Aurora Suite (*.cab) files for RMI installation	Make those (*.cab) files accessible to the SiteConfig control point PC
<input type="checkbox"/> Next: Hardware installation checklist	

### Hardware installation checklist

Use items in this checklist as appropriate for the optional equipment you are installing for your Aurora Ingest.

Task	Comment
<input type="checkbox"/> Install RS-422 card for VTR Controller	Alternately, a VTR can be attached to the VTR Controller PC's COM1 port using an RS-422 to RS-232 cable.
<input type="checkbox"/> Install video capture card	—
<input type="checkbox"/> Install X-keys Jog/Shuttle Controller	—
<input type="checkbox"/> Next: Network setup and installation checklist	

## Network setup and implementation checklist

Task	Comment
<input type="checkbox"/> Add corporate LAN to system description	Create a new system description, if you don't have one. If you have K2 SAN within your operation, modify your K2 SAN system description.
<input type="checkbox"/> Add a group for your Aurora Ingest devices to the system description	—
<input type="checkbox"/> Add a placeholder device to the system description for each of your actual Aurora Ingest devices	—
<input type="checkbox"/> Configure the names of the placeholder devices	—
<input type="checkbox"/> Configure the network interfaces of the placeholder devices	Specify IP address ranges and other network details
<input type="checkbox"/> Discover your Aurora Ingest devices	—
<input type="checkbox"/> Assign each discovered device to its placeholder device	—
<input type="checkbox"/> For each discovered and assigned device, edit each network interface. Specify network settings and apply them to the device.	If a device connects to multiple networks, set the control network interface IP address first. Also set the hostname.
<input type="checkbox"/> If not already set correctly, set the hostname of discovered devices	Make sure the device name is correct, then make the hostname the same as the device name.
<input type="checkbox"/> Ping each Aurora Ingest device to test network communication	—
<input type="checkbox"/> Generate host table information and distribute to hosts files on each device and on the control point PC	Make sure you have completed network configuration of all network interfaces across all devices to ensure complete and valid host table information. You can use SiteConfig to copy hosts files to devices, or you can manage hosts files yourself.
<input type="checkbox"/> Next: Software update checklist	

## Software update checklist

<b>Task</b>	<b>Comment</b>
<input type="checkbox"/> Add/remove software roles	Make sure software roles match the software that should be installed on each device, according to your system design.
<input type="checkbox"/> Create a deployment group	—
<input type="checkbox"/> Add Aurora Ingest devices to the deployment group	—
<input type="checkbox"/> Place software on control point PC	Procure the correct version of software installation files and prerequisite files.
<input type="checkbox"/> Check software on devices	Refer to the release notes for your product.
<input type="checkbox"/> Add software to deployment group	
<input type="checkbox"/> Set deployment options	
<input type="checkbox"/> Upgrade/install software to devices from control point PC	



# Chapter **3**

---

## ***Installing Aurora Ingest Hardware***

This section contains the following topics:

- *Installing RS-422 card for VTR Controller*
- *Installing video capture card (optional)*
- *Installing the X-keys Jog/Shuttle Controller*

## Installing RS-422 card for VTR Controller

For VTR Controller, Grass Valley supplies a RocketPort Plus Universal PCI 422 SMPTE 8 Port RoHS RS-422 card that must be installed.

1. If you are connecting one or more VTRs to VTR Controller, install the RS-422 card in your computer, making sure the dip switches are set to the down position as shown, and install the card's driver.



**NOTE:** *If only one VTR is to be connected to a VTR Controller PC, you can use an alternative connection method with an RS-422 to RS-232 cable connected to the onboard COM1 port.*

2. Connect the VTR(s) to the VTR Controller machine via RS-422.
3. If you are using LTC for timecode, connect a timecode cable from the timecode source (VTR for VTR Ingest, Timecode Generator for Aurora Ingest - Scheduler) to the media server.
4. Without the LTC physical connection, timecodes could still be polled via RS-422. Check the option to enable RS-422 timecode mode within Tools|Options of VTR Controller application.

## Installing video capture card (optional)

You can either install Hauppauge WinTV-HVR-1150 Video Capture Card or Blackmagic Design DeckLink Video Capture Card to view clips on Aurora Ingest clients. Check for minimum system requirements needed before choosing and purchasing your video capture card.

Both video capture cards are for SD (standard definition) video only. If you want to view incoming HD video, first downconvert the media from HD to SD.

For Hauppauge WinTV-HVR-1150 video capture card, you have to then convert from digital to analog. The video capture card accepts composite analog video only (NTSC or PAL).

For Blackmagic Design DeckLink video capture card, SDI input and output with embedded audio are supported. For audio monitoring, you could also connect SPDIF output to your audio peripheral.

1. Install the video capture card in your machine and install the card's driver. Refer to the manufacturer's manual for installation instructions.

2. For Hauppauge WinTV-HVR-1150 video capture card, connect the device you're using for a video source (VTR, router or switch box) to the Hauppauge composite video input connector.
3. For Blackmagic Design DeckLink video capture card, connect SDI Output from your media server or router to SDI Input connector of the video capture card.
4. If you have a video capture card installed in your machine and a router configured in your system, select the router destination from the dropdown list within **Tools|Options|Video Viewer** of the Scheduler or VTR Ingest.

After the video capture card has been successfully configured, it could be selected from the Capture Device dropdown list within **Tools|Options|Video Viewer** of the Scheduler or VTR Ingest.

## **Installing the X-keys Jog/Shuttle Controller**

You can install the X-keys Jog/Shuttle controller if you want to use the device with Aurora Ingest Scheduler.

Aurora Ingest has been designed to work with the X-keys Jog/Shuttle controller (model XPS-08-USB) with MWII panels.

1. Plug the X-keys Jog/Shuttle controller into a USB connector on the Scheduler machine.
2. On the Scheduler machine, insert the X-keys Macro Works installation CD and follow the instructions. Do not check the box to put shortcuts on the desktop.

If AutoRun is not enabled on your CD-ROM drive, find the file "ainstall.exe" on the installation CD and run it.

3. Reboot the computer when prompted.
4. When the installation has completed, the X-keys Macro Maker and Macro Manager windows automatically pop up. Close these windows.
5. Start Aurora Ingest Server and Aurora Ingest Scheduler.
6. In the Scheduler Tools menu, select **Options**.
7. Select the **X-keys** tab.
8. Verify the "Enable X-keys" box is checked and click **OK**.

You can customize the X-keys to suit your needs.





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## **Configuring the network**

This section contains the following topics:

- *About developing a system description*
- *About the corporate LAN*
- *Configuring the corporate LAN*
- *Adding a group*
- *Adding a device to the system description*
- *About device and host names*
- *Modifying a device name*
- *About IP configuration of network interfaces on devices*
- *Modifying unassigned (unmanaged) network interfaces on Aurora Ingest devices*
- *About SiteConfig support on Aurora Ingest devices*
- *Discovering devices with SiteConfig*
- *Assigning discovered devices*
- *Modifying Aurora Ingest device managed network interfaces*
- *Making the host name the same as the device name*
- *Pinging devices from the control point PC*
- *About hosts files and SiteConfig*
- *Generating host tables for devices with SiteConfig*

## About developing a system description

The topics in this manual assume that you are modifying an existing system description. Your system description is typically developed using one of the following taskflows:

- For a system in which all devices are new from Grass Valley with one or more K2 SANs, you first create a system description for your K2 SAN or SANs, then add Browse/MediaFrame, Edit, Ingest, and Playout devices as appropriate. Refer to the *K2 SAN installation and Service Manual* for instructions on creating the system description.
- For a system in which all devices are new from Grass Valley with one or more stand-alone K2 systems, you first create a system description and add your stand-alone K2 systems, then add other devices as appropriate. Refer to the *K2 System Guide* for instructions on creating the system description and adding your stand-alone K2 systems.
- For a system with existing devices running earlier software, you must first migrate the system to become a SiteConfig managed system. Refer to *SiteConfig Migration Instructions* for instructions on migrating your devices to be SiteConfig managed devices.

If you are using a different taskflow, use the topics in this manual as appropriate and refer to the *SiteConfig User Manual* or *SiteConfig Help Topics* for additional information.

Your devices must be in a SiteConfig system description in order to be managed by SiteConfig. When you already have a system description in place, you should use SiteConfig to modify this system description and add your devices. You can do this in your planning phase, even before you have devices installed or cabled. Your goal is to have the SiteConfig system description accurately represent all aspects of your devices and networks before you begin actually implementing any networking or other configuration tasks for those devices.

## About the corporate LAN

Devices such as the Aurora Ingest Server, Scheduler, RMI, VTR Controller and VTR Ingest workstations can be on the corporate LAN, which is considered an unmanaged network in SiteConfig. You can configure your system description to include the corporate LAN for the following purposes:

- If a device, such as the Aurora Ingest Server, is on the corporate LAN yet is a SiteConfig managed device, then SiteConfig needs to know the connection for each network interface on the device, including the corporate LAN connection. Otherwise, SiteConfig displays error messages.
- If a device uses a DNS server on the corporate LAN for name resolution, SiteConfig needs to reference that DNS server.

- If a device has software that SiteConfig supports and the device is on the corporate LAN, such as Scheduler, RMI, VTR Controller and VTR Ingest workstations, you can use SiteConfig to deploy software to the device via the corporate LAN.

If the device is on the corporate LAN and is not on a network that is managed by SiteConfig, you cannot configure network settings on the device.

## Configuring the corporate LAN

1. In the **Network Configuration | Networks** tree view, select a System node or a Site node.

The networks under that node are displayed in the list view.

2. Proceed as follows:
  - To add a network under the currently selected node, in the tree view right-click the node and select **Add Network**.

The Network Settings dialog box opens.

3. Configure the settings for the network as follows:
  - Type – Select Ethernet
  - Usage – Select Control
  - Redundancy – Select None
  - Name – Enter a name to identify the network in the system description
  - Exclude from Host Files – Select the checkbox
  - Unmanaged – Select this option, then select DNS and select the checkbox for IP Address Allocation via DHCP.
  - Base IP Address – Do not configure
  - Number of IP Addresses – Do not configure
  - Subnet Mask – Do not configure
  - DNS Servers – Servers providing DNS for name resolution. These DNS server can be for both managed and unmanaged networks.
  - Default Interface Name Suffix – The suffix added to the end of host names to identify interfaces on this network.
4. Click **OK** to save settings and close.
5. If you added a network, it appears in the **Network Configuration | Networks** tree view at the bottom of the list.

## Adding a group

1. In the **Network Configuration | Networks** tree view, right-click a site node and select **Add Group**.

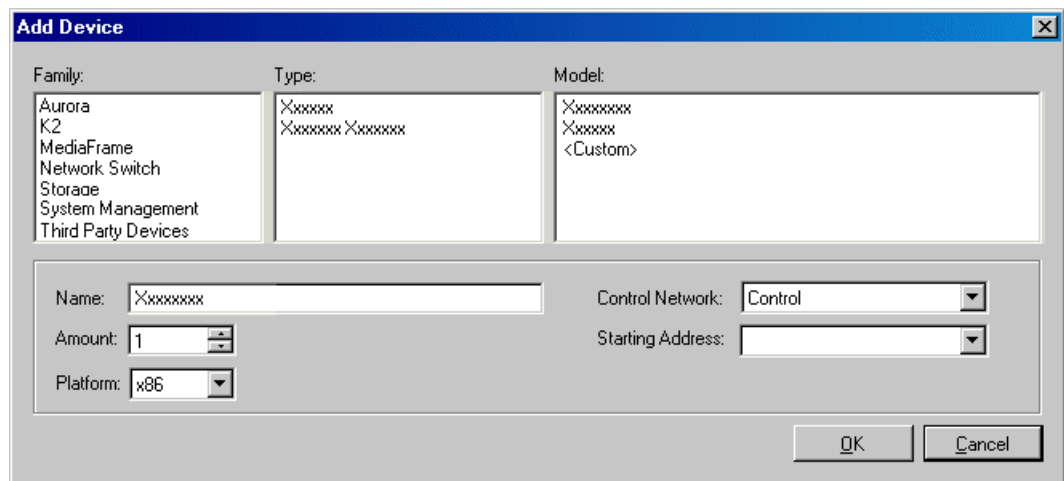
The group appears in the tree view.

2. Right-click the group and select **Rename**.
3. Enter the desired name for the group.

## Adding a device to the system description

Prerequisites for this task are as follows:

- The system description contains a group.
1. In the **Network Configuration | Devices** tree view, right-click a group and select **Add Device**.



The Add Device dialog box opens.

2. Configure settings for the device you are adding as follows:
  - Family – Select **Aurora**.
  - Type – Select **Aurora Ingest Platform**.
  - Model – Select the appropriate Aurora Ingest components.
  - Name – This is the device name, as displayed in the SiteConfig device tree view and device list view. This name can be different than the host name (network name). You can accept the default name or enter a name of your choice. Devices in the tree view are sorted alphabetically.
  - Amount – You can add multiple devices, as currently defined by your settings in the Add Device dialog box. An enumerator is added to the name to create a unique name for each device added.
  - Control network – Select the control network.

- **Starting Address** – Select from the list of available addresses on the selected control network. If adding multiple devices, this is the starting address, with addresses assigned sequentially to each device added.
3. Click **OK** to save settings and close.
  4. Repeat these steps for each of your devices.

## About device and host names

In SiteConfig, a device can have different names, as follows:

- **Device name** — This is a name for display in SiteConfig only. It is stored in the SiteConfig system description, but not written to the actual device. It is displayed in the device tree view and in the device list view. It can be a different name than the device's host name.
- **Host name** — This is the network name of the device. SiteConfig has a default naming convention for host names which you can use or override with your own host names.

In most cases it is recommended that the Device name and Host name be the same. This avoids confusion and aids troubleshooting.

The Device name can serve as a placeholder as a system is planned and implemented. During the install/commission process, when you reconcile a device's current and planned network interface settings, the Host name as configured in the system description can be overwritten by the host name on the actual device. However, the Device name configured in the system description is not affected. Therefore it is recommended that in the early planned stages, you configure the Device name to be the desired name for the device, but do not yet configure the Host name. Then, after you have applied network interface settings, you can change the Host name to be the same as the Device name. This changes the host name on the actual device so that then all names are in sync.

SiteConfig does not allow duplicate device names or host names.

Items in the tree view are automatically sorted alphabetically, so if you change a name the item might sort to a different position.

## Modifying a device name

1. In the **Network Configuration | Devices** tree view, right-click a device and select **Rename**.
2. Type in the new name.

Note that this does not change the hostname on the physical device. If you want the hostname to match the device name, you must also modify the hostname.

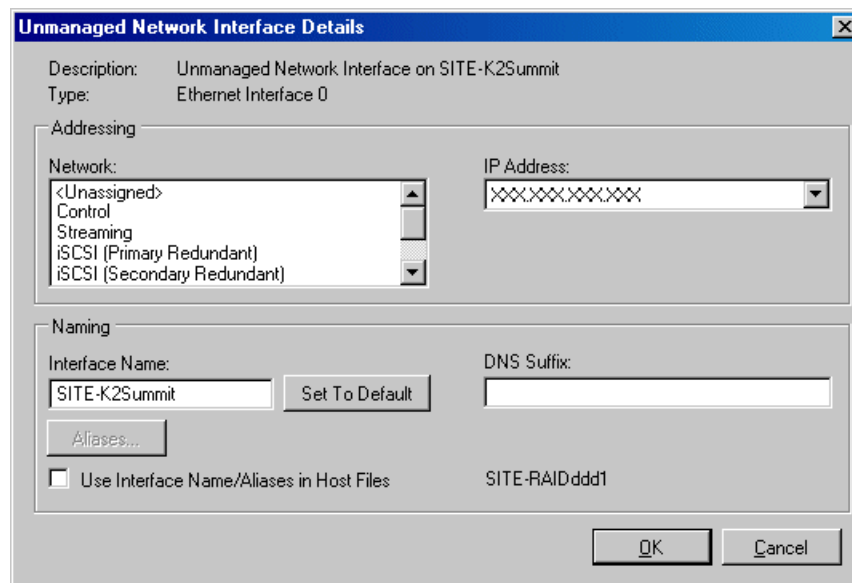
## About IP configuration of network interfaces on devices

You can perform IP configuration of network interfaces when working with a placeholder device prior to discovery. When you add a device and choose a particular model, the model defines the number, type and usage characteristics of network interfaces to expect on such a device.

You can view and edit each network interface and set up IP configuration selecting an appropriate IP from the network to which each interface connects. The process for editing IP configuration varies, depending on the device's phase.

### Placeholder device IP configuration

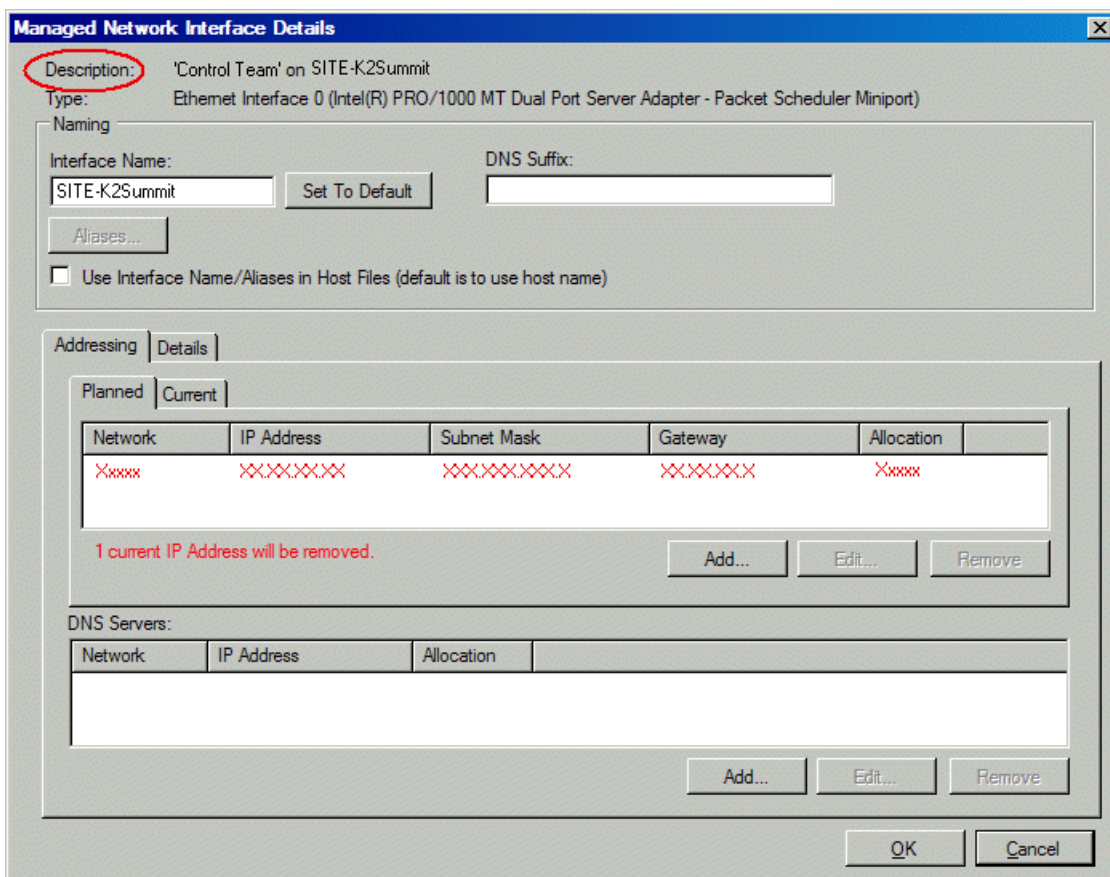
On a placeholder device, you edit network interfaces using the Unmanaged Network Interfaces dialog box.



The Unmanaged Network Interfaces dialog box allows you only to save changes to the system description.

### Discovered device IP configuration

On a discovered device, you edit network interfaces using the Managed Network Interfaces dialog box.



The Managed Network Interfaces dialog box allows you to edit and save changes to the device.

## Modifying unassigned (unmanaged) network interfaces on Aurora Ingest devices

Prerequisites for this task are as follows:

- The system description has one or more Aurora Ingest devices that are placeholder devices.
- The placeholder device has a one or more unmanaged network interfaces.

Use this task to modify unmanaged network interfaces on Aurora Ingest devices as follows:

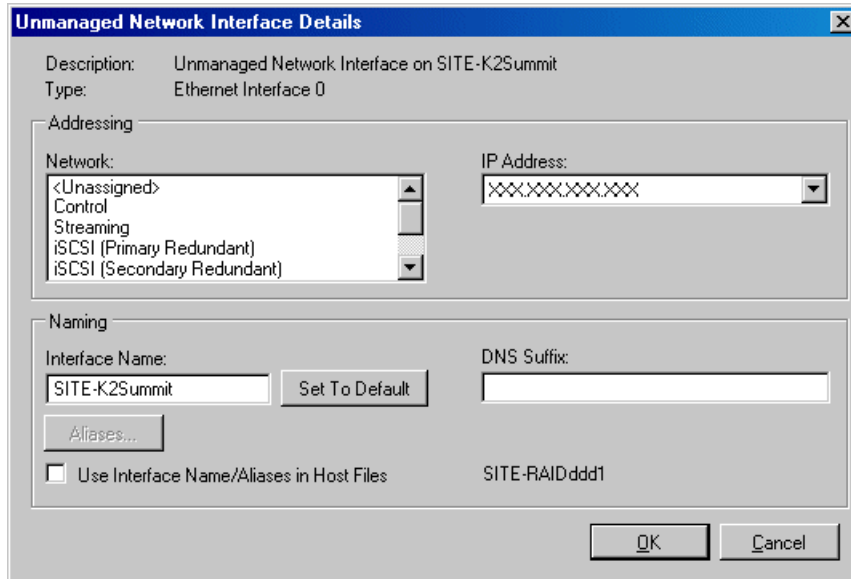
- Aurora Ingest Server
- RMI
- RS 422 Control of VTRs
- Scheduler
- VTR Ingest

1. In the **Network Configuration | Devices** tree view, select an Aurora Ingest placeholder device.

The interfaces for that device are displayed in the interfaces list view.

2. In the interfaces list view, right-click an interface and select **Edit**.

The Unmanaged Network Interface Details dialog box opens.



3. Configure the settings for the interface as follows:

Setting...	For control network interface
Network	<i>Control</i> is required
IP Address	The IP address for this interface on the network. Required.
Interface Name	The device host name. Required.
Set to Default	Not recommended. Sets the interface name to SiteConfig default convention, based on the root Site name and device-type.
Use Interface Name/Aliases in Host Files	<i>Unselected</i> is required. Since not selected, the default behavior occurs, which is to use the device host name in the hosts file.
Aliases	Not allowed
DNS Suffix	Allowed, if applicable to the network. The DNS suffix is added to the interface name.



4. Click **OK** to save settings and close.
5. If configuring an Aurora Ingest device that is also on the corporate LAN, repeat steps to configure an interface for the corporate LAN, with settings as follows:

Setting...	For corporate LAN network interface
Network	If using DHCP or external hosts file, select the unmanaged network that you configured earlier.
IP Address	Select the IP address you plan to assign to the device.
Interface Name	These settings are irrelevant, as SiteConfig does not manage this network.
Set to Default	
Use Interface Name/Aliases in Host Files	
Aliases	
DNS Suffix	For communication on some networks, a suffix, such as <i>mycorp.com</i> , must be added to host names.

6. Click **OK** to save settings and close.

## About SiteConfig support on Aurora Ingest devices

Before SiteConfig can be used to discover or manage a device, the device must meet the following requirements:


- The device must be a Microsoft Windows operating system device.
- The device must have Microsoft .NET version 2.0 installed, as reported in the Windows Add/Remove Programs control panel.
- The ProductFrame Discovery Agent service must be running on the device, as reported in the Windows Services control panel.

For Aurora Ingest devices shipped new from Grass Valley with software version 6.5.2 or higher, these requirements are pre-installed. These requirements are pre-installed on recovery images for these systems as well. Therefore, if you suspect a problem with these requirements, do not attempt to install SiteConfig support requirements. If you must restore SiteConfig support requirements, re-image the system.

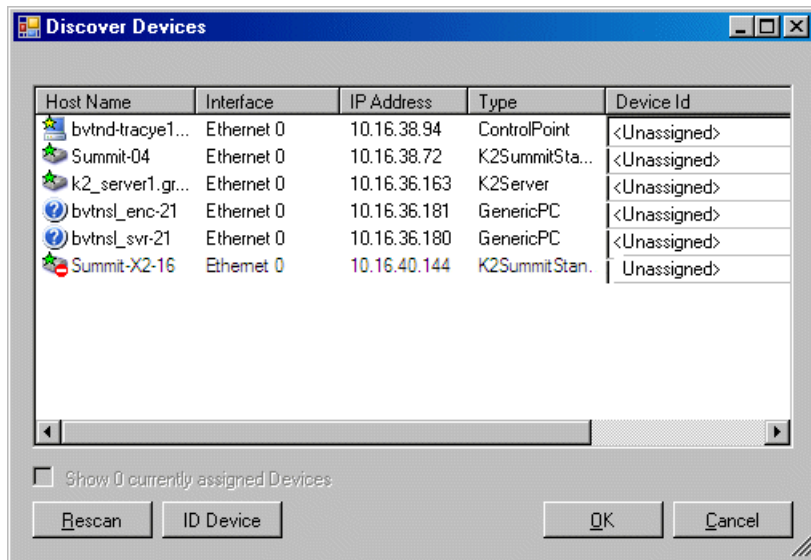
## Discovering devices with SiteConfig

Prerequisites for this task are as follows:

- The Ethernet switch or switches that the support the control network are configured and operational. If multiple switches, ISLs are connected and trunks configured.

- The control point PC is communicating on the control network.
  - There are no routers between the control point PC and the devices to be discovered.
  - Devices to be discovered are Windows operating system devices, with SiteConfig support installed.
  - Devices are cabled for control network connections.
1. Open SiteConfig on the control point PC.
  2. In the toolbar, click the discover devices button. 

The Discover Devices dialog box opens.




A list of discovered devices is displayed.

3. Click **Rescan** to re-run the discovery mechanism. You can do this if a device that you want to discover has its network connection restored or otherwise becomes available. Additional devices discovered are added to the list.

## Assigning discovered devices

Prerequisites for this task are as follows:

- Devices have been discovered by SiteConfig
  - Discovered devices are not yet assigned to a device in the system description
  - The system description has placeholder devices to which to assign the discovered devices.
1. If the Discovered Devices Dialog box is not already open, click the discover devices button .

The Discover Devices dialog box opens.

2. Identify discovered devices.
  - If a single device is discovered in multiple rows, it means the device has multiple network interfaces. Choose the interface that represents the device's currently connected control connection. This is typically Ethernet ... 0.
  - If necessary, select a device in the list and click **ID Device**. This triggers an action on the device, such as flashing an LED or ejecting a CD drive, to identify the device.
3. To also view previously discovered devices that have already been assigned to a device in the system description, select **Show ... currently assigned devices**.

The currently assigned devices are added to the list. Viewing both assigned and unassigned devices in this way can be helpful to verify the match between discovered devices and placeholder devices.

4. In the row for each discovered device, view items on the Device Id drop-down list to determine the match with placeholder devices, as follows:
  - If SiteConfig finds a match between the device-type discovered and the device-type of one or more placeholder devices, it displays those placeholder devices in the list.
  - If SiteConfig does not find a match between the device-type discovered and the device-type of a placeholder device, no placeholder device is displayed in the list.
5. In the row for a discovered device, click the Device Id drop-down list and select the placeholder device that corresponds to the discovered device.

If there is no corresponding placeholder device currently in the system description, you can select **Add** to create a new placeholder device and then assign the discovered device to it.

6. When discovered devices have been assigned, click **OK** to save settings and close.
7. In the **Network Configuration | Devices** tree view, select each of the devices to which you assigned a discovered device.

## Modifying Aurora Ingest device managed network interfaces

Prerequisites for this task are as follows:

- The physical device you are configuring has been discovered and is assigned to a device in the SiteConfig system description.
- SiteConfig has communication with the device.
- The device is defined in the system description with an appropriate network interface.

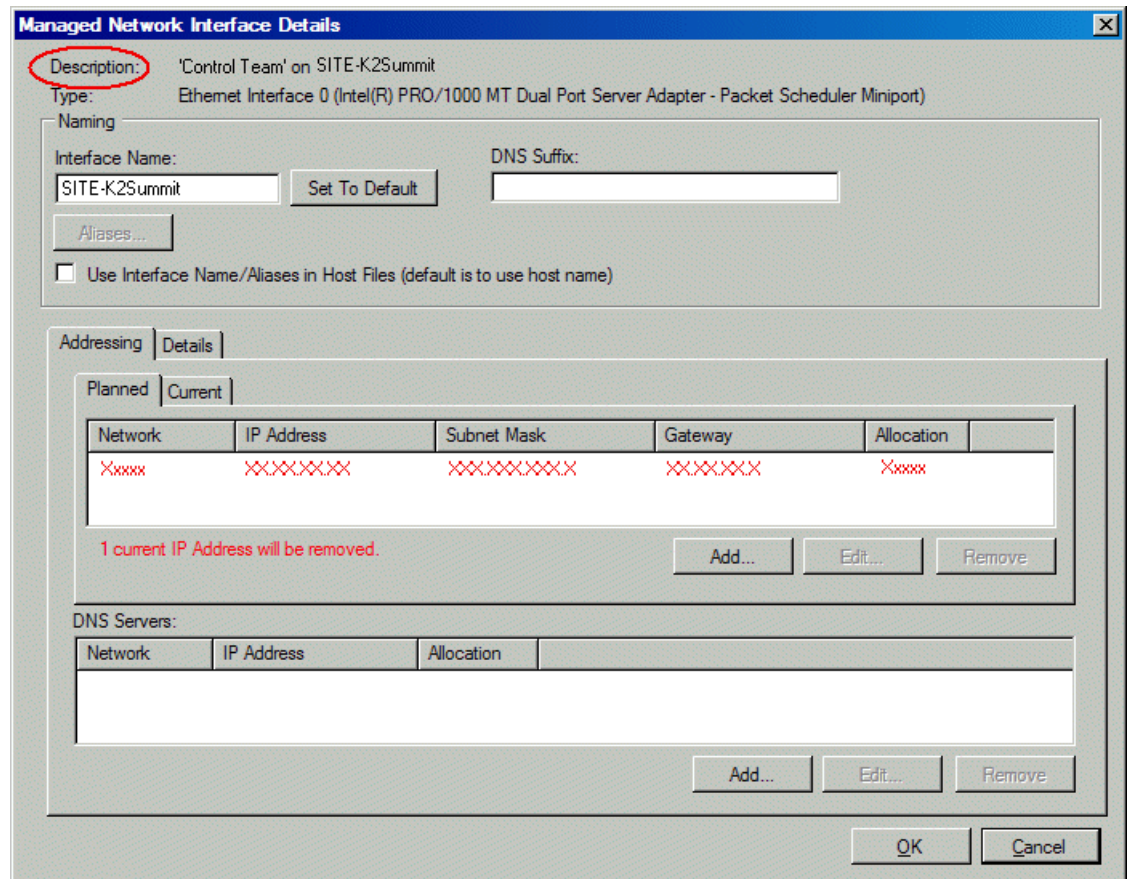
Use this task to modify managed network interfaces on Aurora Ingest devices:

1. In the Interfaces list view determine the interface to configure, as follows:
  - Identify the interface with which SiteConfig is currently communicating, indicated by the green star overlay icon. This should be the control network interface.
  - Verify that the interface over which SiteConfig is currently communicating is in fact the interface defined for the control network in the system description. If this is not the case, you might have the control network cable connected to the wrong interface port. The control connection should always be the first port on the motherboard, except when you have a loopback connection.
  - Configure the control network interface first before configuring any of the other interfaces.
  - After you have successfully configured the control network interface, return to this step to configure each remaining interface.
2. In the Interfaces list view, check the icon for the interface you are configuring.

If the icon has a red stop sign overlay, it indicates that current settings and planned settings do not match or that there is some other problem. Hover over the icon to read a tooltip with information about the problem.

3. In the Interfaces list view, right-click the interface you are configuring and select **Edit**.

The Managed Network Interface Details dialog box opens.



4. Identify the interface on the discovered device that you are configuring.
  - Identify Ethernet LAN adapters by their "Description" name. This is the Windows connection name. SiteConfig reads this name from the device and displays it at the top of this dialog box. This is the most accurate way to identify the network adapter on the discovered device that you are configuring.
5. Configure naming settings as follows:

Setting...	For network interface Network Connection
Interface Name	The device host name. Required.
Set To Default	Not recommended
DNS Suffix	Allowed, if applicable to the network. The DNS suffix is added to the interface name.
Aliases	Not allowed

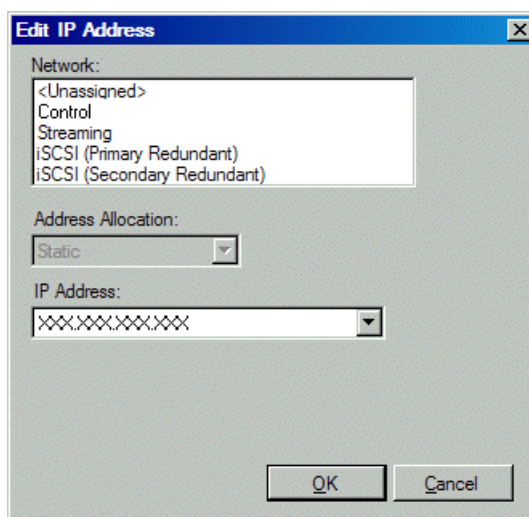
Setting...	For network interface Network Connection
Use Interface Name/Aliases in Host Files	<i>Unselected</i> is required. Since not selected, the default behavior occurs, which is to use the device host name in the hosts file.

Setting...	For network interface Corporate LAN
Interface Name	The device host name. Required.
Set To Default	Not recommended
DNS Suffix	Allowed, if applicable to the network. The DNS suffix is added to the interface name.
Aliases	Not allowed
Use Interface Name/Aliases in Host Files	<i>Unselected</i> is recommended. Typically this setting has no effect, since the Corporate LAN does not use host files.

6. Evaluate settings on the Planned tab and change if necessary.
  - Compare settings on the Planned tab with settings on the Current tab.
  - If you want to keep the current settings as reported in the Current tab, click **Remove** to remove the planned settings.
  - Do not specify multiple IP addresses for the same interface. Do not use the Add button.
7. To modify planned settings, do the following:
  - a) Select the network settings and click **Edit**.

The Edit IP Address dialog box opens.



b) Edit IP address settings as follows:

Setting...	For network interface Network Connection
Network	<i>Control</i> is required
Address Allocation	<i>Static</i> is recommended.
IP Address	The IP address for this interface on the network. Required.
Setting...	For network interface Corporate LAN
Network	<i>Corporate LAN</i> is required
Address Allocation	<i>DHCP</i> is typical.
IP Address	When DHCP is selected, you cannot select an IP address.

The networks listed in the Edit IP Address dialog box are those currently defined in the system description, with available settings restricted according to the network definition. If you require settings that are not available, you can close dialog boxes and go to the **Network Configuration | Networks** tab to modify network settings, then return to the Edit IP Address dialog box to continue.

8. When you have verified that the planned settings are correct, click **OK**, then **Yes** to apply settings to the device and close.

A Contacting Device message box reports progress.

9. After configuring control network settings, do the following

- a) If a message informs you of a possible loss of communication, click **OK**.

This message is normal, since this is the network over which you are currently communicating.

- b) In the Device list view, observe the device icon and wait until the icon displays the green star overlay before proceeding.

The icon might not display the green star overlay for several seconds as settings are reconfigured and communication is re-established.

- c) In the Interface list view, right-click the interface and select **Ping**.

The Ping Host dialog box opens.

If ping status reports success, the interface is communicating on the control network.

## Making the host name the same as the device name

1. Verify that the current device name, as displayed in the SiteConfig tree view, is the same as your desired host name.
2. In the **Network Configuration | Devices | Device** list view, right-click the device and select **Edit**.

The Edit Device dialog box opens.

3. If the host name is currently different than the device name, click **Set to Device Name**.

This changes the host name to be the same as the device name.

4. Click **OK**.

## Pinging devices from the control point PC

You can send the ping command to one or more devices in the system description over the network to which the control point PC is connected. Typically this is the control network.

1. In the **Network Configuration | Networks** tree view, select a network, site, or system node.
2. In the Devices list view, select one or more devices. Use Ctrl + Click or Shift + Click to select multiple devices.
3. Right-click the selected device or devices and select **Ping**.

The Ping Devices dialog box opens and lists the selected device or devices.



The Ping Devices dialog box reports the progress and results of the ping command per device.

## **About hosts files and SiteConfig**

SiteConfig uses the network information in the system description to define a hosts file and allows you to view the hosts file. SiteConfig can manage this hosts file on Windows operating system devices that are in the system description and that are part of a SiteConfig managed network.

When you have successfully assigned devices and applied planned network settings to interfaces, it is an indication that host table information, as currently captured in the system description, is valid and that you are ready to have SiteConfig assemble the host table information into a hosts file. Your options for placing this host table information on devices are as follows:

- If you do not want SiteConfig to manage your host table information, you can manage it yourself. This is typically the case if your facility has an existing hosts file that contains host table information for devices that are not in the SiteConfig system description. In this case, you can have SiteConfig generate a single hosts file that contains the host table information for the devices in the system description. You can then copy the desired host table information out of the SiteConfig hosts file and copy it into your facility hosts file. You must then distribute your facility hosts file to devices using your own mechanisms.
- If you want SiteConfig to manage all information in hosts files on devices, you can have SiteConfig copy its hosts file to devices. In so doing, SiteConfig overwrites the existing hosts files on devices. Therefore, this requires that all devices that have name resolution through the hosts file be configured accordingly in the SiteConfig system description.

If you choose to have SiteConfig write hosts files to devices, the process consumes system resource and network bandwidth. Therefore you should wait until you have verified the information for all devices/interfaces in the host file, rather than updating hosts files incrementally as you discover/assign devices.

SiteConfig does not automatically deploy hosts files to managed devices as you add or remove devices. If you add or remove devices from the system description, you must re-deploy the modified hosts file to all devices.

## **Generating host tables for devices with SiteConfig**

Prerequisites for this task are as follows:

- Planned control network settings are applied to control network interfaces and devices are communicating on the control network as defined in the system description.

- Interfaces for networks that require name resolution via the hosts file, such as the FTP/streaming network, have settings applied and are communicating.
- You have viewed host names, as currently defined in the system description, and determined that they are correct.
- The control point PC is added to the system description so that it is included in the host tables generated by SiteConfig.

1. In the **Network Configuration | Networks** tree view, select a network, site, or system node.
2. Click **View Hosts file**.

A Hosts File Contents window opens that displays the contents of the hosts file as currently defined in the system description.

3. Verify the information in the hosts file.
4. Do one of the following:
  - If you are managing host table information yourself, click **Save As** and save a copy of the hosts file to a location on the control point PC. Then open the copy of the hosts file, copy the desired host table information from it, and paste it into your facility hosts file as desired. Then you can use your own process to distribute the facility hosts file to devices. Remember to distribute to the control point PC so that SiteConfig and other management applications such as K2Config can resolve network host names.
  - If SiteConfig is managing hosts files, do the following:

***NOTE: Writing hosts files to multiple devices consumes system resource and network bandwidth. Therefore it is recommended that you wait and do this after the system is complete and fully implemented, rather than updating hosts files incrementally as you discover/assign devices.***

- a) In the **Network Configuration | Devices | Devices** list view, right-click a device to which you intend to write the hosts file and select **View Current Host File**.

A Host File Contents window opens that displays the contents of the hosts file that is currently on that actual device.

- b) Verify that there is no information that you want to retain in the device's current hosts file that is not also in the hosts file as currently defined in the system description. If you need to save the device's current hosts file, click **Save As** and save to a different location.
- c) In the **Network Configuration | Devices | Devices** list view, right-click a device or use Ctrl + Click to select multiple devices, and select **Update Host File**.

The current hosts file is overwritten with the hosts file as defined in the system description.

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## **Managing Software**

This section contains the following topics:

- *Create record of software installed on devices*
- *Adding a software role to a device*
- *Removing a software role from a device*
- *Configuring deployment groups*
- *Distribute devices into deployment groups*
- *Check all currently installed software on Aurora Ingest devices*
- *Add software package to deployment group for Aurora Ingest devices*
- *Install prerequisite files on the control point PC*
- *About deploying software*
- *Backing up Aurora Ingest Database*
- *Migrating Aurora Ingest - Server*
- *Restoring Aurora Ingest Database*
- *Installing Ingest software manually*
- *Installing ScheduALL for Aurora Ingest integration*

## Create record of software installed on devices

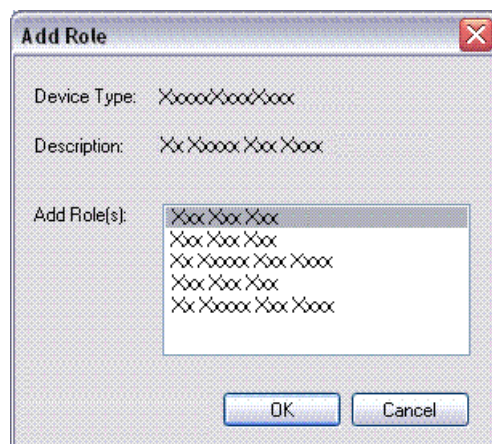
If you have not already done so, create a document to keep track of the software that you plan to install on each of your system devices, according to your system design. This is especially helpful for Aurora product devices. The following table is an example of this type of document. Then, as you proceed with subsequent tasks and remove/add software roles to devices in SiteConfig, you can refer to your table and make sure you are assigning software roles correctly.

Software	SVR-1	HD-1, 2, 3	CONF-1	EDIT-1	DSM-1	ING-1	FSM-1	HDK2-1	FTP-1
MF Server	X								
+ K2 MDI	X								
+ News MDI			X						
+ NTFS	X								
+ FlashNET MDI	X								
+ Proxy MDI	X								
+ FTP MDI	X								
Aurora Browse	X								
Proxy Encoder		X							
News Share					X				
Conform			X						
Aurora Suite						X			
+ Edit				X					
+ Edit LD				X					
+ FTP		X							X
+ SmartBins			X						
+ RMI core									
Aurora Ingest						X			
Aurora Playout						X			
K2 - Gen iSCSI		X	X	X	X				X
K2 - GVG MLib	X	X	X	X	X				X
K2 - Server							X		
K2 - Client								X	
Control Point						X			
StorNext		X	X	X	X		X	X	X

## Adding a software role to a device

1. In the **Software Deployment | Devices** tree view, right-click the device and select **Add Role**.

The Add Role dialog box opens.



The Add Role dialog box displays only those roles that SiteConfig allows for the selected device type.

2. Select the role or roles that you want to add to the device. Use Ctrl + Click or Shift + Click to add multiple roles.
3. Click **OK** to save settings and close.

The new role or roles appear under the device in the tree view.

## Removing a software role from a device

1. In the **Software Deployment | Devices** tree view, expand a device's node to expose the roles currently assigned to the device.
2. Right-click the role you want to remove and select **Remove**.

The role is removed from the device in the tree view.

## Configuring deployment groups

Prerequisites for this procedure are as follows:

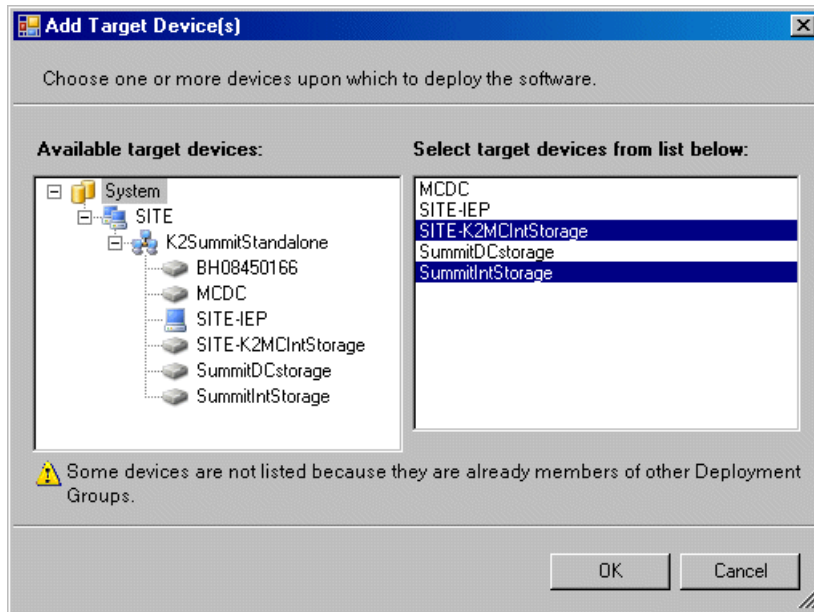
- The device is assigned in the SiteConfig system description and network connectivity is present.

1. In the **Software Deployment | Deployment Groups** tree view, right-click the top node and select **Add Deployment Group**.

A deployment group appears in the tree view.

2. Right-click the deployment group, select **Rename**, and enter a name for the deployment group.
3. Right-click the deployment group and select **Add Target Device**.

The Add Target Device(s) wizard opens.



4. In the Available Target Devices tree view, select the node that displays the devices that you are combining as a deployment group.
5. In the right-hand pane, select the devices that you are combining as a deployment group.

To select multiple devices, you can drag through the devices, use Ctrl + Click, or use Shift + Click.

6. Click **OK**.

The devices appear in the Deployment Groups tree view under the deployment group. Before you perform a software deployment, you must check software on the devices that will be receiving new software. If you have already added packages to the group, on the Deployment Groups tab you will also see deployment tasks generated for every device with roles that match the package contents.

## Distribute devices into deployment groups

You can gather devices of different types into a SiteConfig deployment group. This allows you to deploy software to all the devices in the deployment group at the same time, as part of the same deployment session. Based on the roles you have assigned to the devices, SiteConfig deploys the proper software to each device. This increases the efficiency of your software deployment with SiteConfig.

If you have not already done so, configure your deployment groups. The recommended deployment group distribution is as follows. Depending on your system design, your system might not have all the device types listed.

- In a deployment group named "Aurora\_Edit\_Ingest\_Playout", place the following devices:
  - Aurora Edit workstation of any storage options: Shared storage, NAS storage, and stand-alone.
  - Aurora Edit LD computer
  - DSM
  - Conform Server
  - SmartBin Server
  - FTP Server
  - Aurora Ingest Platform
  - IEP
  - Aurora Playout Platform
- In a deployment group named "Aurora\_Browse\_MediaFrame", place the following devices:
  - MediaFrame server
  - MDI server
  - Aurora Proxy Encoder
  - K2 Basecamp Express
- If you have a K2 Nearline SAN (NAS), in a deployment group named for the SAN system, place the following devices:
  - The Nearline SAN's K2 Media Servers.

## Check all currently installed software on Aurora Ingest devices

Prerequisites for this task are as follow:

- The device is assigned in the SiteConfig system description and network connectivity is present.

- SiteConfig is able to log in to the device using the username/password credentials assigned to the device.
- The SiteConfig control point PC does not have a network drive mapped to an administrative share (such as C\$) on a device on which you are checking software.
- If Aurora product software at a version lower than 6.5.2 is currently installed, it must be manually uninstalled. For more information refer to *SiteConfig Migration Instructions*.
- If upgrading from Aurora Ingest 6.5.2, add the GVG MLib role to Aurora Ingest Server device as the previously added device does not have the GVG MLib role.

Do the following steps on the devices that you are upgrading.

1. In the **Software Deployment | Deployment Groups** tree view, right-click the top-most node for the group or any individual device and select **Check Software**.

**NOTE:** *If you have access problems, verify that the administrator account on the device has credentials as currently configured in SiteConfig. By default credentials on the device should be administrator/adminGV! for Aurora devices and Administrator/adminK2 for K2 devices.*

The Check Software dialog box appears. SiteConfig searches for software on the selected device or devices and gathers information. Progress is reported.

2. When the check is complete for the selected device or devices, close the Check Software dialog box.

An updated list of all currently installed software is displayed in the **Software Deployment | Devices | Installed Software** list view. If software is a SiteConfig managed software package, information is displayed in the Managed Package and Deployment Group columns.

## Add software package to deployment group for Aurora Ingest devices

Prerequisites for this task are as follows:

- You can access the software package file from the SiteConfig control point PC.
- The Aurora Ingest devices to which you are deploying software are in a deployment group.

Use the following procedure to add one or more software packages to the deployment group that contains your Aurora Ingest devices. For this release of software, identify and add software installation files as follows:

Software	File name
Aurora Ingest software – For all Aurora Ingest devices	<i>AuroraIngest_7.0.x.xxxx.cab</i>
GVG MLib software – For Aurora Ingest Server and RMI	<i>GVG_MLib_3.3.x.cab</i> or <i>GVG_MLib_7.1.x.cab</i>



Software	File name
Aurora Suite – For Aurora Ingest RMI device only	<i>AuroraSuite_7.0.x.xxx.cab</i>
Grass Valley Windows Monitoring SNMP agent	<i>PCMonitoring_x.x.x.xx.cab</i>

**NOTE:** You need to reinstall RMI if you upgrade GVG MLib software in future.

For Aurora Ingest RMI device, you must also add the following software package to the deployment group. Depending on the K2 software version of your K2 SAN, also add software package installation files as follows:

**NOTE:** Add files for either 3.x OR 7.x. Do not add files for both 3.x AND 7.x.

- If your devices access storage on a K2 software version 3.x K2 SAN, add software package installation files as follows:

Software compatible with 3.x K2 SAN	File name
Generic iSCSI client	<i>GenericISCI_x86_3.3.x.cab</i>

- If your devices access storage on a K2 software version 7.x K2 SAN, add software package installation files as follows:

Software compatible with 7.x K2 SAN	File name
Generic iSCSI client	<i>GenericISCI_x86_7.1.x.cab</i>

SNFS is bundled with the Generic iSCSI cab file.

1. In the **Software Deployment | Deployment Groups** tree view, select a deployment group.
2. Click the **Add** button.  
The Add Package(s) dialog box opens.
3. Do one of the following to select the software package:
  - Select from the list of packages then click **OK**.
  - Click **Browse**, browse to and select the package, then click **Open**.
4. If one or more EULAs are displayed, accept them to proceed. If you do not accept a EULA, the associated software is not assigned to the deployment group.

SiteConfig adds the package to the deployment group.

The package appears in the Managed Packages list for the selected deployment group. SiteConfig creates new software deployment tasks for the package and displays them in the Tasks list view.

## Install prerequisite files on the control point PC

Some software components, such as those for Aurora products, share common prerequisite software. You must install a prerequisite software package on the control point PC to make the prerequisite software available for software deployment to devices.

1. Check release notes for the required version of prerequisite files, if any.
2. On the SiteConfig control point PC, open Windows Add/Remove programs and look for **Grass Valley Prerequisite Files**, then proceed as follows:
  - If the required version of prerequisite files is installed, do not proceed with this task.
  - If prerequisite files are not installed or are not at the required version, proceed with this task.
3. Procure the required prerequisite software installation file. The file name is *Prerequisite Files.msi*.
4. On the SiteConfig control point PC, run the installation file. The installation program copies prerequisite files to *C:\Program Files\Grass Valley\Prerequisite Files*.

## About deploying software

You must control the sequence of tasks and device restarts as you install or upgrade software. The exact steps can vary from software version to version. The following sequence of SiteConfig tasks is typical:

1. Check currently installed software.
2. Add software package(s) to deployment group(s).
3. Set deployment options.
4. Deploy (install or upgrade) software.

Your product's release notes have the specific task flow for the version of software you are installing. The release notes are written for upgrading software on existing systems, but if you are installing software for the first time on a new system, the steps are essentially the same. The primary difference is that when installing software for the first time, the SiteConfig "uninstall" deployment tasks are not displayed.

**NOTE:** *Make sure you follow the documented task flow in the release notes for the version of software you are installing or to which you are upgrading.*

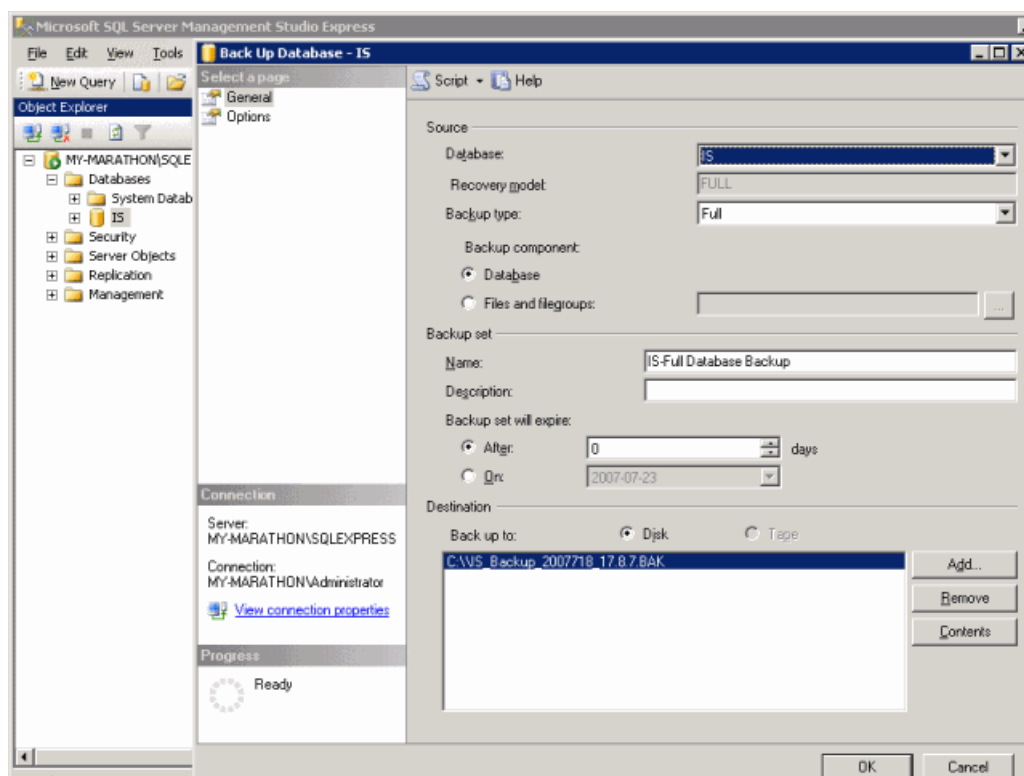
## Backing up Aurora Ingest Database

It is advisable for users to back up the Aurora Ingest database before upgrading to the latest version of the software. With a database backup, you can avoid any lost of feed

schedules and the need to key in everything again in case of a system crash. The backup could also be placed on another machine or an external drive for extra precaution.

The database back up could be done easily using Microsoft SQL Server Management Studio Express. Listed below are the steps to back up your Aurora Ingest database:

1. Login to Windows XP as an administrator or as a user with administrative rights.
2. Go to **Start>All Programs>Microsoft SQL Server 2005** and select SQL Server Management Studio Express to launch the application.
3. Connect to your SQL Server by Windows Authentication.
4. Double-click on Databases and you should see the folder expand to show System Databases and IS.
5. Right-click on IS and select **Tasks>Back Up**.
6. On the General page, select IS from the Database drop-down list or type "IS" if it's not listed in the drop-down list, and select Full from the Backup type drop-down list.
7. Key in the backup name and select the backup destination.



8. In the Options page, select Back up to the existing media set and Overwrite all existing backup sets.
9. Click OK.

**NOTE: DO NOT delete Aurora Ingest folder in the registry key and 2 files (IS\_Data.mdf and IS\_Log.ldf) in C:\Program Files\Microsoft SQL Server\90\Tools\Binn if you don't have a backup on another machine or an external drive. All data in the current database could not be retrieved if those files were to be deleted and the system crashed.**

## Migrating Aurora Ingest - Server

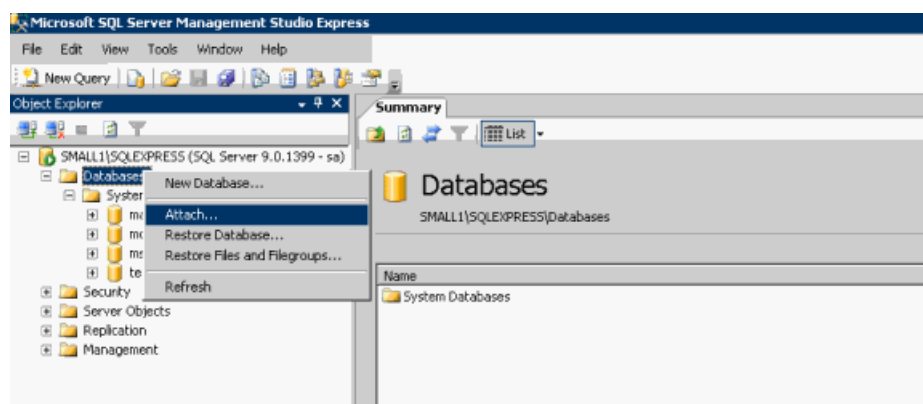
Database migration should be done if you need to move Aurora Ingest database from the current machine to a brand new machine, or to move your Aurora Ingest database to the machine that runs your NewsShare DSM.

This means that both news database and ingest database will share the same SQL processes. If you want to move your current Aurora Ingest database that runs on SQL Express 2005 to your NewsShare DSM machine that runs the full version of SQL Server 2005, you can do so by migrating your database.

1. Run the latest Aurora Ingest installer on the existing machine to update the Aurora Ingest database.
2. Export the Aurora Ingest Server registry key under “My Computer\HKEY\_LOCAL\_MACHINE\SOFTWARE\Grass Valley\Aurora Ingest\Server” from existing machine.

DO NOT launch the Microsoft SQL Server Management Studio Express CTP on both existing machine and new machine. If you do this, you cannot back up the database.

3. Shut down the Aurora Ingest - Server application on the existing machine and copy two files (IS\_Data.MDF and IS\_Log.LDF) from C:\Program Files\Microsoft SQL Server\90\Tools\Binn from existing machine to same directory path in new machine. Make sure these two files are NON-READ ONLY.
4. Make sure the “SQLServer (or SQLEXPRESS)” service is running on new machine. You can check the state of the service in the “Services” application.
5. Launch the Microsoft SQL Server Management Studio Express CTP on new machine.
6. Log on, using Window Authentication Mode, to attach the Aurora Ingest database.
7. Attach the Aurora Ingest database as shown in the following screenshot.



8. Select the IS\_Data.MDF from the same directory (C:\Program Files\Microsoft SQL Server\90\Tools\Binn).
9. After the Aurora Ingest database had been attached successfully, you should be able to view the Aurora Ingest database folder shown under the Databases root folder.
10. Import the server registry key to new machine.
11. Run the latest Aurora Ingest installer on the new machine.
12. Reboot the machine after installation is complete.
13. License the Aurora Ingest software (Number of Channels, Scheduler, VTR Ingest and RMI).
14. Remove the licenses from the existing machine.
15. Launch the Aurora Ingest - Server application on the new machine. Select **Tools | Options** and click on the System tab.
16. Edit settings of SDB Server, XMOS Server and SabreTooth Server according to the new machine.

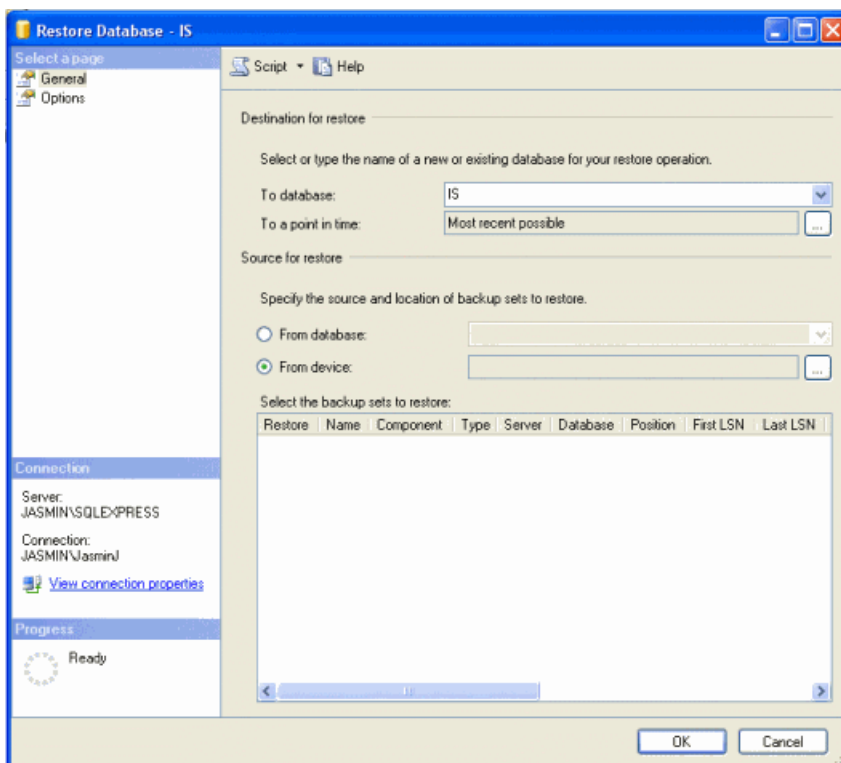
## Restoring Aurora Ingest Database

In case of a system crash or a corrupted database, database restore could easily be done using Microsoft SQL Server Management Studio Express.

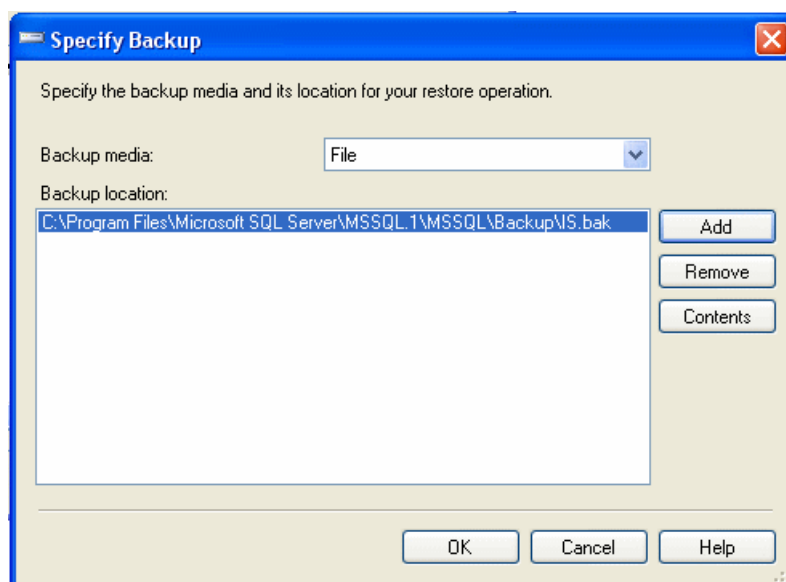
Before proceeding to restore, make sure that database back-up had been done and the back-up location identified. Follow the steps below to restore your Aurora Ingest database:

1. Login to Windows XP as an administrator or as a user with administrative rights.
2. Shut down Aurora Ingest - Server if it's currently running on your machine.
3. Go to **Start | All Programs | Microsoft SQL Server 2005** and select SQL Server Management Studio Express to launch the application.
4. Connect to your SQL Server by Windows Authentication.

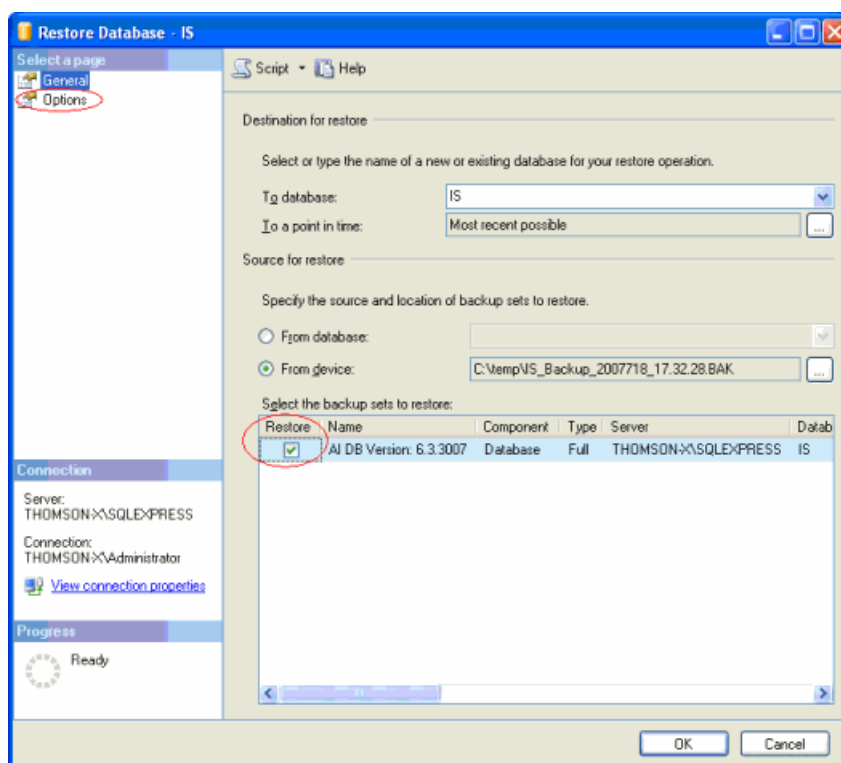
5. Right-click on Databases and select Restore Database.
6. In the Destination for restore section, select IS from the database dropdown list. Key in "IS" if it's not in the dropdown list.



7. In the Source for restore section, select From device and click [...] to browse to the folder that you had stored your backup.
8. Click Add to get to the folder where you had saved the backup, select the backup file and click **OK** twice.



9. Check the box under Restore column to select the backup database to be restored.



10. In the Options page, check **Overwrite the existing database**.
11. Click **OK**.

## Installing Ingest software manually

The software for Aurora Ingest components can be installed on any PC which meets the system requirements for that component.

If you don't have SiteConfig within your operation, you can install or upgrade Aurora Ingest with the procedure below.

To install the Aurora Ingest software on your computer, insert the Aurora Ingest CD-ROM into the machine's CD-ROM drive and follow these instructions:

On this screen...	Do this...
Welcome	Click <b>Next</b> .
License Agreement	Select <b>I accept...</b> and click <b>Next</b> .
Select Features	Specify the Aurora Ingest applications to install: <b>Server</b> , <b>Scheduler</b> , <b>VTR Controller</b> , <b>VTR Ingest</b> , or <b>RMI</b> . With <b>Server</b> component, Microsoft .NET Framework 2.0 and Microsoft SQL Express will also be installed by default. If your system has SQL Server already installed (e.g. if the system houses the Aurora Edit database), choose to use the existing SQL Server instance; if not, choose SQL Express.
Specify Aurora Ingest RMI Configuration (if RMI component is selected in the Select Features screen)	Select the RMI mode for your operation; whether <b>Standalone</b> or <b>Client</b> . Standalone means that RMI will run as a standalone application without needing to connect to an Ingest Server. If RMI will be connected to an Ingest Server, choose Client.
Specify Aurora Ingest Server Configuration	Enter the host name of Aurora Ingest Server that will be used by Aurora Ingest components. Select the SQL Server configuration that will be used by Aurora Ingest Server. If you choose SQL Server 2005, select the server instance from the dropdown list.
Ready to Install the Application	Click <b>Next</b> .
Installation Complete	Click <b>Finish</b> .

## Installing ScheduALL for Aurora Ingest integration

In order to use VisuAll, Inc.'s ScheduALL with Aurora Ingest, you need to install the ScheduALL application. For a smooth scheduling integration, extra steps need to be adhered to during the installation process. If technical assistance is needed, you can contact ScheduALL product support at 1-954-334-5409 option 1.

These applications are the pre-requisites and must be installed on your machine before proceeding to install ScheduALL.

- Microsoft SQL Server 2005 (For ScheduALL)
- Microsoft SQL Express 2005 (For Ingest)



- Aurora Ingest Server installed and configured
- Visual studio 2005 redistribute SP1 for SchedIngestAPI web service (to be installed automatically by SchedIngestAPI installer)

The following list contains the minimum ScheduALL components required for integration with Aurora Ingest.

1. ScheduALL for Windows v4.73.22 (4.74) or greater.
2. ScheduALL Authentication Server.
3. ScheduALL Ingest API license point.
4. Enabled ScheduALL Web Service APIs:
  - WorkOrder Query
  - WorkOrder Delete
  - WorkOrder Modify
  - Work Order Request Create
  - Event Create
  - Event Delete
  - Event Details
  - Event Modify
  - Resource Booking Query
  - Resource Query
  - WorkOrder Details
  - Client Query
5. Modules:
  - Scheduling
  - Developer's Toolkit
  - Client/Server
  - WebServiceAPI
  - Ingest Web Service API

To install ScheduALL:

1. Install Sched4.exe which will install ScheduALL. Select the Network Client option.

The default login username is SUPERVISOR with a blank password.

2. Install SchedAuth.exe, which is the Authentication Server for ScheduALL web services.
3. Install SchedWebAPI.exe, which is the ScheduALL web service.
4. Install SchedIngestAPI (setup.exe), which is the Ingest integration web service.

You can now launch ScheduALL and continue with below steps:

1. At the login screen, enter SUPERVISOR and a blank password.
2. Deselect the "Use Sample Data" option.
3. When prompted to update the database, select "Yes".
4. Keep selecting "Yes" and "OK" for permission enquiries.

After completing above steps, ScheduALL should now be operational with Aurora Ingest.

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# **Configuring Aurora Ingest**

This section contains the following topics:

- *Configuring Aurora Ingest*
- *Aurora Ingest - Server overview*
- *Configuring Aurora Ingest Server*
- *Configuring Scheduler application*
- *Configuring VTR Controller Application*
- *Configuring VTR Ingest application*
- *Setting up K2 Summit for RMI import*
- *Configuring RMI application*
- *Configuring user administration*
- *Configuring Aurora Ingest for ScheduALL*
- *Configuring ScheduALL for Aurora Ingest*

## **Configuring Aurora Ingest**

Once you have installed any hardware (if necessary) and the software components of Aurora Ingest, you need to configure the Aurora Ingest options for your particular newsroom equipment and workflow.

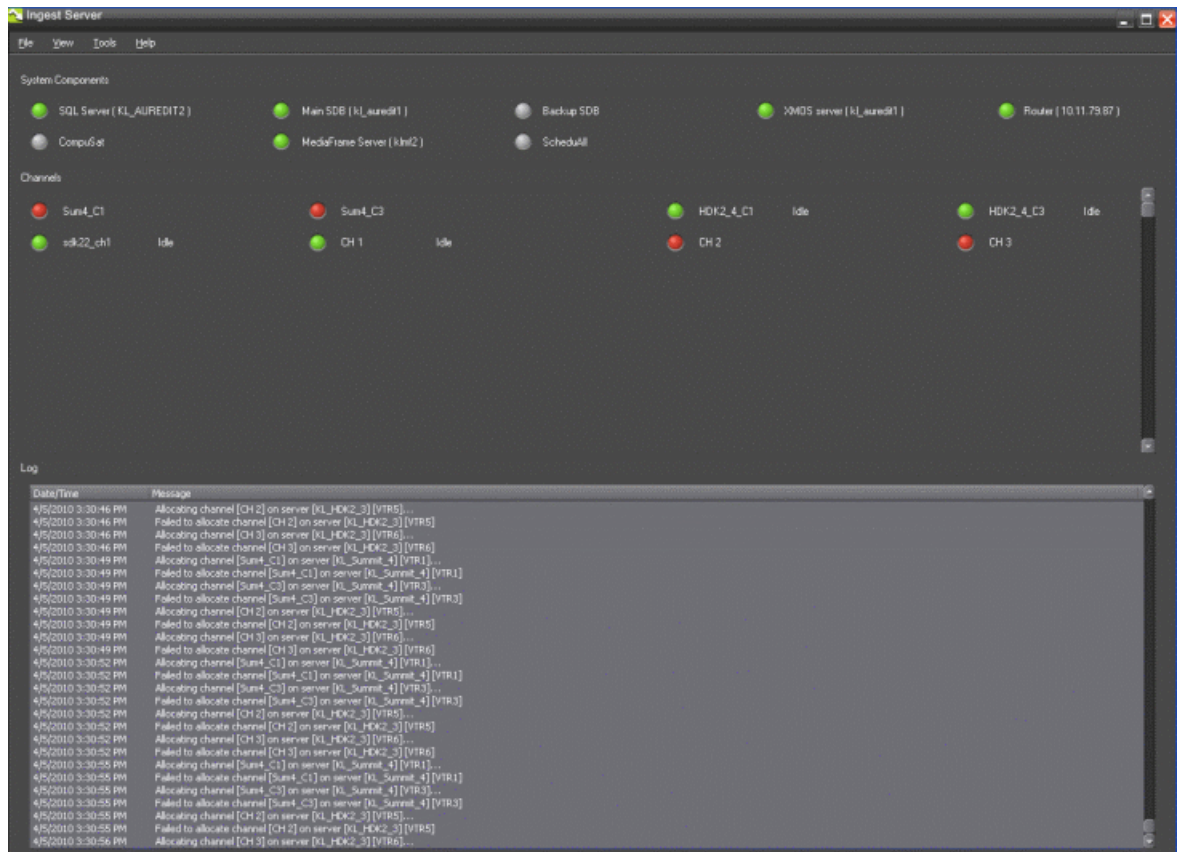
You can add and configure VTRs with the VTR Controller and VTR Ingest applications. Scheduler, RMI Standalone and RMI clients are configured within their respective applications. All other configurations can be set in the Aurora Ingest Server.

## **Aurora Ingest - Server overview**

The Aurora Ingest - Server user interface shows the status of the system components and channels, as well as the system logs. The server machine name might be truncated, however the full name is visible if you hover your mouse over the area.

Additional information regarding a channel can also be obtained if you hover on the channel name. These information include channel name, server name, recording port, remaining storage and status of the channel.

- A green indicator—the component or channel is connected.
- A red indicator—the component or channel is not connected.
- A grayed-out indicator—the component is not configured.



## Configuring Aurora Ingest Server

In Aurora Ingest Server application, you can configure most of the Aurora Ingest settings. Other configurations can be done in their respective applications.

The following table details the configurable options in the Aurora Ingest Server application.

Option	Description
System	Allows you to specify servers, such as the SDB Server, XMOS Server, License Server, MediaFrame Server, CompuSat satellite dish control system, etc. You can also specify the video reference standard, enable the option to switch aspect ratio and set the default aspect ratio of feeds and VTR ingests.
Media Server	Allows you to add, edit, or delete information about the media servers, including the drive and record locations. Note: the record location is not machine dependent.
Router	Allows you to specify the type of router (Encore/SMS7000, Acappella or Jupiter) and its IP address or COM port.

Option	Description
Channel	Allows you to specify the various channels and the media server they are associated with, timecode source for the channel as well as the router destination. (The router destination is physically connected to the media server using an AV cable.)
Channel Group	Allows you to specify channel groups and channels to be included in those groups. Channel groups are assigned to users in the User Administration setup. Auto-assign of recording channels will be limited to groups of channels that are assigned to each user.
Feed	For feed ingests performed using Aurora Ingest Scheduler, this tab allows you to specify default information about the clips, such as name, record duration, expiration days, crash record location and duration, recurring date format and default timecode source (Internal, Time of Day, LTC or VITC).
VTR	For segment (batch) ingests performed using VTR Ingest, this tab allows you to specify default information about the clips, such as name, record location, handle and preroll times.
Preview	Allows you to specify the preview channel for Asset Viewer in Aurora Ingest Scheduler.  <i>NOTE: This is used only if your Scheduler application is configured to use the Hi-Res Asset Viewer.</i>

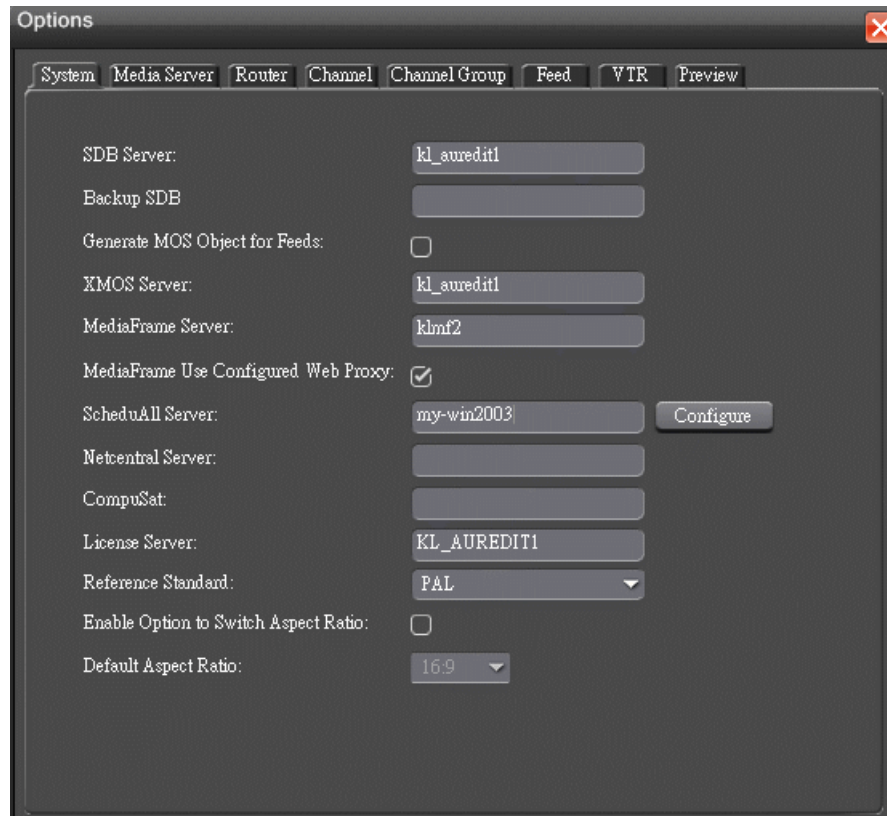
## Configuring System

You need to configure the system in order to use Aurora Ingest.

System setting is the first setup that needs to be configured.

- To configure Aurora Ingest - Server, select **Tools | Options**.

Options dialog box appears with the System tab already selected.



Setting	Description
SDB Server	Enter the IP address or computer name of the server where the Aurora Playout database resides (primary SDB Server is running).
Backup SDB Server	If you are using a backup database server, enter the IP address or computer name of the server where the backup Aurora Playout database resides (hot-standby SDB Server is running).
XMOS Server	Enter the name of the computer hosting the XMOS server.
MediaFrame Server	Enter the IP address or name of the computer that is hosting the MediaFrame server. Select the checkbox if you want your MediaFrame to use proxy settings configured in your web browser to communicate with MediaFrame services. For example, the proxy configured in Internet Explorer under Tools > Options > Connections > LAN Settings > Proxy Server. Deselect the checkbox if you don't want to use the configured web proxy settings.  <b>NOTE: When a MediaFrame server is added or changed, you need to restart all client applications for changes to take effect.</b>

Setting	Description
ScheduALL Server (optional)	Enter the IP address or name of the computer that is hosting the ScheduALL Server. If you need to configure the web service, edit resources or synchronize events, you can click the Configure button.
NetCentral Server	If your system uses NetCentral to monitor equipment, enter its name or IP address.
CompuSat	If you are using a CompuSat satellite dish control system, enter the location where the CompuSat application is running.
License Server	Enter the name of the server where the license is located.
Reference Standard	NTSC drop frame; NTSC non-drop; PAL Select the video reference standard used in your operation.
Enable option to switch aspect ratio	Click the check box if you want to enable the option to switch video aspect ratio of feeds and VTR ingests. This feature is currently supported for SD K2 media client version 3.2 and above only.
Default aspect ratio	16:9; 4:3 Select the default aspect ratio for your ingest operation.

### Setting up the K2, K2 Summit or M-Series iVDR server

You need to configure your media server to work with Aurora Ingest.

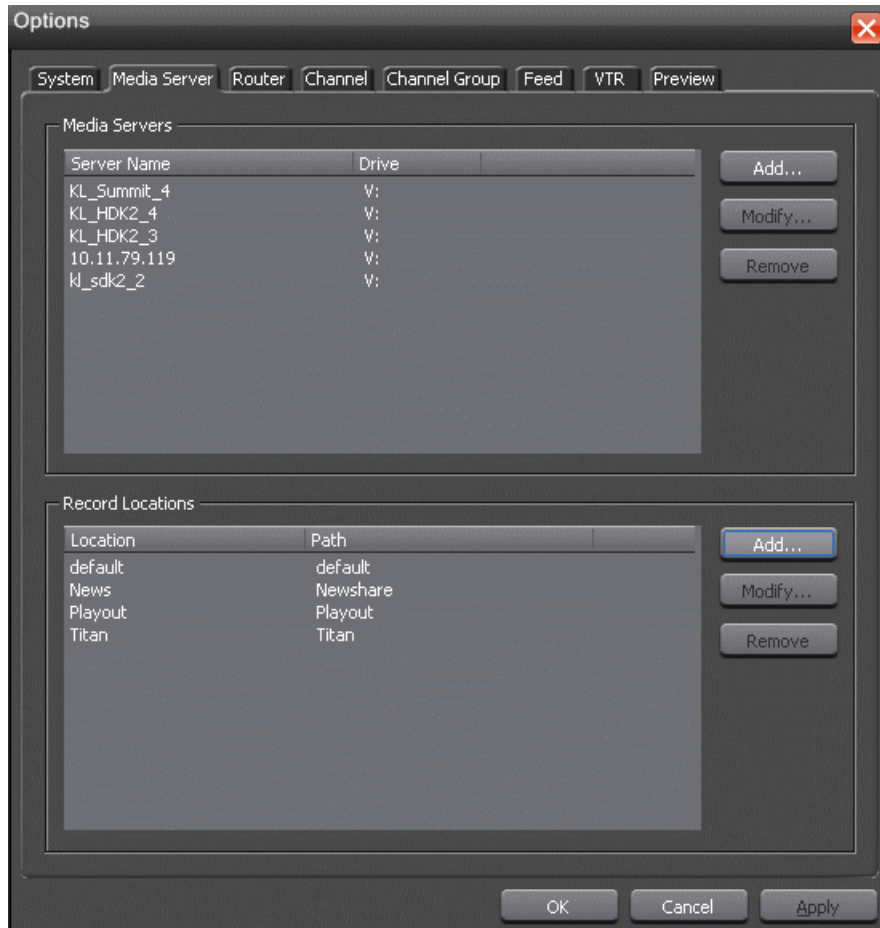
1. See your K2 / K2 Summit / M-Series documentation and set up the record channels to use Advanced Media Protocol (AMP).
2. In Aurora Ingest, configure media servers and channels to use Internal, Time of Day, LTC or VITC timecode mode.

For LTC or VITC timecode, connect your desired timecode source to the timecode input on your media server.

### Configuring Media Servers

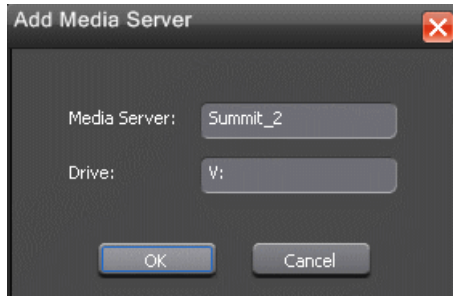
You can configure which media servers will be used for Aurora Ingest recordings. Once media servers are configured, select bins that will be used when recording clips and feeds.



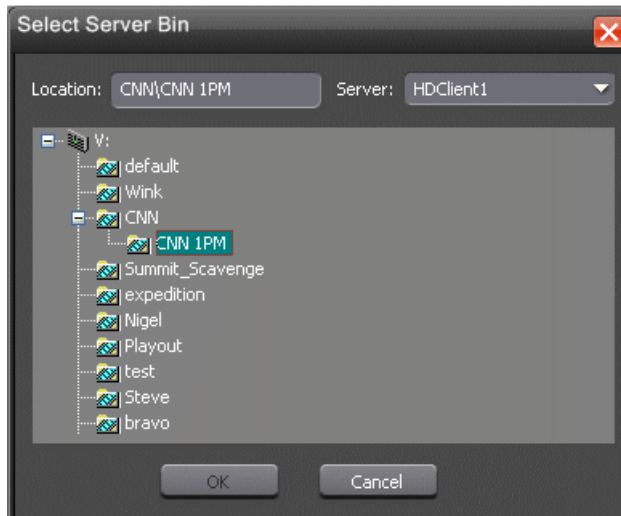


Setting	Description
Server Name	Enter the name of media servers that you want to ingest to.
Drive	Enter the drive letter for each media server. This will almost always be the V: drive.
Location	Browse to the record location, which is a bin on the media server.

1. In the Media Servers box, click **Add**.



2. Enter the media server name and its drive letter (e.g. V:), and click **OK**.
3. In the Record Locations box, click **Add**.



4. Select the server bin or sub-bin for a record location, and click **OK**.
5. Repeat step 3 and step 4 if you want to record to other bins.

**NOTE:** *There is no need to add bins with the same name on multiple media servers. That is, selecting a bin called Feeds from the tree structure of the Summit1 media server will also allow you to record to the Feeds bin on Summit2, Summit3, etc.*

#### Modifying media server

You can modify a media server setting within the media server tab.

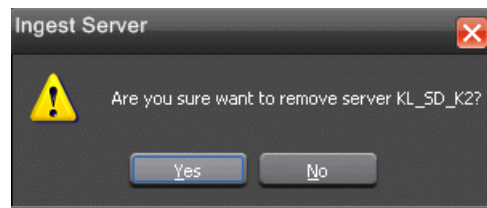
1. In the Media Servers box, select the media server name that you want to change and click **Modify**.

2. Enter the new media server name and its drive letter (e.g. V:), and click **OK**.
3. If you need to modify the record location, select the folder name in the Record Locations box and click **Modify**.
4. You can select other media servers from the dropdown and select other bins or sub-bins.
5. Click **OK**.
6. Repeat step 1 to step 5 to modify more media servers and recording locations.

### Removing a media server

You can remove a media server from Aurora Ingest Server's settings if needed.

1. In the Media Servers box, select the media server name and click **Remove**.



2. Click **Yes** to confirm the removal of the media server from the Aurora Ingest - Server setting.
3. If you need to remove a record location, select the folder name in the Record Locations box and click **Remove**.
4. Click **OK** to close the options window or click **Apply** to continue with other configuration settings.

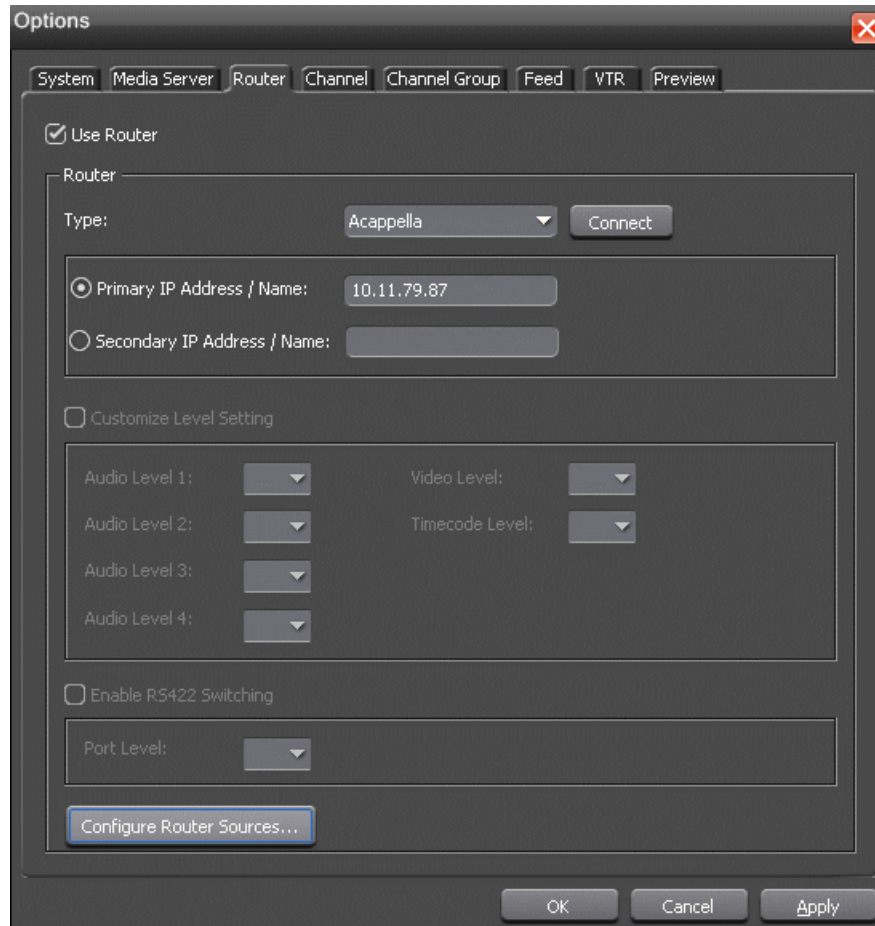
### Configuring a Router

If you are using Encore, SMS7000, Acappella or Jupiter router as part of your news station, you can configure Aurora Ingest to use sources from the router to record clips.

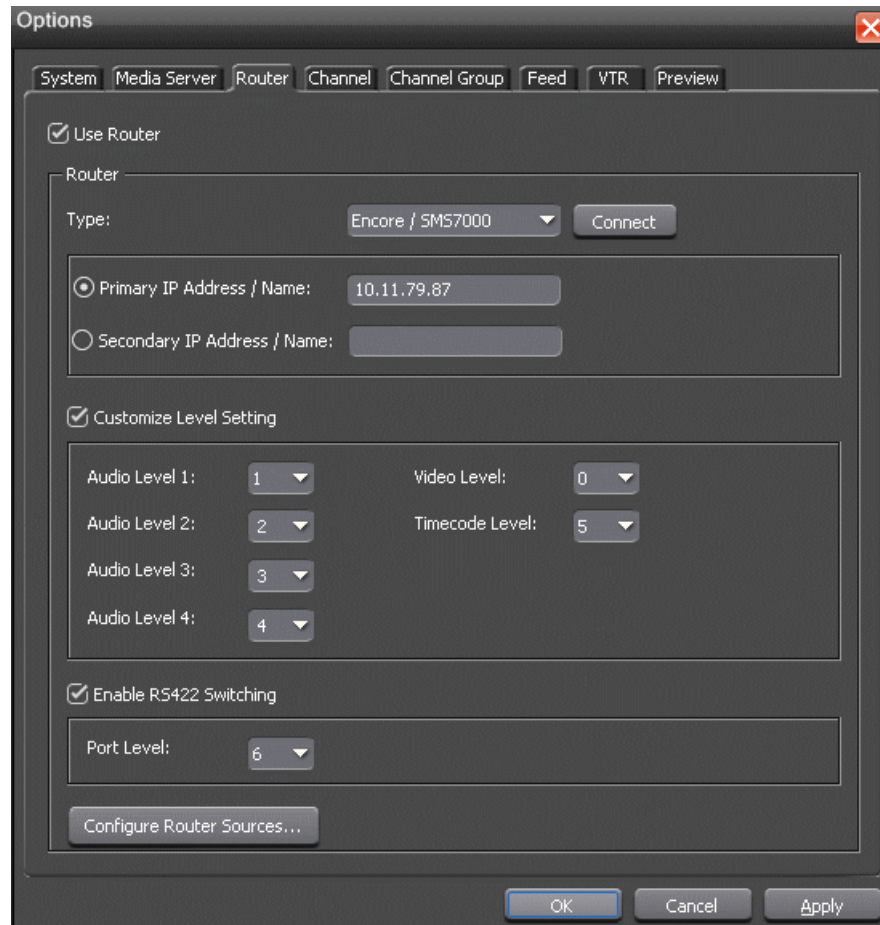
Your router can be configured for use on the Router tab within the Aurora Ingest Server's settings.

### Configuring SMS7000 and Acappella

SMS7000 and Acappella routers are easily configurable for use with Aurora Ingest.



1. Check the **Use Router** checkbox.
2. Select the router type from the drop-down list.
3. For SMS7000 or Acappella router, enter the primary IP address or name of the router that you want to connect to. If you have a secondary router within your system, you can enter the secondary IP address or name of that router as well. Then, you can select to use the secondary router from this tab, should your primary router go down.
4. Click **Connect**.
5. If you are using SMS7000, you can also customize level setting and enable RS422 switching. Select the appropriate level from the drop-down list for video, audio and timecode.



Select 0 (zero) for the video level if video is the first level in your router control system, 1 if it is the second level and so on.

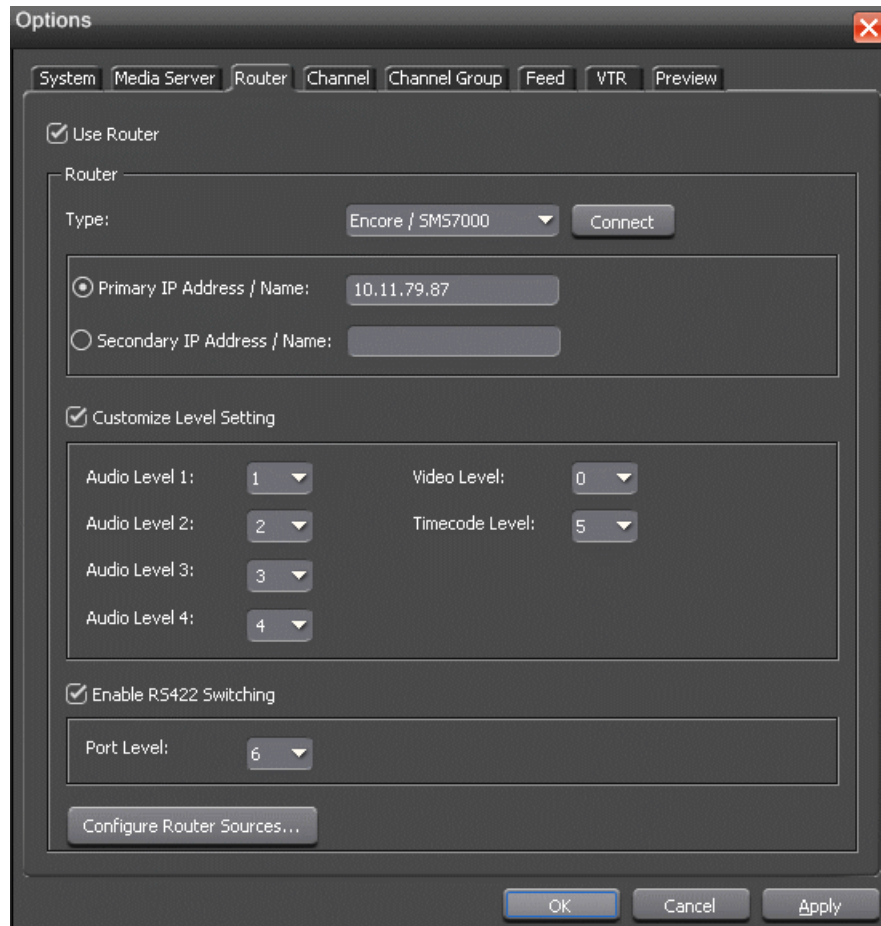
6. The RS422 switching is available for SMS7000, but not the Acappella or Jupiter routers. You can select the port level from the dropdown list. This feature enables you to switch between VTRs for each channel without having to swap the RS422 cables manually, as Aurora Ingest will switch the RS422 port.

Aurora Ingest switches video from the VTR to the video capture card whether RS422 switching is enabled or not.

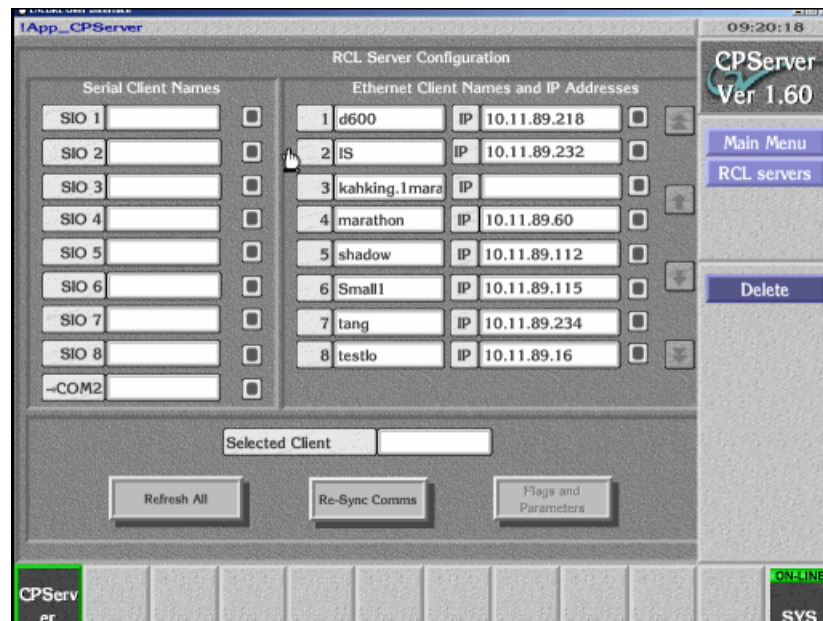
7. Click **Configure Router Sources** to configure router sources that are going to be used with Aurora Ingest clients.
8. Click **Apply** to save changes.

### Configuring Encore

Encore system can be configured to control the crosspoints of a single routing matrix, or expanded to control multiple matrices depending on your system needs.



1. Check the **Use Router** checkbox.
2. For router type, select Encore/SMS7000 from the dropdown list.
3. For Encore router, enter the primary IP address or name of the router that you want to connect to. If you have a secondary router within your system, you can enter the secondary IP address or name of that router as well. Then, you can select to use the secondary router from this tab, should your primary router goes down.
4. You also need to ensure that the IP address of your Aurora Ingest Server is entered in the RCL Server configuration of the Encore router control system. Login to Encore OUI, select App\_CPServer and RCL Servers.
5. On the Ethernet Client Names and IP Addresses section of the RCL Server Configuration window, enter the machine name and IP address of your Aurora Ingest Server.



6. Logout from Encore OUI.
7. In Aurora Ingest Server settings, click **Connect** on the router tab.
8. If needed, you can customize the level setting. Select the appropriate level from the drop-down list for video, audio and timecode.

Select 0 (zero) for the video level if video is the first level in your router control system, 1 if it is the second level and so on.

9. You can also enable RS422 switching and select the port level. This feature enables you to switch between VTRs for each channel without having to swap the RS422 cables manually, as Aurora Ingest will switch the RS422 port.

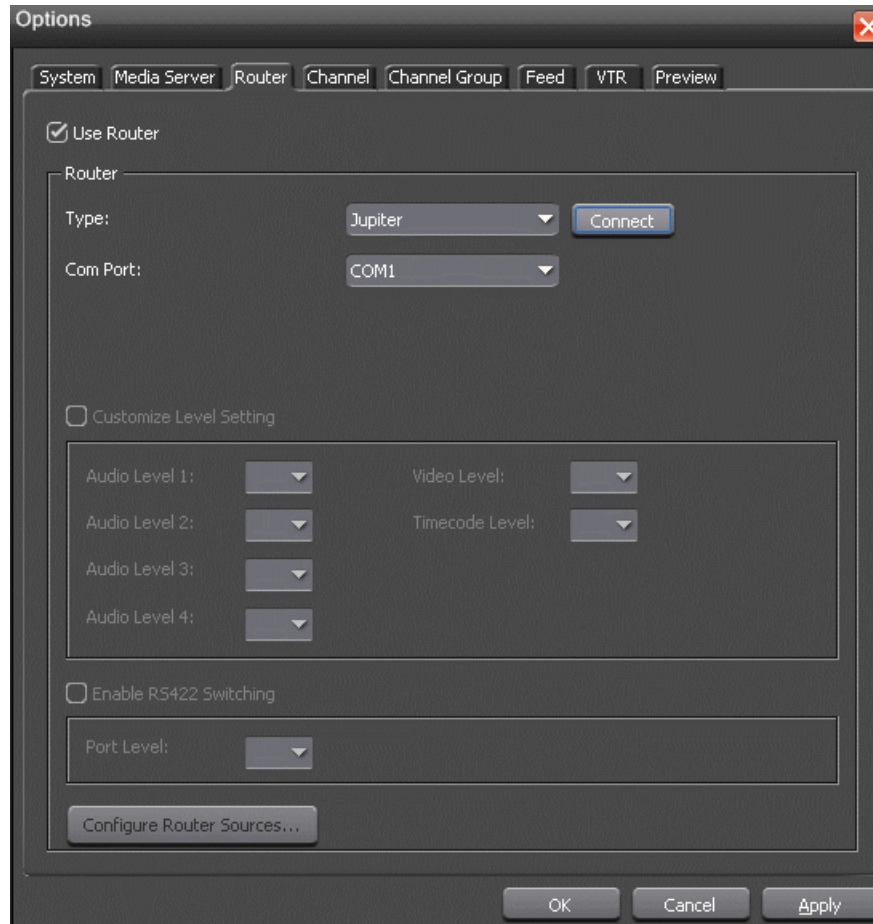
Aurora Ingest switches video from the VTR to the video capture card whether RS422 switching is enabled or not.

10. Click **Configure Router Sources** to configure router sources that are going to be used with Aurora Ingest clients.
11. Click **Apply** to save changes.

### Configuring Jupiter

When connecting to a Jupiter router, use the ESswitch interface protocol.

If you are connecting a Jupiter router using a serial hub, you need to configure a virtual COM port and install the software before configuring the router in Aurora Ingest.



1. Check the **Use Router** checkbox.
2. For router type, select Jupiter from the dropdown list.
3. For Jupiter with direct router connection via RS422, select either COM1 or COM2 (depending on your setup) from the drop-down list.
4. For Jupiter with connection via the serial hub, you need to configure a virtual COM port first and select the virtual COM port from the drop-down list.
5. Click **Connect**.
6. If needed, you can customize the level setting. Select the appropriate level from the drop-down list for video, audio and timecode.

Select 0 (zero) for the video level if video is the first level in your router control system, 1 if it is the second level and so on.

7. You can also enable RS422 switching and select the port level. This feature enables you to switch between VTRs for each channel without having to swap the RS422 cables manually, as Aurora Ingest will switch the RS422 port.

Aurora Ingest switches video from the VTR to the video capture card whether RS422 switching is enabled or not.



8. Click **Configure Router Sources** to configure router sources that are going to be used with Aurora Ingest clients.
9. Click **Apply** to save changes.

**Configuring Virtual COM port (Jupiter only)**

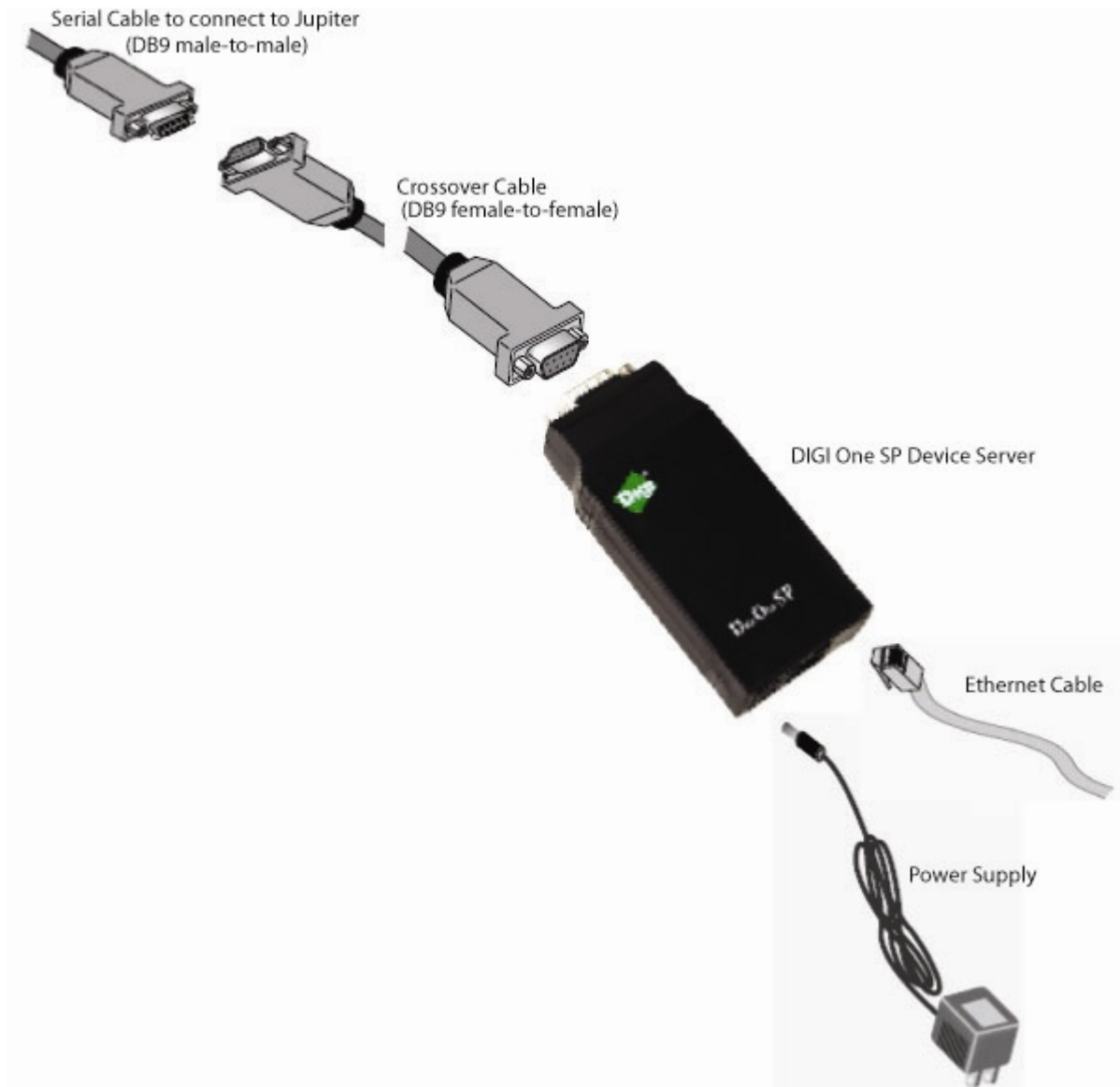
In order to connect to Jupiter router via ethernet, a serial hub needs to be configured.

When you purchase Aurora Ingest, DIGI One SP RS422 Serial to Ethernet Device Server is also provided in the same package. Before starting to configure the device server, write down the MAC address located at the bottom of the hardware.

This serial hub will act as a virtual COM port, which enables serial-to-ethernet connectivity as though Jupiter is communicating with Aurora Ingest via the local COM port.

DIGI One SP Device Server		Jupiter Router	
Pin Name	Pin Number	Pin Number	Pin Name
Rx +	2	3	Tx +
Tx +	3	7	Rx +
Rx -	6	8	Tx -
Tx -	9	2	Rx -

1. A serial crossover cable (also known as null-modem cable) is needed to allow proper communications between Jupiter router and DIGI One SP Device Server. The appropriate pinouts can be referred from the table above.
2. Connect one end of the crossover cable to the device server and the other end to RS422 serial cable to connect to Jupiter.



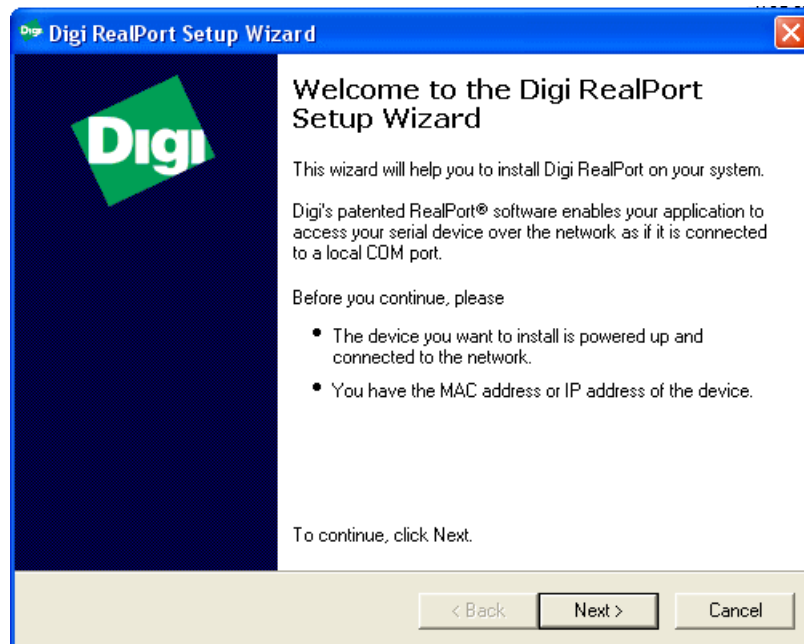
3. Connect an ethernet cable from the device server to a network point on your LAN.
4. Connect the power supply to the device server.

#### Installing Virtual COM port software (Jupiter only)

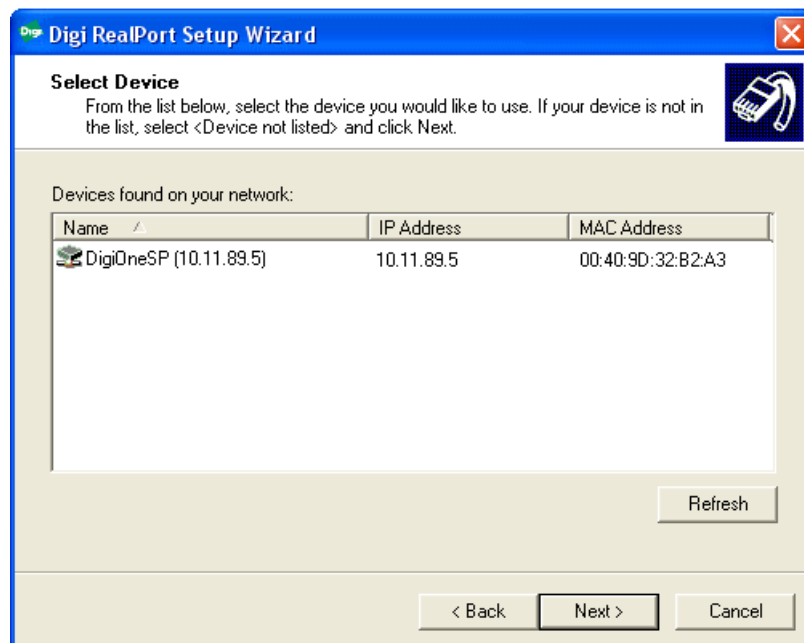
After the virtual COM port has been configured, you need to install the software.

1. Insert the DIGI CD in your CD ROM drive.
2. The setup wizard will automatically be displayed on your screen.

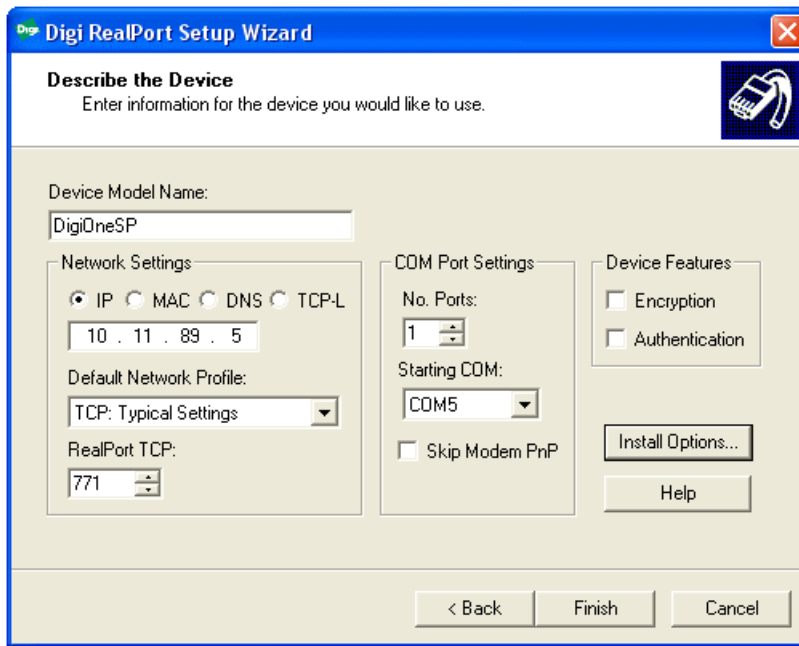
If not, navigate to the CD ROM drive and double-click **setup.exe**.



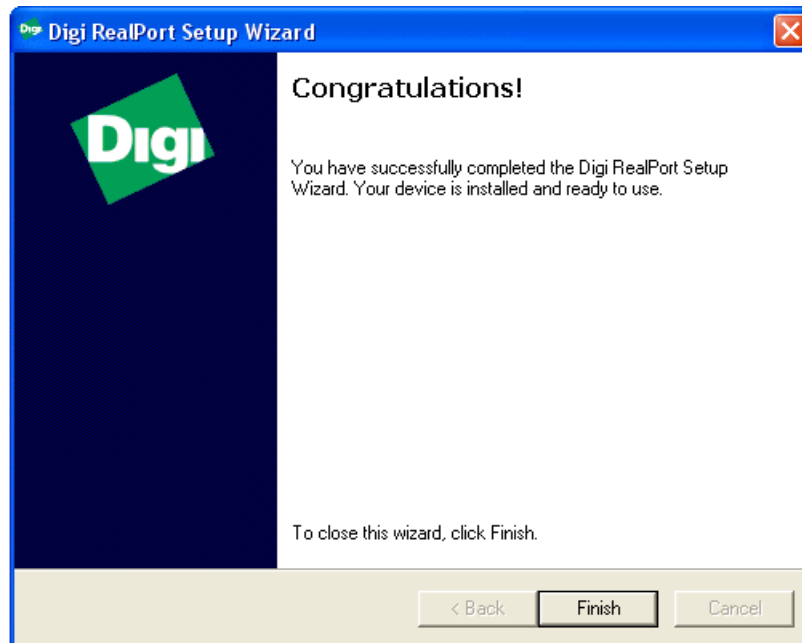
3. Click **Next** and the setup wizard will search your network to locate the DIGI One SP device server.



4. Select the device server according to its specific MAC address.
5. Take note of the device IP address and click **Next**.



6. In the Network Settings section, select **IP** and enter the IP address that had been retrieved by the setup wizard.
7. In the COM Port Settings section, set the number of ports to 1 and select the appropriate COM port from the Starting COM drop down list. This will be your virtual COM port.
8. Click **Finish**.



The setup wizard will install the software.

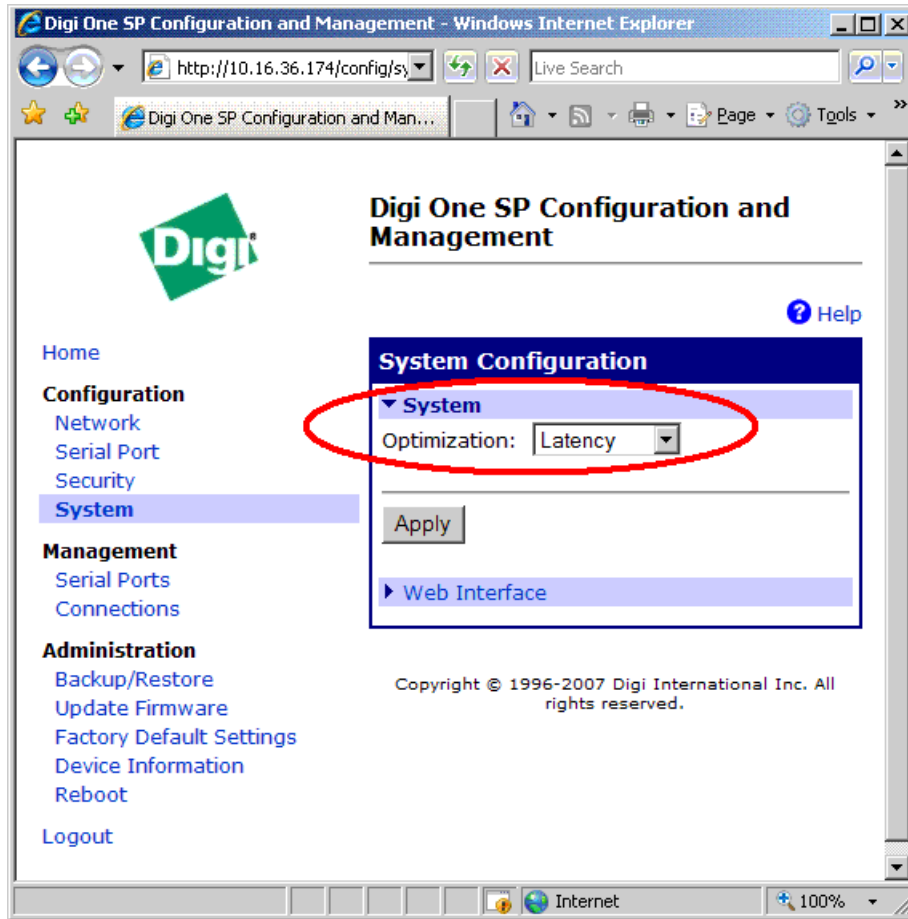
9. Click **Finish** after the installation is done.

***NOTE:*** Once you have configured the virtual COM port, it will be available in the COM Port drop down list on the router configuration window of Aurora Ingest - Server.

10. To avoid unnecessary timeouts on RS422 communication, you need to set the Digi One SP optimization routine to Latency.

This can be done by launching the configuration page on your web browser. If needed, the default username/password for the Digi One configuration page is root/dbps.

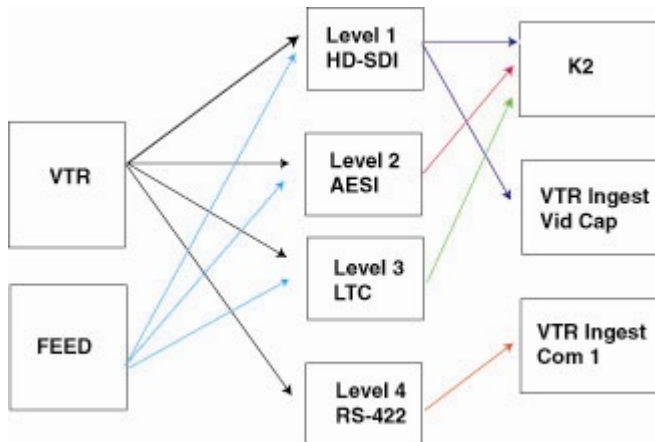
11. Then, go to the System Configuration page and select Latency from the Optimization dropdown list.



### About RS-422 switching

If RS-422 switching is not enabled, you do not have to select the levels because Aurora Ingest switches all levels when switching the router for server port switching and VTR Ingest monitoring switching. Conversely, if RS-422 switching is enabled, Aurora Ingest switches the router differently.

- Each VTR source has four levels.
- Feed sources have two (if they use VITC) or three (if they use LTC) levels.
- K2 destinations have the HD-SDI, AES and LTC levels (we know for certain VTRs use LTC).
- VTR Ingest video capture destinations have the HD-SDI level (and AES if speakers are connected).
- VTR Ingest com ports destinations have the RS-422 level.



Aurora Ingest switches:

- level 1, 2 and 3 for source-to-server port switching.
- level 1 (and 2) for VTR Ingest monitoring switching.
- level 4 for VTR to VTR Ingest Com Port switching.

#### Configuring router sources

You can select specific router sources to record clips with Aurora Ingest clients.

1. Click the **Configure Router Sources** button on the router tab.



Aurora Ingest connects to the router and queries the list of sources. The Configure Router Sources dialog box displays, showing the available sources.

2. In the Feed window, you can enable the router sources that are connected to the CompuSat satellite feed. You can also rename the router source in the “Source Name” column.

**NOTE:** *Once you have enabled the Feed router sources, a list of enabled Feed router sources is available on the router source list within the Channel window and Add Event dialog box of the Scheduler application.*

3. In the VTR window, you can enable the router sources that the VTRs are connected to. You can also rename the router source in the “Source Name” column.

**NOTE:** *Once you have enabled the VTR router sources, a list of enabled VTR router sources is available in the Channel window of VTR Ingest application.*

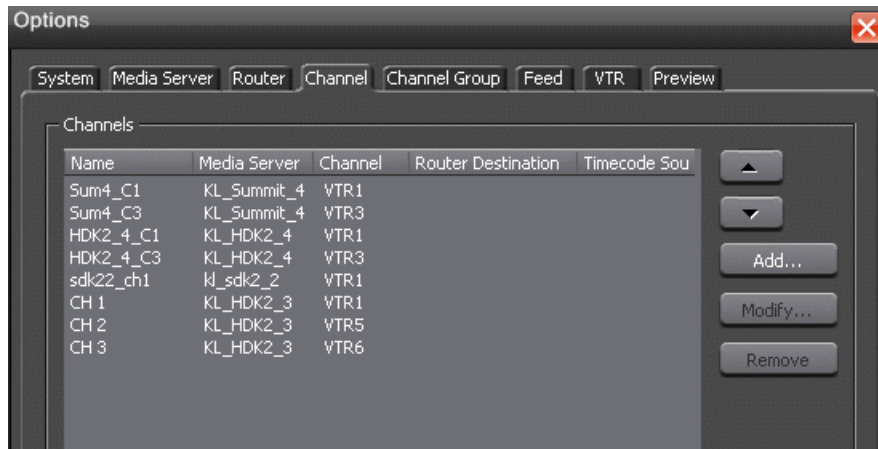
4. Click **OK** to exit the Configure Router Sources dialog box.

The settings will take effect once you click **Apply** in the Options dialog box.



## Configuring Channels

The number of channels is limited only by your media server hardware. You need to configure each channel in order to record clips.

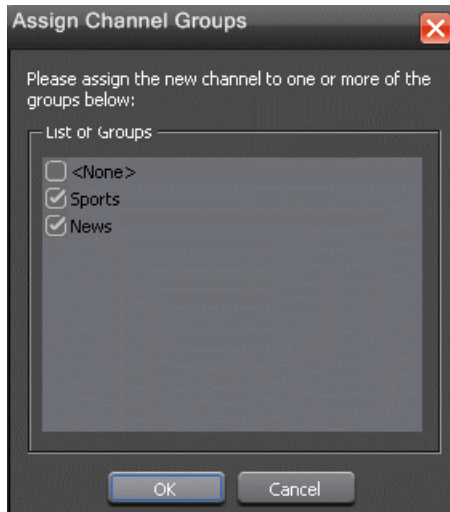


1. Click the **Add** button on the channel tab.
2. Configure the channel on the Add Channel dialog box.
3. Channel details can be entered as below:

Setting	Description
Name	Enter a name for the channel. This name identifies the channel in Aurora Ingest Server and its clients.
Media Server	Select media server for the channel from the dropdown list. (Media servers are configured within the Media Server tab.)
Channel	In the drop-down list, select or enter the name of the media server channel you are using to record, such as VTR1, VTR2, VTR3, etc.
Timecode Source	Optional: Select the timecode source for the channel. You can choose from Internal, LTC, Time of Day and VITC.  <b>NOTE: Leaving this setting blank will use the default Timecode Source setting as defined on the Feeds tab.</b>
Router Destination	Select a router destination from the drop-down list. If you haven't configured your router sources or are not using a router in your operation, the drop-down list will be empty. (Router sources are configured within the Router tab.)

**NOTE: Each K2/Summit channel should be connected to either Aurora Ingest or Aurora Playout only. Connecting to both applications at the same time could cause channel conflicts.**

4. If channel groups were configured prior to channel setup, you have to assign the channel to a channel group. The Assign Channel Groups window will be displayed when you click **OK** after configuring your new channel.



5. Select the channel group for the new channel to be assigned to, and click **OK**.

**NOTE:** Channels can belong to more than one group.

#### Modifying a channel

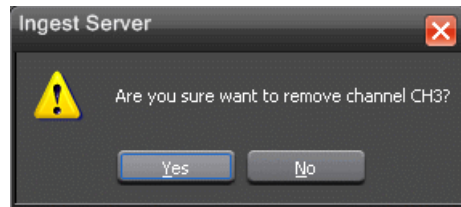
You can modify channel settings on the channel tab of Aurora Ingest - Server options setup.

1. Select the channel and click the **Modify** button.
2. Change any details on the channel configuration and click **OK**.

#### Deleting a channel

You can delete a channel on the channel tab of Aurora Ingest - Server options setup.

1. Select the channel and click the **Remove** button.



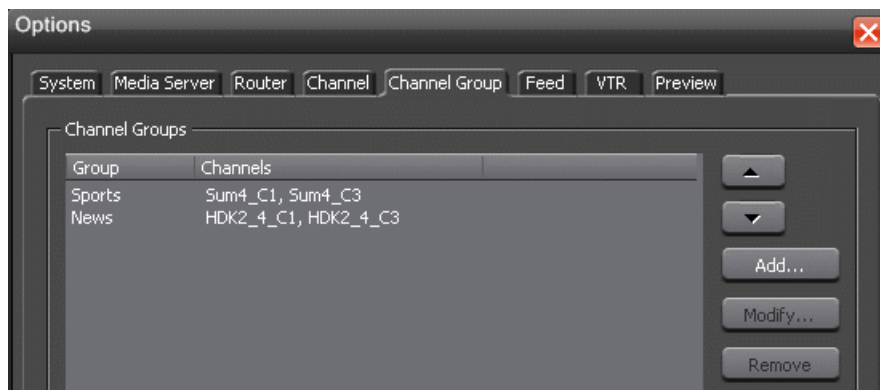
The confirmation window is displayed.

2. Click **Yes** to confirm the removal of the channel.

## Configuring Channel Group

The Channel Group settings can be used to organize channels into several categories according to broadcasting needs. The feature lets you specify group names and assign channels to be included in those groups.

For example, “News” channel group could contain several channels that ingest assets related to local news, national news, world news and breaking news. While other channel groups contain channels that ingest assets related to their own group.



Setting	Description
Group	Enter a name for the channel group. This name identifies the channel group for Aurora Ingest - Server and its clients.
Channels	Select channels to be assigned to the channel group. If desired, a channel could also be assigned to several channel groups. If a channel is assigned to all groups, the particular channel is available for all users of Aurora Ingest clients.

**NOTE:**

*The availability of a channel is according to the user logon setup. Channel groups are assigned to users in the Aurora Ingest Server by the system administrator. With*

*this setup, auto-assign of recording channels will be limited to a group of channels that is assigned to the particular user.*

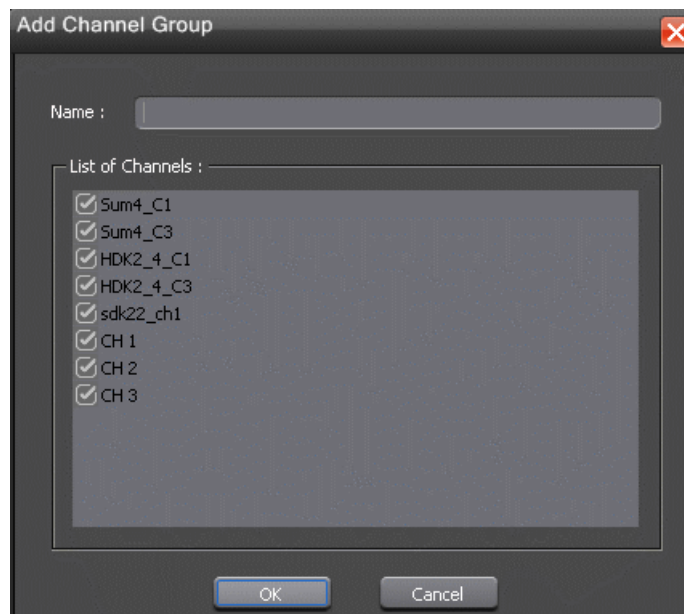
### Adding a channel group

Channel groups can be created on the Channel Group tab on the Aurora Ingest Server options setup.

1. Click the **Add** button.

By default, all channels are selected when you create a new channel group. You can deselect channels by unchecking boxes that are not to be assigned to your channel group.

2. Enter the name of the channel group, assign channels to the group by deselecting unwanted channels and click **OK**.



### Modifying a channel group

Once a channel group is created, you can still modify channels to be included in that group via channel group setup on the Aurora Ingest - Server.

1. Select the channel group and click **Modify** button.
2. Edit the name of the channel group, check or uncheck channels for the group and click **OK**.

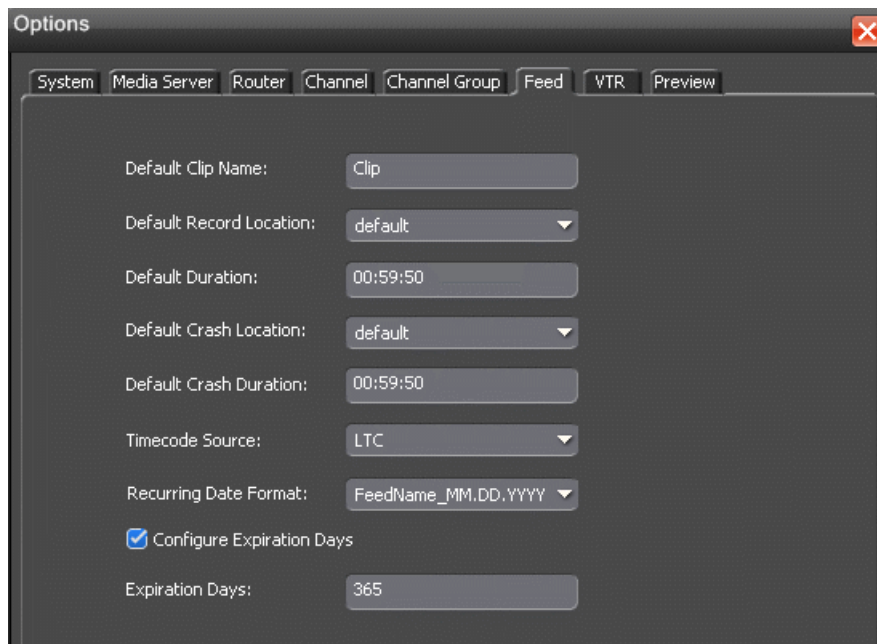
### Deleting a channel group

If you need to delete a channel group, you can do so on the channel group tab of Aurora Ingest - Server options setup.

1. Select the particular channel group and click **Remove**.  
A dialog box pops up for your confirmation to remove the channel group.
2. Click **Yes** to confirm the removal of the channel group.

### Configuring Feed

You need to configure the Feed tab on Aurora Ingest - Server for your Scheduler client.



Setting	Description
Default Clip Name	Specify the default clip name.
Default Record Location	Enter the default location for any scheduled record event.
Default Duration	Enter the default duration for any new feed event you schedule. (00:59:50 by default). To easily schedule back-to-back records, adjust the default duration by 10 seconds in order to avoid a recording conflict. For example, for a 1 hour feed duration, set the default duration to 00:59:50.

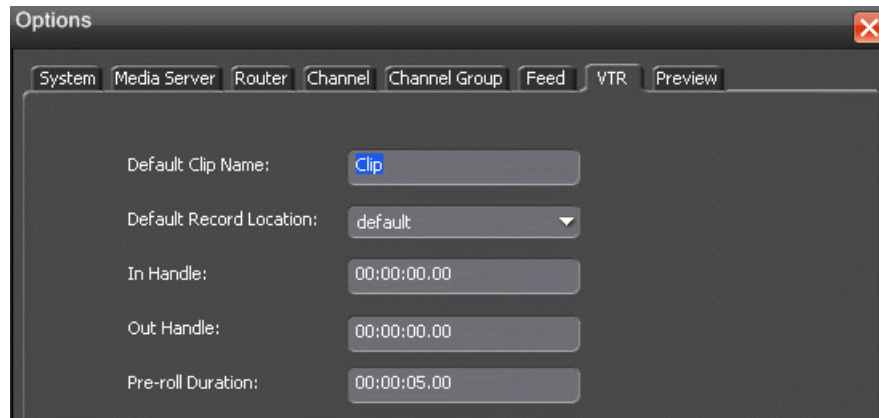
Setting	Description
Default Crash Location	Enter the default location for any un-scheduled, i.e. crash record event. Unless specified differently, all crash records will go to the same folder name on all media servers.
Default Crash Duration	Enter the default duration for any un-scheduled record event.
Timecode Source	Select the timecode source from the drop-down list: Internal, LTC, Time of Day, or VITC.
Recurring Date Formatting	Select the date format for your recurring events from several choices in the drop-down list.
Configure Expiration Days	Check the box if you want to set a default availability period of your metadata before it is set to expire.
Expiration Days	Enter the number of days that you want to set before your metadata expires. The minimum is 1 day and the maximum number is 365 days.

## Configuring VTR

You need to configure VTR setup on Aurora Ingest - Server before using VTR Ingest client.

Configuring VTR Ingest is a two-step process.

1. Populate the fields in the VTR tab under **Tools | Options** in the Aurora Ingest - Server application.
2. Populate the VTR information under **Tools | Options** in the VTR Ingest application and verify that it matches the VTR information under **Tools | Options** in the VTR Controller application.

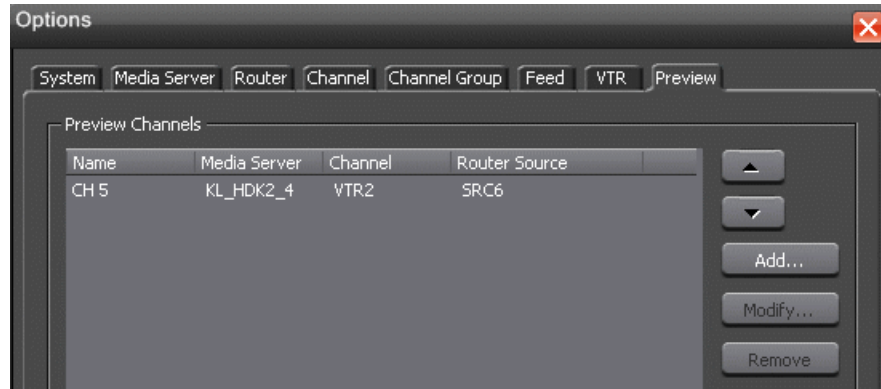


Setting	Description
Default Clip Name	Specify the default clip name.
Default Record Location	Enter the default location for any VTR Ingest record event.
In Handle	Handles allow you to have additional frames to use while editing. Enter the duration you want for the In and Out Handles (0 seconds by default).
Out Handle	
Pre-roll Duration	Enter the number of seconds of pre-roll you want to use when recording clips (5 seconds by default).

## Configuring Preview Channel

With the high resolution asset viewer in Aurora Ingest - Scheduler, users can view a previously recorded asset or a currently recording item.

The configuration of playback channel for this asset viewer is done in the Preview tab within **Tools | Options** of Aurora Ingest - Server.



1. To configure the channel, click the **Add** button.
2. Enter the name of the channel and select the media server from the dropdown list.
3. Then, select the channel and router source from the dropdown list.
4. Click **OK**.

After the preview channel had been configured, you can select it from the Player channel dropdown list within Tools | Options of Aurora Ingest - Scheduler.

#### Modifying a preview channel

You can modify preview channels on the preview channel tab of Aurora Ingest - Server options setup.

1. Select the preview channel and click the **Modify** button.
2. Edit the channel configuration and click **OK**.

#### Removing a preview channel

You can remove a preview channel on the preview channel tab of Aurora Ingest - Server options setup.

1. Select the preview channel and click the **Remove** button.  
A dialog box pops up for your confirmation on the channel removal.
2. Click **Yes** to confirm the removal of the preview channel.

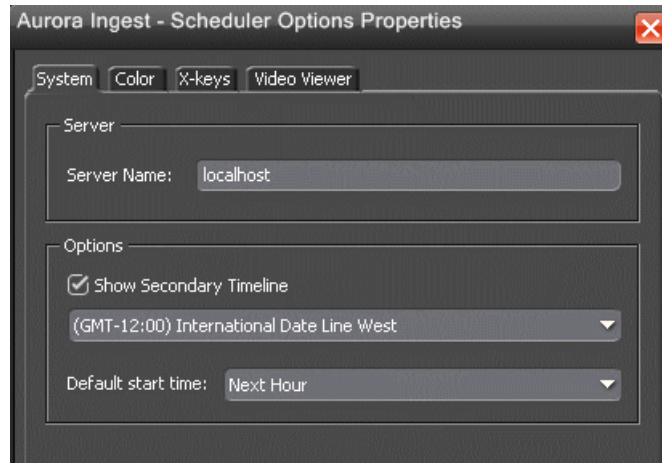
## Configuring Scheduler application

After you have configured Scheduler in the Aurora Ingest Server, you need to configure the options in the Aurora Ingest - Scheduler application.

The tabs that you need to configure within the Scheduler application are System, Color, X-keys and Video Viewer.



1. In Aurora Ingest - Scheduler, select **Tools | Options**.



The Scheduler options properties window displays.

2. On the System tab, specify the Aurora Ingest Server for your operation. If you want to use an Aurora Ingest Server that is hosted on another machine, you need to specify the server name here.
3. In the Options section, you can select to show a secondary timeline on the Aurora Ingest - Scheduler main window.

This feature allows you to display dual time zones on the Scheduler application, which is of great use for global operations.

4. Select the time zone that you need from the dropdown list for your secondary timeline.



Once configured, Scheduler will display both primary and secondary clock and timelines on the main window.

5. You can also set a default start time for a newly added event. The default start time ranges from 30 seconds to the next hour on the drop-down list.

The default start time that you set will appear in the Add Event dialog box.

**NOTE:** *If you set the default start time to 10 minutes and click the Add Event button at 11.10 am, the default start time in the Add Event window will be set to 11.21 am after allowing 10 minutes default between adding and recording*

*the event. However, the default start time will not be applicable for a crash record or a Quick Schedule event.*

6. Click **Apply** to save changes without exiting the Options window.

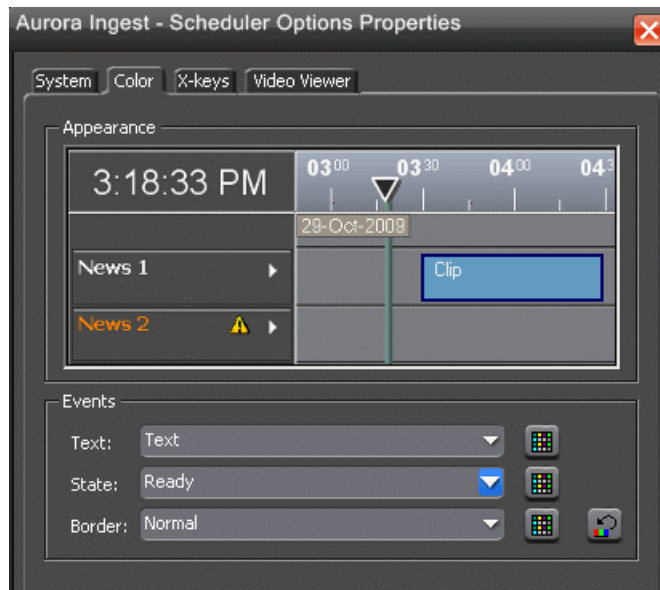
## Customizing color for Scheduler


You can customize status colors for Scheduler application if needed.

The setup is on the color tab of the Scheduler Options dialog box.

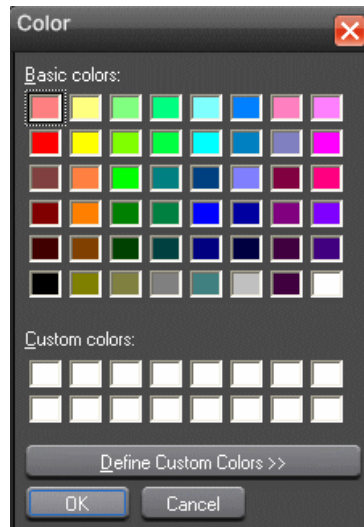
1. Select the Color tab to customize status colors in the Aurora Ingest - Scheduler application.

You can change the color of text, state and border of events if desired.

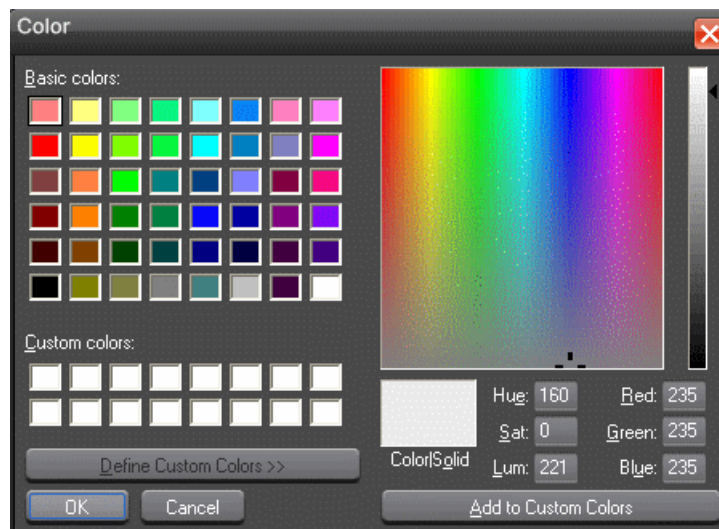


2. To change the text color, click text on the drop-down list and click the  color palette button.
3. Select the text color that you want from the color palette display.

You can choose either to use basic colors as provided or define your own custom colors.



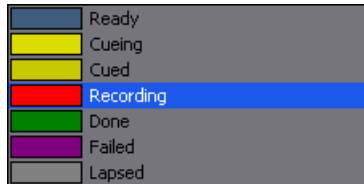
4. To create custom colors, click the **Define Custom Colors** button.



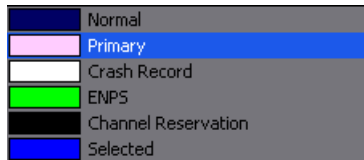
The color palette window expands to provide more color options.


5. To change the luminance value of your color, move the right arrow up and down with the minimum value at the bottom and maximum value at the top of the scale.
6. To change the hue, move the crosshair marker left and right with the minimum value on the most left and maximum value on the most right.
7. To change the saturation value of your color, move the crosshair marker up and down with the minimum value at the bottom and maximum value on top.

- Click the **Add to Custom Colors** button to add the color that you chose to the Custom colors section on the color palette.
- Select the text color that you want for Scheduler application and click **OK**.
- To change the color of 7 states of events in the Scheduler, select the state from the drop-down list:



- Follow steps 4-8 if you want to customize your own state colors.
- Select the color for each state from the color palette and click **OK**.
- To change the color of an event border, select the border from 6 types of borders in the dropdown list:



- Follow steps 4-8 if you want to customize your own border colors.
- Select the color for each border from the color palette and click **OK**.
- Click Apply to implement your color changes.
- To reset back to default colors, click the  Reset button.

A dialog window is displayed for you to confirm the reset of the color scheme.

- Click **Yes** to confirm the reset of your color scheme and click **Apply** to implement your color changes.

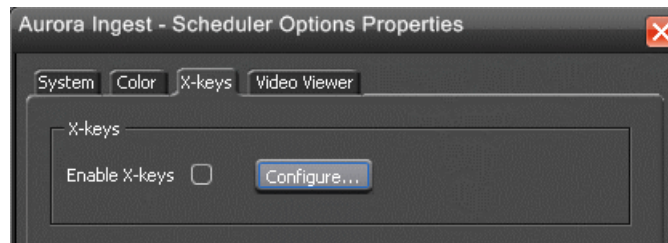
## Customizing X-keys for Scheduler

You can preview and edit assets in Scheduler using X-keys Jog/Shuttle Controller.

Each button of the X-keys can be customized to suit the functionality that you need.

The setup is within the X-keys tab of the Scheduler Options dialog box.

- Select the X-keys tab.



2. Check the Enable X-keys box to activate the X-keys feature.
3. Click the **Configure** button to start configuring your X-keys.

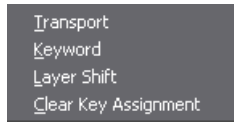
Some of the X-keys have been pre-configured on the Green layer, mostly with transport control functions. You can still change the default layout or add new commands on the unused keys.



**NOTE:** Before you can use the X-keys Jog/Shuttle controller, you need to install the X-keys Macro Works software. However, do not use the X-keys Macro Maker application to modify the keys.

4. To customize a key, click on the key that you want to configure or modify.

A drop-down list displays the available commands.



5. Select a command to apply to this key.
6. Repeat steps 4 and 5 to configure additional keys.
7. Once you have finished configuring those keys, click **OK**.

## Using the X-keys Jog/Shuttle Controller

The X-keys controller allows you to simplify your workflow. For example, you can just press customized keys to easily preview and edit assets within video viewer windows.

Any commands you send using the X-keys controller apply to the currently active window, which is considered to have **focus**. When the window has focus, you can perform tasks such as navigating through a clip or trimming a clip. Always bear in mind that you need to give focus to a window before you can apply the X-keys controller commands to it.

The following table describes the functionalities of keys that can be customized for your X-keys Jog/Shuttle controller. Some of these keys had been pre-configured on the Green layer. If necessary, you can configure more keys either on the Green layer or the Red layer.

Setting	Description
Layer	Indicates whether you are configuring the Red or Green layer.
Reset All Keys	Resets all the keys on the particular layer that you are configuring. Reset All Keys does not affect keys that shift between the layers, i.e. the Toggle, Red, and Green keys.
1 Back	Jogs the clip backward 1 frame.
1 Fwd	Jogs the clip forward 1 frame.
10 Back	Jogs the clip backward 10 frames.
10 Fwd	Jogs the clip forward 10 frames.
Play/Stop	Plays or stops the clip.
Play St	Plays a clip from the start.
Mark In	Marks a new In point for a clip.
Clear In	Clears the In point of a clip.
Goto In	Goes to the In point of a clip.
Mark Out	Marks a new Out point for a clip.

Setting	Description
Clear Out	Clears the Out point of a clip.
Goto Out	Goes to the Out point of a clip.
FF	When the focus is on a video viewer window, you can press the FF button to fast forward through the clip.
Rew	When the focus is on a video viewer window, you can press the Rew button to rewind the clip.
Shuttle/Varispeed	Determines whether video continues to shuttle forward after releasing the shuttle wheel.
Keyword	Adds keyword to a specific duration within the clip. You need to set the mark in and mark out points before adding the keyword. You can also define the name of the keyword that will be inserted when you press the assigned key.
Keyframe	Adds keyword to a specific point within the clip. You can also define the name of the keyword that will be inserted when you press the assigned key.
Auto Mark	Adds keyword of a pre-defined duration, starting from the current position.
Green	Switches to the Green layer.
Red	Switches to the Red layer.
Toggle	While you are using the X-keys controller, pressing Toggle switches between the Red and Green layers.
Clear Key Assignment	Clears an assigned key, so that you can select another function for that particular key.
Variable Speed Presets	Preset speeds that you can access by using the shuttle/varispeed wheel of the X-keys controller. You can modify these speeds to suit your operation.

In addition to keys, the controller comes with jog/shuttle knob. The jog control, the center disk of the knob, allows you to make precise frame by frame selections for editing. The outer rim can be used in Shuttle or Varispeed mode.

Shuttle and Varispeed modes both allow you to play clips at various preset fast forward, rewind, and slow-motion speeds. In Shuttle mode, when you release the knob the clip stops. In Varispeed mode, when you release the knob the clip keeps playing until you press the Stop key.

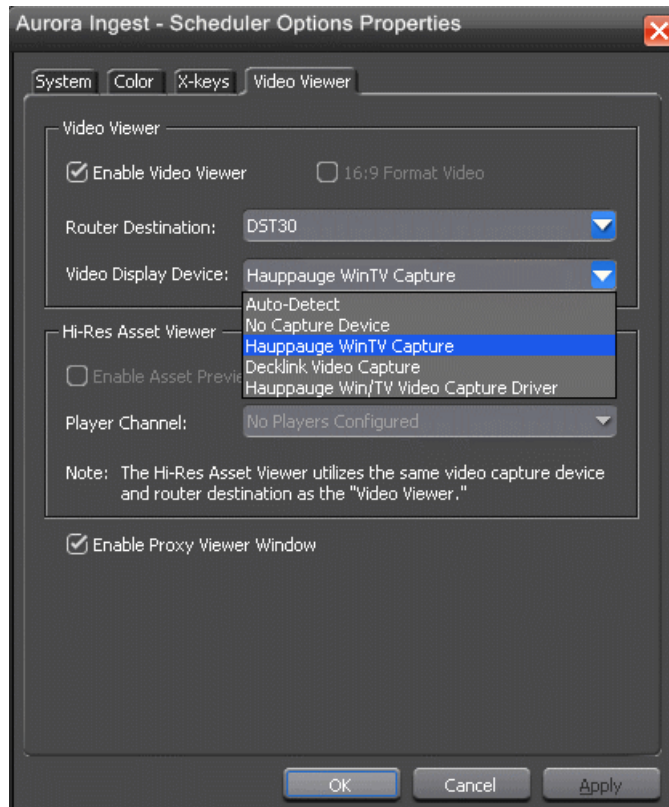
## Customizing video viewer for Scheduler

You can customize video viewer, asset viewer and proxy viewer of the Scheduler.

If you have the optional Hauppauge WinTVGo video capture card or Blackmagic Design DeckLink video capture card installed in your scheduler machine and a router configured in your system, you will need to define the destination of the router connected (via digital to analog converters, if needed) to your video capture card.

The setup is within the Video Viewer tab of the Scheduler Options dialog box.

1. Select the Video Viewer tab.
2. Check the **Enable Video Viewer** box to have a video viewer in your Scheduler application. This feature enables user to view the asset as it is ingested into the media server.
3. If desired, check the 16:9 video format.
4. If using a router, select the router destination from the drop-down list. If no router has been configured, this field will be grayed out.
5. If you have installed a video capture card, select the device in the Video Display Device drop-down list.



6. Select **No Capture Device** if you want to view the asset via a separate video monitor.
7. Once the Hauppauge WinTV video capture card or Blackmagic Design DeckLink video capture card is configured for the video viewer, it could also be utilized for the high resolution asset viewer.
8. The High Resolution Asset Viewer enables users to view ingested asset in the media server and edit assets with Mark In/Out points via the asset viewer controls. To enable the feature, check the **Enable Asset Preview Window** box in that section.





9. Select the player channel of the asset viewer from the dropdown list. The channel setting is done in the Preview tab within Tools | Options of Aurora Ingest Server.
10. If you want to view proxies within the MediaFrame plug-in, select the **Enable Proxy Viewer Window** checkbox.

**NOTE:** *You can't select both **Asset Preview Window** and **Proxy Viewer Window** at the same time. You can either choose to view hi-res video on an Asset Viewer or lo-res video using MediaFrame.*

11. Click **OK**.

## Configuring VTR Controller Application

In order to establish a connection between VTR Ingest and a VTR, you need to configure the VTR Controller application.

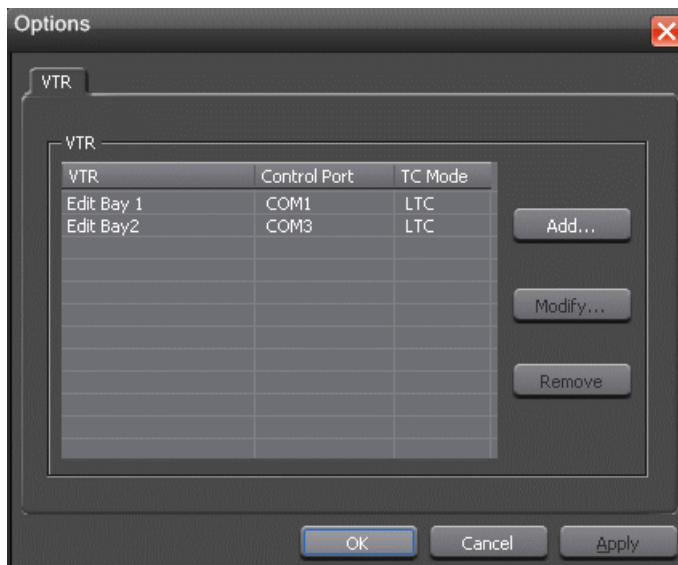
VTR Controller can be installed on the same machine as the VTR Ingest application, but this is not required.

1. From the Windows Start menu, select **Programs | Grass Valley | Aurora | VTR Controller**.



The VTR Controller application opens.

2. Select **Tools | Options**.



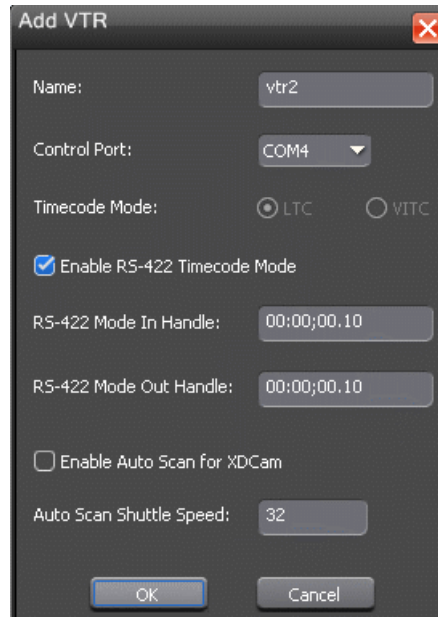
The VTR Controller Options dialog box displays.

3. Click the **Add** button.

A dialog box displays that allows you to enter a name and select a control port and timecode mode.

- Without a physical LTC connection, timecode can still be polled via RS-422. Check the option to enable RS-422 timecode mode in the Add VTR window if you want to poll the timecode.

Records with RS-422 timecode mode have a frame accuracy recording window of +/- 10 frames. Due to this, in and out handle settings are provided within the setup.



Once configured, timecode is no longer a required input and records on VTR Ingest will be triggered with timecode detection via RS-422.

- You can set In and Out Handles for recordings with VTR using the RS-422 timecode mode. Both handles are set to 10 frames by default.
- If you are using an XDCAM VTR, you can select the checkbox to enable auto scan for the XDCAM VTR.

The XDCAM VTR does not adhere to typical RS-422 shuttle commands. By enabling the auto scan feature for XDCAM VTR, previous and next commands will be used instead of the usual shuttle forward and back.

- You can also change the shuttle speed for the auto scan feature.

The default is set to 32, but you can change to any value depending on the type of VTR that you use. When XDCAM mode is selected, the field to set the shuttle speed of auto scan will be disabled.

- Click **OK** to add the VTR.



After you have successfully added the VTR, you should see it displayed in the VTR Status window with a green indicator next to its name.

Once you have added VTRs, you can modify or delete them. However, if you only have one VTR displayed in the status window, you cannot delete it and have an empty status window.

### Troubleshooting VTR Controller configuration

If you see a red indicator next to the VTR's name, try restarting VTR Controller.

If the VTR status still displays a red indicator, verify the following:

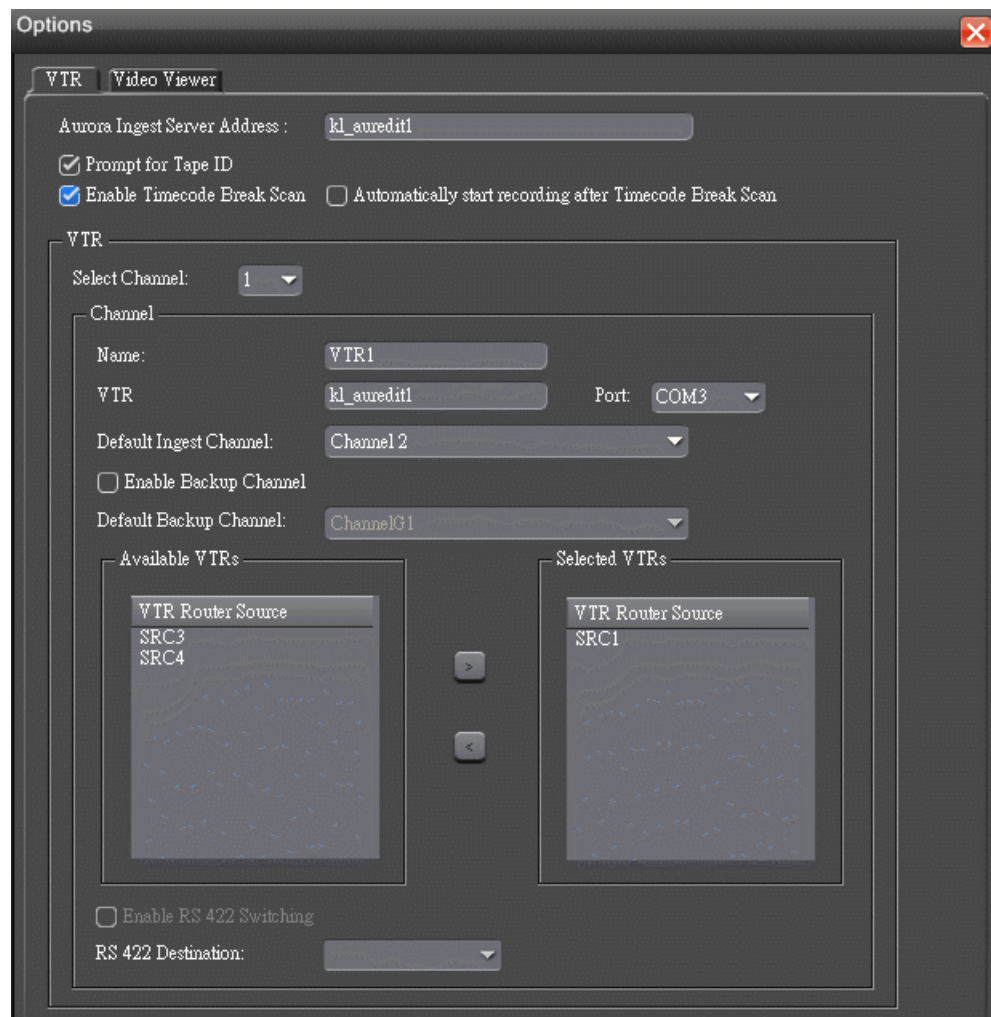
- Check your VTR Ingest configuration and make sure the VTR information matches the information you entered when configuring VTR Controller.
- The correct COM port has been specified for the VTR.
- The COM port is not being used by another application controlling the VTR.
- The VTR is turned on.
- The hardware has been correctly installed.
- The IP address or computer name where VTR Controller is installed matches the address or name in the VTR Ingest application.

### Configuring VTR Ingest application

You need to configure the VTR Ingest application before using it.

Make sure you have already configured the VTR Controller application before completing this section. The VTR information in these two applications needs to match.

1. In the VTR Ingest application, select **Tools | Options**.

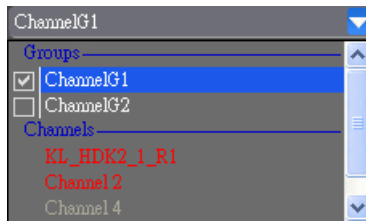


2. In the VTR tab, enter the IP address or host name of the Aurora Ingest - Server.
3. If desired, check the **Prompt for Tape ID** box.

This feature allows you to customize the identification of your tape. If you don't enter a tape ID, VTR Ingest prompts you to enter the ID before you ingest the first clip.

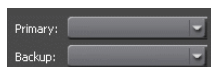
4. You can also enable the Timecode Break Scan feature. It allows you to scan and capture media from a tape according to timecode breaks.

5. If needed, you can select the option to automatically start recording after the Timecode Break Scan.
6. Select a channel from the drop-down list and enter the name of the channel.
7. Enter the IP address or name of the computer where VTR Controller is installed. (If VTR Controller is installed on the same machine, enter **localhost**.)
8. Select the COM Port from the drop-down list.
9. When using channel groups, the Default Ingest Channel drop-down list reflects the configuration that had been set for the user. You can select one or more groups, or select individual channels depending on your setup.
10. Once a channel group is checked and selected, individual channels within that group become red in the drop-down list and they can no longer be individually selected.



11. If a user or user group is configured to belong to no channel groups, then those users could see and select all available channels within the drop-down list.
12. If you want to record to two different locations through VTR Ingest, you can check the Enable Backup Channel box and select a channel from the Default Backup Channel drop-down list.

**NOTE:** *Once the option to enable backup channel is selected, a Backup channel drop-down list appears within VTR Ingest channel windows. You can easily select other backup channels from the drop-down list if needed.*

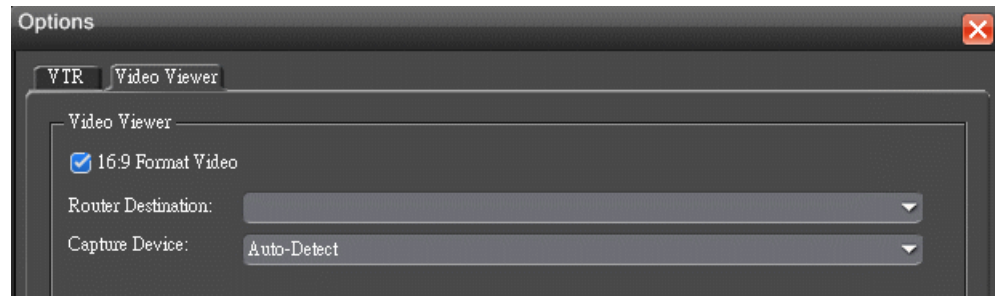


13. From the list of available VTRs, select the VTR router source.  
Once selected, the router source is displayed in the Selected VTR box.
14. You can also check the **Enable RS-422 Switching** box and select the RS-422 destination.
15. To make the changes but keep the Options dialog box open, click **Apply**.
16. Proceed to configure video viewer in the Video Viewer tab.

If you have the optional Hauppauge WinTVGo video capture card or Blackmagic Design DeckLink video capture card installed in your VTR Ingest machine, you

will need to define the destination of the router connected (via digital to analog converters, if needed) to your video capture card.

17. In the Video Viewer tab, check the 16:9 format video if desired.
18. Select the router destination from the drop-down list. If no router has been configured, this field will be grayed out.



19. For the Capture Device drop-down list, select **No Capture Device** if you want to view the asset via a separate video monitor.
20. If you have installed a video capture card, select the device in the capture device drop-down list.
21. Click **OK** after you are done with the configuration.

The VTR Ingest application is now ready for use.

## Setting up K2 Summit for RMI import

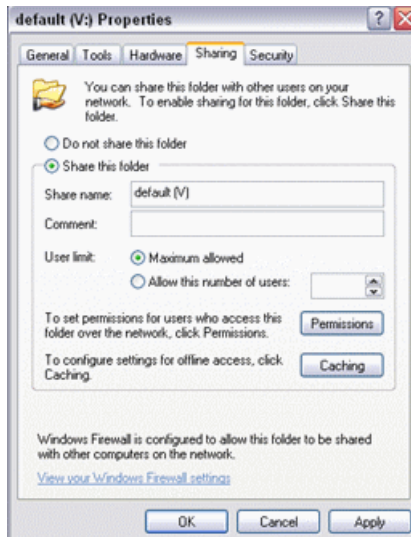
These additional steps need to be adhered to in order to ensure RMI import into K2 Summit is successful.

One of the pre-requisites of RMI installation is to install GVG MLib. During the installation, ensure that you enter the FSM Server Name.

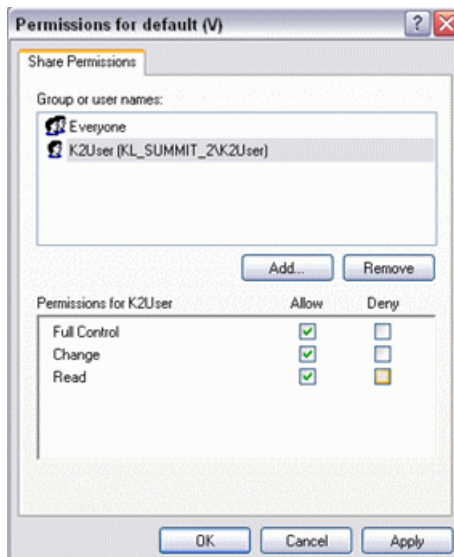
- If you are importing into the standalone K2 Summit, key in the hostname of the K2 Summit Production Client.
- If you are importing into K2 shared storage, key in the K2 SAN server hostname.

If you are importing to a standalone K2 Summit, you will need to do the following extra steps:

1. Go into the K2 Summit and right-click the media drive to select the **Sharing and Security** option. The below window will be displayed.

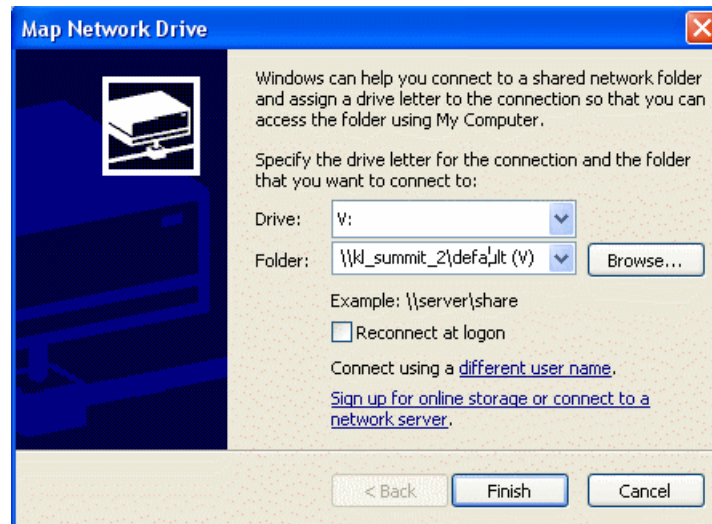


2. Select the **Share this folder** option.
3. Click the **Permissions** button to display the following window:



4. Select **Full Control** to the user account which will be used to connect to the K2 Summit's media drive from RMI and click **OK**.
5. Then, you need to map the drive on the machine that is hosting your RMI application. From your Windows Explorer, select **Tools | Map Network Drive** and the below window will be displayed:





6. Select the same drive letter as the media drive on K2 Summit and browse to the K2 Summit's media drive shared folder.

**NOTE:** *If a permission dialog pops up, use the account that had been set earlier which allows write permission into the K2 Summit.*

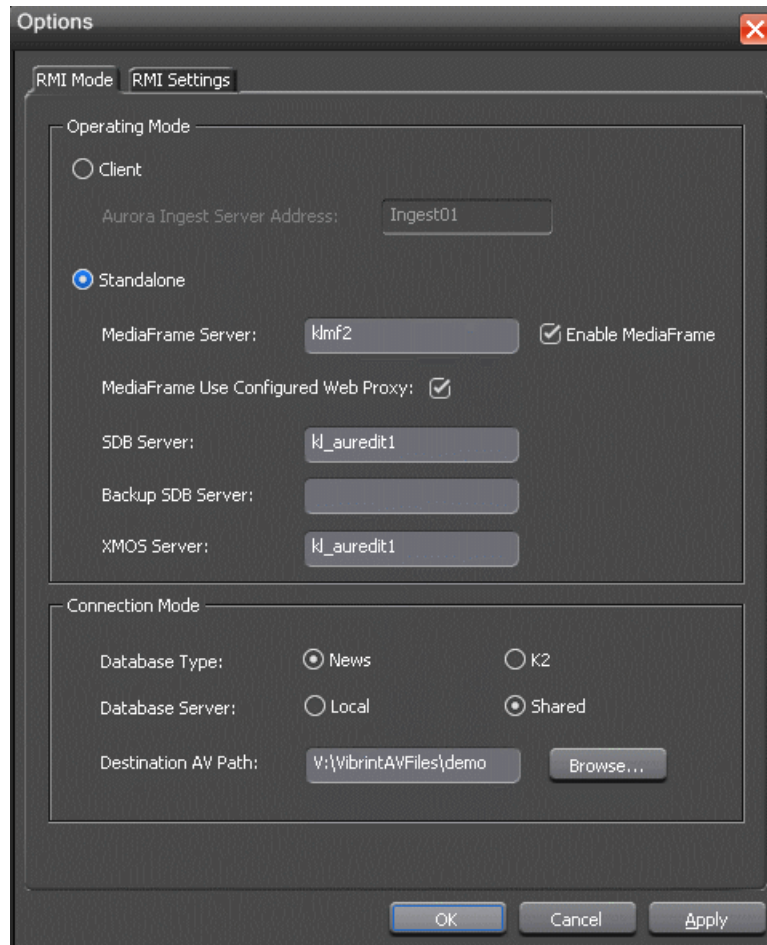
7. Click the **Finish** button.

**NOTE:** *RMI needs to be an iSCSI client. If it is CIFS to a standalone, then currently importing files cannot be opened in the K2 Summit or performance problems will occur.*

## Configuring RMI application

Once RMI is successfully installed, you can enter RMI Options setup to configure the RMI.

On the RMI application, select **Tools | Options** to launch the Options window with RMI Mode and RMI Settings tabs.

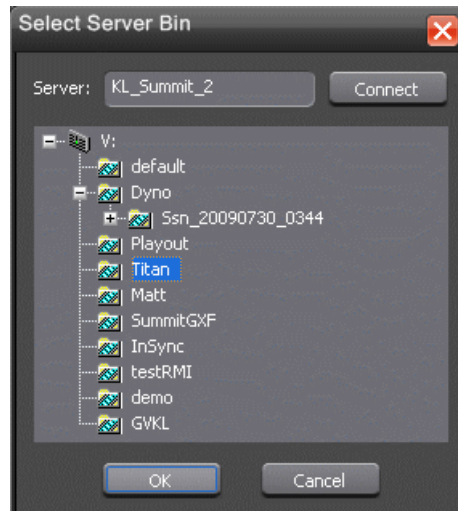


1. For the RMI operating mode, you can choose either to have a Standalone RMI or RMI Client during installation. RMI Client requires Aurora Ingest Server, while Standalone RMI requires a local database so that it can recognize previously imported clips and disks.
2. If you are configuring the RMI Client, specify the Aurora Ingest Server.
3. For Standalone RMI, you can enable MediaFrame and specify the MediaFrame Server.
4. If you want your MediaFrame connection to use the configured web proxy, check the box for that.
5. You can also specify SDB Server, XMOS Server and Backup SDB Server if you want to link RMI imports to Aurora Playout placeholders.
6. Under the Connection Mode settings, you can choose to have a database type that is either News or K2. When selecting News, you can import media into the NewsShare DSM. While selecting K2, you can import directly into a K2 Summit.

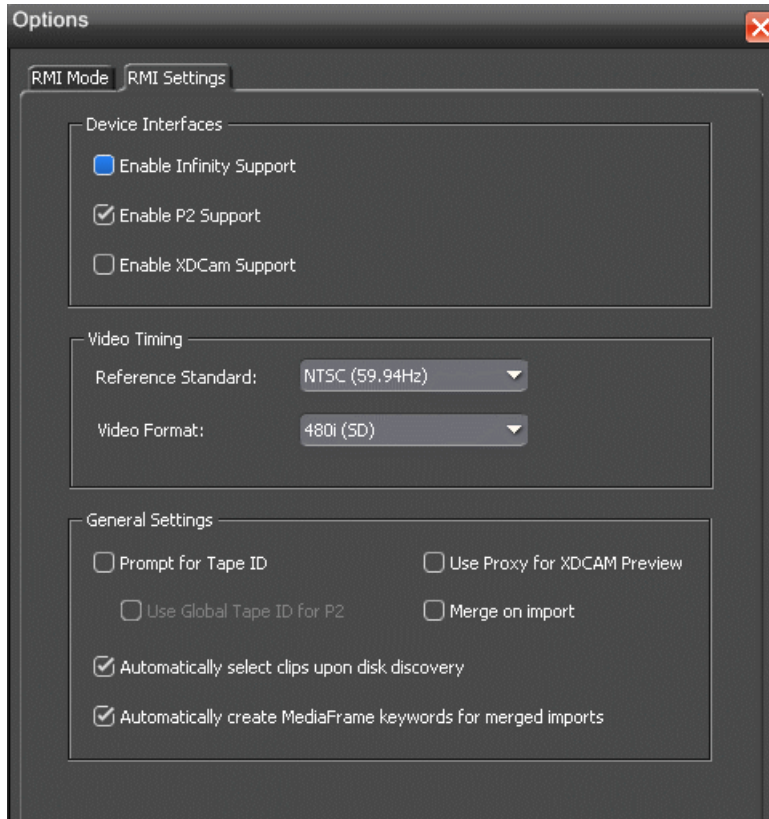
**NOTE:** RMI that imports directly into the K2 Summit can either be saved into shared Summit storage or into a single standalone Summit. RMI cannot

*be setup to import to a combination of shared and standalone Summits, or a combination of multiple standalone Summits.*

7. For import to News database, select local or shared storage, and browse to the VibrantAVFiles location for the Destination AV Path.
8. For import to K2 Summit, select local or shared storage, and specify the server bin or sub-bin on your media server.



9. If you need to change the server bin later, select **Browse** at the Destination AV Path.
10. Click **Apply**.
11. Click the RMI Settings tab to proceed configuring the RMI application.



12. Select Device Interfaces for your RMI operation. You can enable the support for Infinity, P2 and XDCAM devices.
13. Video Timing settings can be configured as follows:
  - Reference Standard - Select either NTSC or PAL.
  - Video Format - Select 1080i, 720p, 480i (SD for NTSC) or 576i (SD for PAL) video format from the drop-down list.
14. General Settings can be configured as follows:
  - Prompt for tape ID - This feature lets you give the disk and all of the clips useful names as soon as the media is inserted. With this feature, you can differentiate clips from different disks.
  - Use Global Tape ID for P2 - Select this if you want to use global tape ID when ingesting from Panasonic P2. With the Global Tape ID, you can have a single ID to represent multiple Panasonic P2 cards.
  - Use Proxy for XDCAM Preview - Select this if you want to view proxy video from an XDCAM instead of the high-resolution video.
  - Merge on import - Select this if you want to merge clips during import. With this feature, users can merge multiple clips into a single clip on import.

- Automatically select clips upon disk discovery - Use this feature if it's better for your workflow to select all clips automatically, then de-select individual clips that you don't need.
- Automatically create MediaFrame keywords for merged imports - Select this if you want MediaFrame to insert keywords automatically for merged imports. You can also define the name of the keyword that will be inserted.

15. Click **OK**.

## Configuring user administration

User administration for Aurora Ingest client is done within Tools | User Administration in Aurora Ingest Server. With this administrative feature, a system administrator can create user accounts, user groups and specify permissions according to user groups or user accounts.

By specifying permissions, an administrator can control who can access the Aurora Ingest applications and what actions can be performed. By default, users are granted permissions for all tasks and access to all Aurora Ingest components when you initially create user accounts. You can deselect permissions that are not to be assigned to the particular user or the particular group.

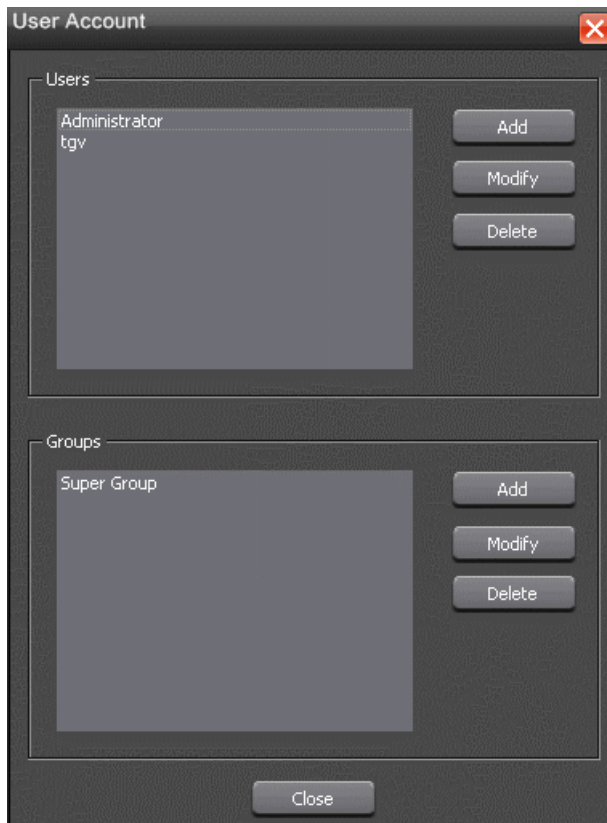
For a smooth operation, it is best to create user groups with specific permissions to each group and configure channel groups before assigning them to users. Therefore; once you select the group and channel group for a user, pre-configured permissions would be automatically set up as well.

It is mandatory for users to belong to groups. Super Group is the default group that has permissions to all tasks and components. Groups can be set to have permission granted or denied to access the following tasks and components:

Permission	Description
Crash Event	Allows a user to record an unscheduled Scheduler event.
Feed Event	Allows a user so assigned to record Scheduler event.
Recurring Event	Allows a user so assigned to create a recurring Scheduler record event.
Open-ended Event	Allows a user so assigned to record Scheduler event with no end time specified.
Logging	Allows a user to log a tape, create an EDL and save it. (Does not give the user permission to record.)
VTR Ingest	Allows a user so assigned to create VTR batch events.
RMI	Allows a user to access RMI to ingest events from removable devices such as the Infinity Digital Media Cameras and Digital Media Recorders or from Panasonic P2 or Sony XDCam removable media devices.

Permission	Description
Switch Aspect Ratio	Allows a user to switch video aspect ratio of Scheduler record event and VTR Ingest record event.
Make Public Templates/Filters	Allows a user to create public templates and public filters. Without this permission, the make public check box for templates and filters will be grayed-out.

- Select **Tools | User Administration**.



The User account dialog box pops up for you to create users and groups.

### Creating a group

You can create groups on the User Administration setup of Aurora Ingest - Server.

1. Click **Add** in the Groups section.

Permissions:	Allow	Deny
Crash Event	<input checked="" type="checkbox"/> Allow	<input type="checkbox"/> Deny
Feed Event	<input checked="" type="checkbox"/> Allow	<input type="checkbox"/> Deny
Recurring Event	<input checked="" type="checkbox"/> Allow	<input type="checkbox"/> Deny
Open-ended Event	<input checked="" type="checkbox"/> Allow	<input type="checkbox"/> Deny
Logging	<input checked="" type="checkbox"/> Allow	<input type="checkbox"/> Deny
VTR Ingest	<input checked="" type="checkbox"/> Allow	<input type="checkbox"/> Deny
RMI	<input checked="" type="checkbox"/> Allow	<input type="checkbox"/> Deny
Switch Aspect Ratio	<input checked="" type="checkbox"/> Allow	<input type="checkbox"/> Deny
Make Public Templates/Filters	<input checked="" type="checkbox"/> Allow	<input type="checkbox"/> Deny

2. Enter the name of the group and select channel group from the drop-down list.

Channel Groups are configured within Channel Group tab of **Tools | Options** in Aurora Ingest - Server.

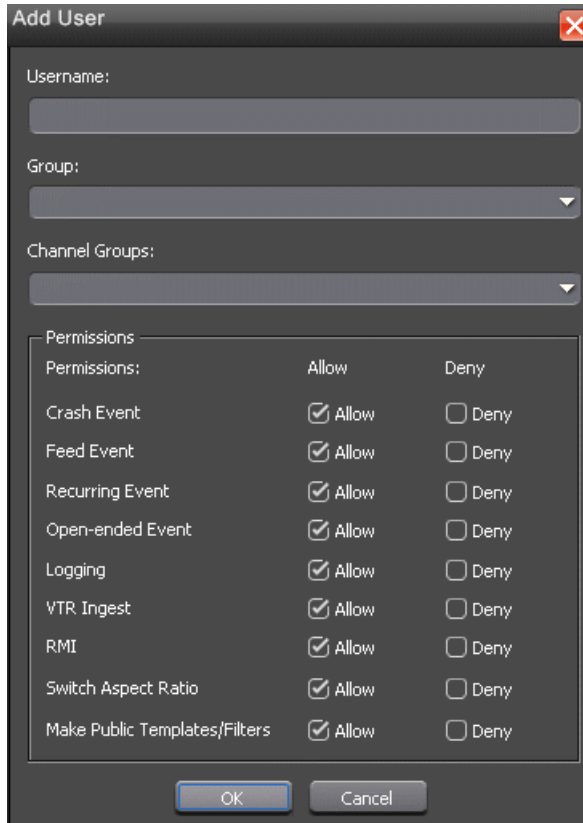
3. Set permissions for the group by checking the Allow box or Deny box for each item.
4. Click **OK** after you had finish configuring the group and proceed to create more groups to suit your broadcasting needs.

Groups that had been created will be listed on the Group drop-down list and they can be selected when you create user accounts on the User Administration setup.

## Creating users

User accounts can be created on the User Administration setup of Aurora Ingest - Server.

1. Click **Add** in the Users section.



2. Enter the **Username** and select a group for the user from the drop-down list. For each user, this should match the name that they use to log in to Windows.

If specific permissions had been set for the group, the user will automatically will be set with the same appropriate permissions. If needed, you can still edit permissions to the particular user in this window.

If channel groups had also been configured for the particular group, they will be automatically shown under Channel Groups. If not, you can also select channel groups from the drop-down list. You can select more than one channel group if needed.

3. Click **OK** after you finish configuring the user setting and proceed to create more users to suit your broadcasting operation.

### Modifying user settings

You can change settings for specific users.

1. Select the user name and click **Modify**.



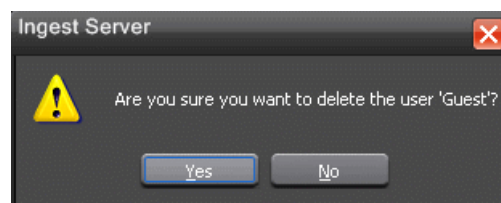
The user name cannot be changed, but you can change the user group, channel group and permissions for the user in the window.

2. Click **OK** to apply the changes.

## Removing user

If needed, you can delete a user from the system.

1. Select the user name and click **Delete**.



2. Click Yes to confirm the removal of the user.

## Modifying group settings

You can change channel group and edit permissions for groups.

1. Select the group name and click **Modify**.

The group name can not be changed, but you could change the channel group and edit permissions for the group in the window.

2. Click **OK** to apply those changes.

## Removing group

To delete a group:

1. Select the group name and click Delete.

A dialog window is displayed for you to confirm the removal of the group.

2. Click **Yes** to confirm.

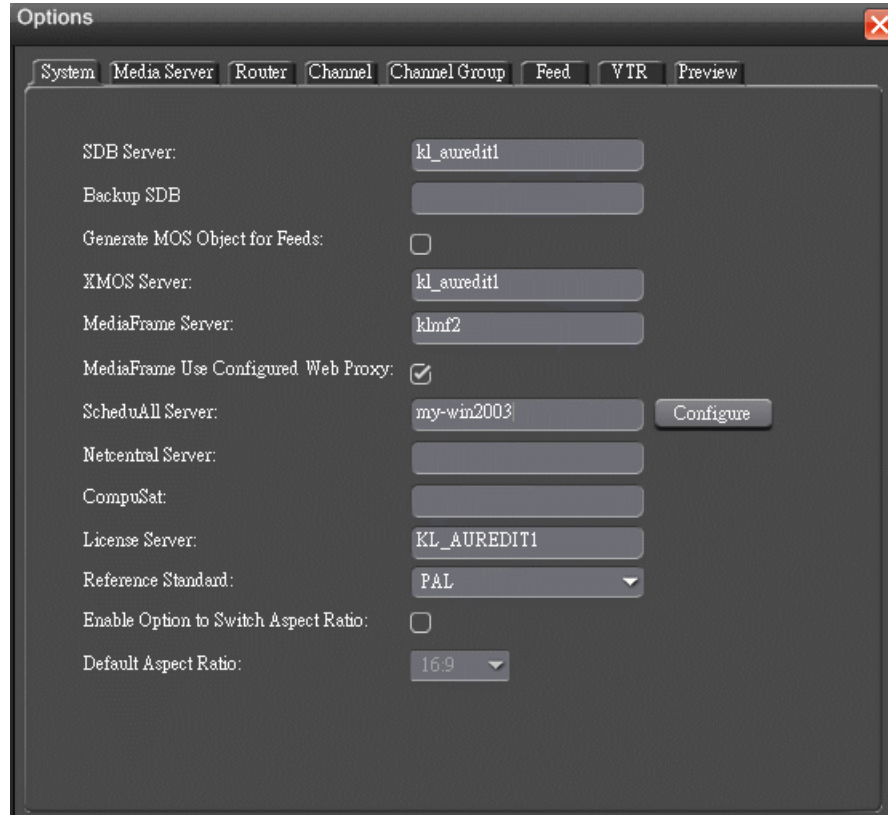
## Configuring Aurora Ingest for ScheduALL

Once you have installed Aurora Ingest and ScheduALL, you need to configure Aurora Ingest options and ScheduALL options for the integration to be successful.

Users need to configure ScheduALL properties within Aurora Ingest Server before they can use Scheduler with ScheduALL.

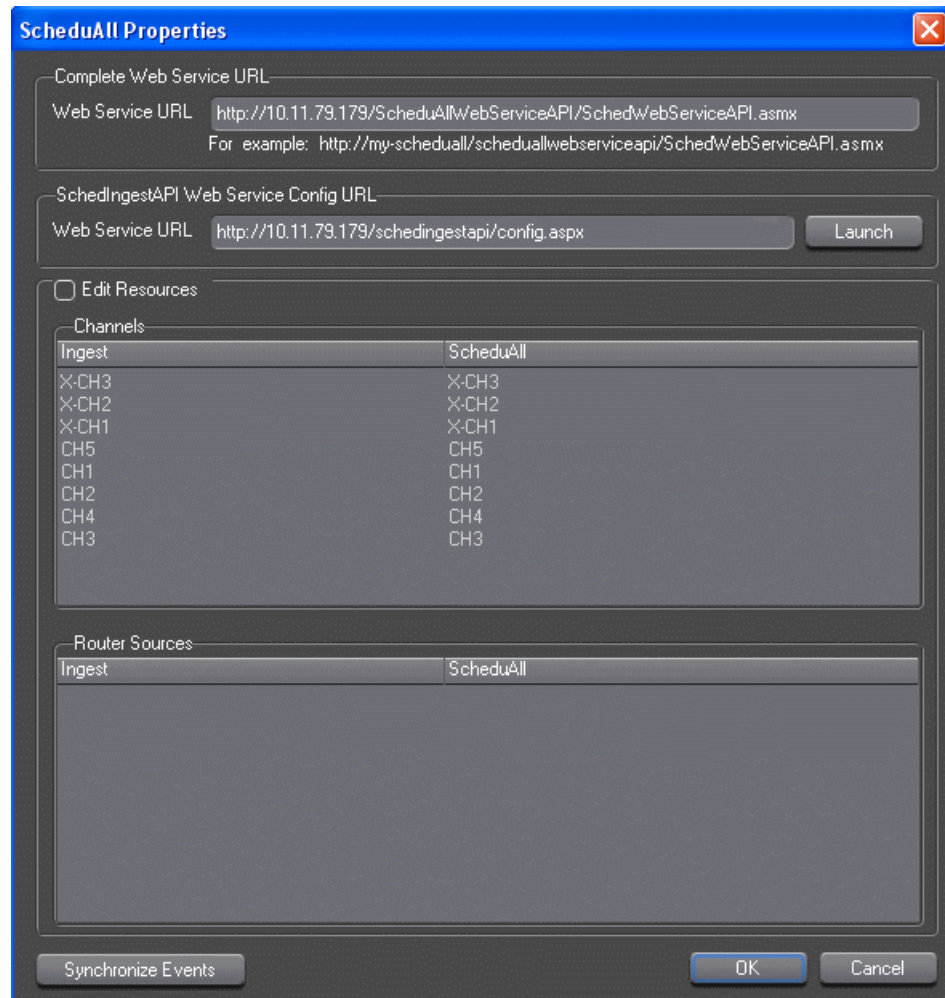
### Configuring ScheduALL properties

ScheduALL properties can be configured in the System tab when you select **Tools | Options** within Aurora Ingest Server.



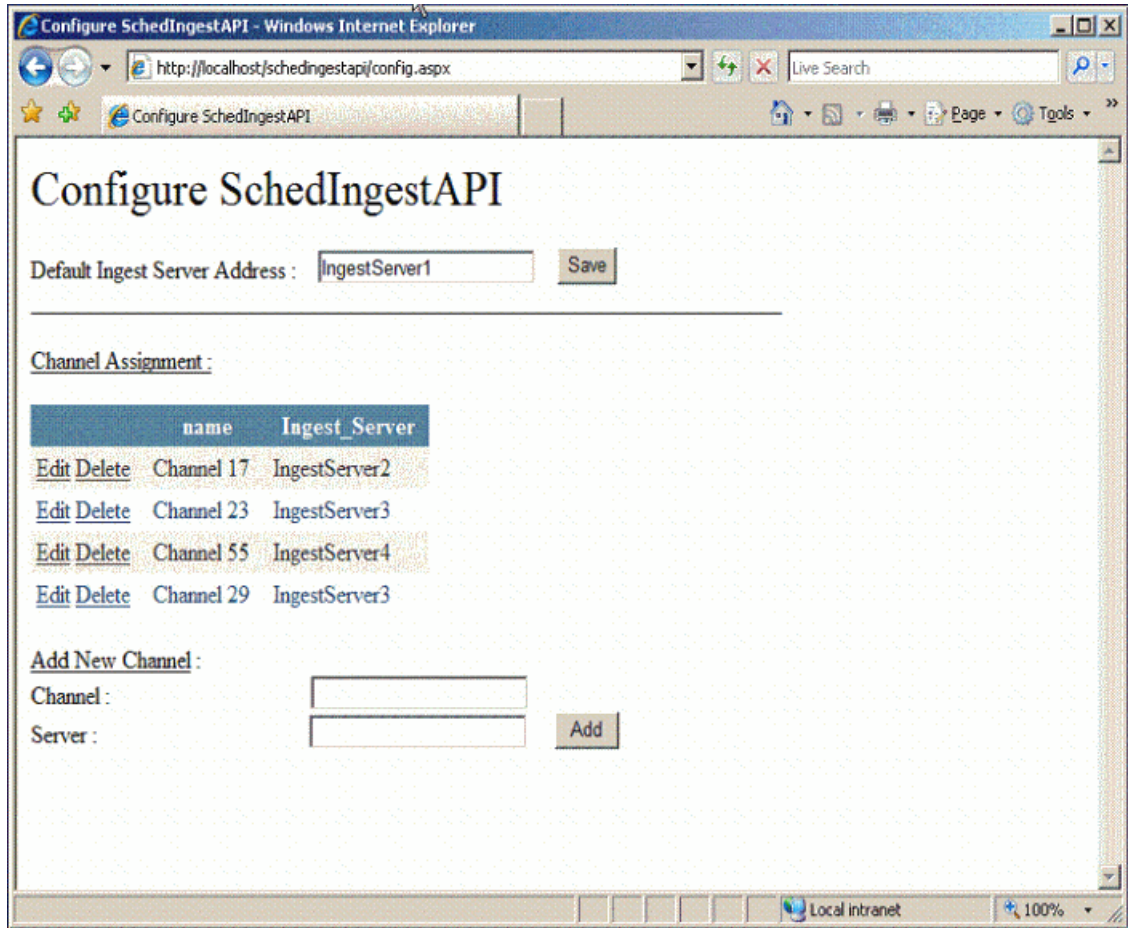
1. Click the **Configure** button, beside the ScheduALL Server setting.

The ScheduALL Properties dialog box is displayed.



2. The Complete Web Service URL and SchedIngestAPI Web Service Config URL are automatically populated once you set the ScheduALL Server within the System tab.

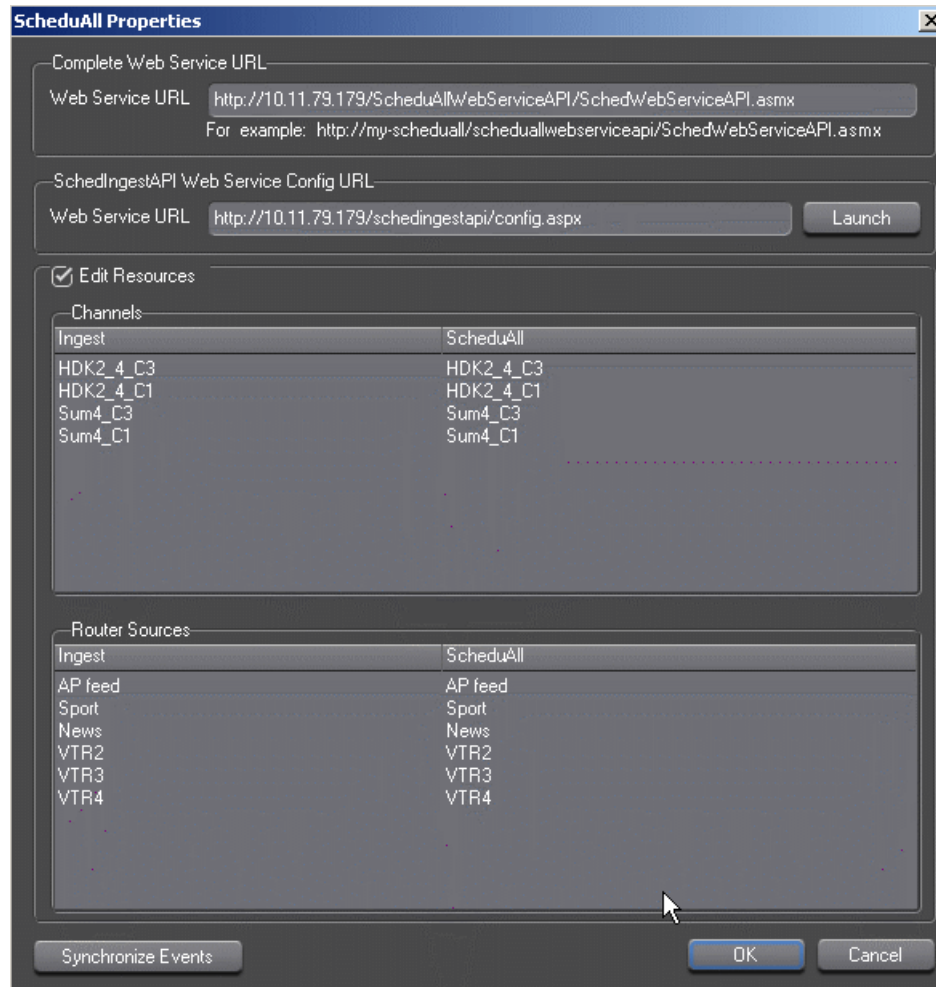
Click the **Launch** button to launch the SchedIngest API configuration page.



3. Configuration details can be entered as below:

Option	Description
<b>Default Ingest Server Address</b>	Enter the host name or IP address of the default Ingest Server. The default Ingest Server should be the server that is majorly used for scheduling with ScheduALL. By default, all channels on the default Ingest Server can be used with ScheduALL and do not need to be assigned within the Channel Assignment section.
<b>Channel Assignment</b>	Shows channel name and host name of the Ingest Server if you have multiple Ingest Servers connected to your system. You can assign specific channels from multiple Ingest Servers that will be used with ScheduALL. You can also edit or delete channel from this section if needed.
<b>Add New Channel</b>	Add the channel name and host name of the Ingest Server other than the default Ingest Server, if you have multiple Ingest Servers connected to your system. The channel will be displayed in the Channel Assignment section.

- To edit channel and router resources of ScheduALL, you need to select the Edit Resources checkbox within the ScheduALL Properties window.



You have to wait for the query to ScheduALL to complete, as this may take a few minutes. Once it's done, the dialog status bar will show 'Ready'.

- All channels and router sources that had been set up on your Ingest Server will be displayed. You need to map your existing channels and router sources on Ingest Server to existing channels and router sources on ScheduALL.
- Select your particular channel or router source for Ingest Server, double-click on the ScheduALL resource item and select an item that you want to map with in the dropdown list.

Channel names and router sources should match respectively for both applications. If you have multiple Aurora Ingest Servers within your operation,

each channel on those Ingest Servers must be configured with unique names to avoid scheduling conflicts with ScheduALL.

7. Click **OK** after you have finished configuring ScheduALL properties.

## **Configuring ScheduALL for Aurora Ingest**

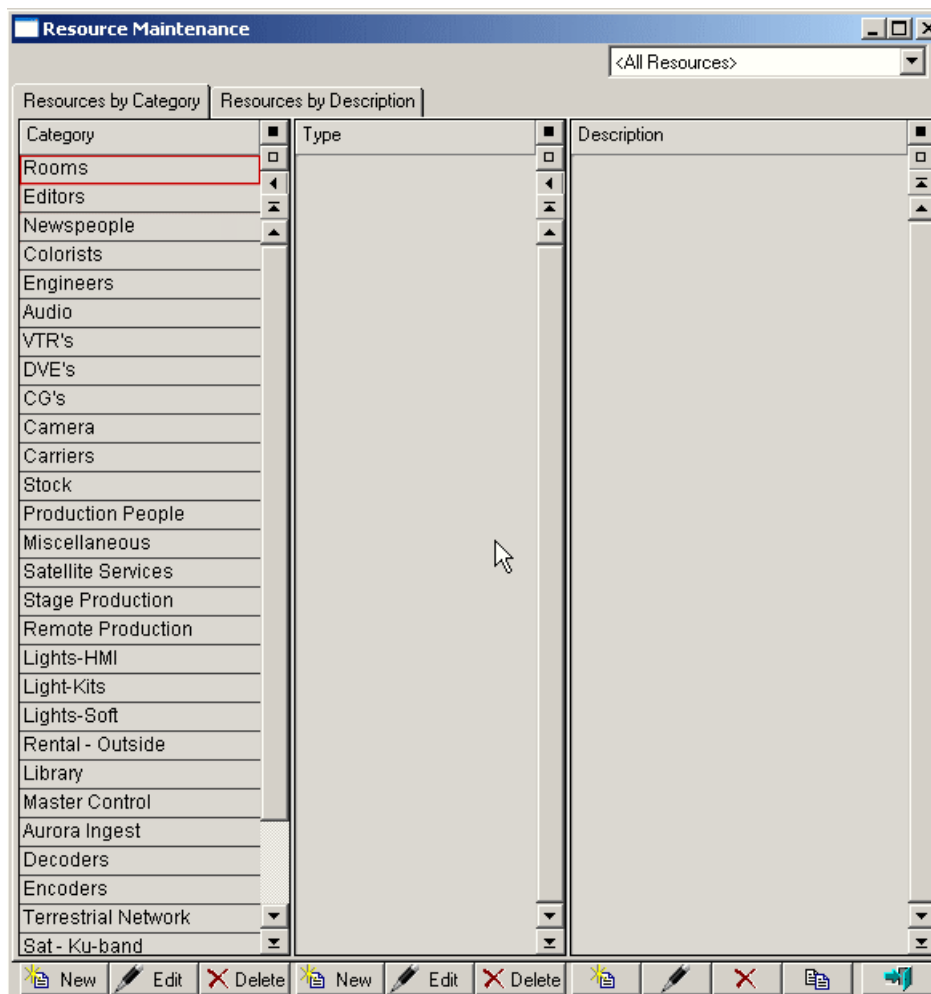
Once you have installed Aurora Ingest and ScheduALL, you need to configure Aurora Ingest options and ScheduALL options for the integration to be successful.

Users of Aurora Ingest also need to configure ScheduALL properties within the ScheduALL application before they can start the scheduling integration.

### **Creating the Aurora Ingest Room**

In order to configure ScheduALL for use with Aurora Ingest, users need to create Aurora Ingest Room within the ScheduALL application.

1. Select **File | Setup | Room Resources**. The Resource Maintenance dialog displays.



2. In the **Category** column, select **Rooms**.
3. At the bottom of the **Type** column, click **New**.
4. Enter Ingest as the type description and click **OK**.
5. In the **Type** column, click **Ingest**.
6. At the bottom of the **Description** column, click **New**.
7. In the Resource Types dialog, select **Room** and click **OK**.
8. Enter Aurora Ingest in the Room Description field.
9. Enter additional information about the room as needed.
10. Click **OK**.

### Creating the Aurora Resource Category

In order to use ScheduALL with Aurora Ingest, users need to create the Aurora Resource category before creating sources and channel resources.

1. In the Resource Maintenance dialog, click **New** at the bottom of the **Category** column.
2. Enter **Aurora** in the Category field.
3. Enter additional information as needed.
4. Click **OK**.

## Creating Source and Channel Category Types

Users need to create source and channel resource category types within the Aurora resource category.

1. In the Resource Maintenance dialog, select **Aurora** in the **Category** column.
2. At the bottom of the **Type** column, click **New**.
3. Enter **Source** as the type description and click **OK**.
4. At the bottom of the **Type** column, click **New**.
5. Enter **Channel** as the type description and click **OK**.

## Creating Source Resources

In order to use ScheduALL with Aurora Ingest, users need to create and list sources of incoming feeds.

1. In the Resource Maintenance dialog, select **Aurora** in the **Category** column.
2. In the **Type** column, select **Source**.
3. At the bottom of the **Description** column, click **New**.
4. In the Resource Types dialog, select **General Resource** and click **OK**.
5. Enter a description in the Description field (e.g. SRC1).
6. Enter additional information about the source as needed.
7. Click the **Path Mgmt** tab.
8. Select **Can be a Source**.
9. Click **OK**.

Repeat steps 3 through 9 as needed for additional sources.

## Creating Channel Resources

In order to use ScheduALL with Aurora Ingest, users need to list channels for recording feeds. ScheduALL channels should match the list of channels on Ingest Server. In case of multiple Ingest Servers within the network, channel names should be unique so that channel conflicts could be avoided.

1. In the Resource Maintenance dialog, select **Aurora** in the **Category** column.



2. In the **Type** column, select **Channel**.
3. At the bottom of the **Description** column, click **New**.
4. In the Resource Types dialog, select **General Resource** and click **OK**.
5. Enter a description in the Description field (e.g. Channel1).
6. Enter additional information about the channel as needed.
7. Click the **Path Mgmt** tab.
8. Select **Can be a Destination**.
9. Click **OK**.

Repeat steps 3 through 9 as needed for additional channels.

### Creating the Aurora Resource Group


Users need to create the Aurora resource group, that can be selected when creating a workorder.

1. From the **File** menu, select **Setup**, then select **Resource Groups**.
2. Click **New**.
3. Enter *Aurora* in the **Group Name** field.
4. In the **Category** column, select **Aurora**.
5. In the **Type** column, select **Source**.
6. In the **Description** column, select sources to be added to the resource group and click **Add**.
7. In the **Type** column, select **Channel**.
8. In the **Description** column, select channels to be added to the resource group and click **Add**.
9. Click **Save** and then click **Close**.

### Creating the Aurora Ingest Order Service

Users need to create the Aurora Ingest Order Service, that can be selected when creating a workorder.

1. From the **File** menu, select **Setup**, then select **Services**.
2. Click **New**.
3. Enter *Aurora Ingest Order* in the **Service Description** field.
4. Click **Add**.
5. In the **Category** column, select **Aurora**.
6. In the **Type** column, double-click **Source**.
7. Click **Edit**. The Resource to Auto-Include dialog displays.
8. Select **User Select** and click **OK**.

9. Click **Add**.
10. In the **Category** column, select **Aurora**.
11. In the **Type** column, double-click **Channel**.
12. Select the Channel resource added in Step 11.
13. Click **Edit**. The Resource to Auto-Include dialog displays.
14. Select **User Select** and click **OK**.
15. Click the **Capable Rooms** tab.
16. Click **Add to List**.
17. From the **Category** column, select **Rooms**.
18. From the **Type** column, select **Ingest**.
19. In the **Description** column, select **Aurora Ingest** and click **Select** .
20. Click **OK**.

## Setting User Preferences

Users can set user preferences when using ScheduALL.

1. From the **File** menu, select **User Preferences**, then select **General**.
2. Click the **Options** tab.
3. Locate the **Force Service Selection on Work Order Creation** entry.
4. Click the **Value** column and select **Yes**.
5. Locate the **Force Client Selection on Work Order Creation** entry.
6. Click the **Value** column and select **Yes**.
7. Click **OK**.

## Adding Controls and Browsers to Dialogs in ScheduALL

To configure ScheduALL for use with Aurora Ingest, several controls and a resource browser need to be added to the Work Order form using the Developer's Toolkit. These controls and the resource browser can be placed on a new tab or an existing tab on the Work Order form.

Scheduling events from ScheduALL into Scheduler will not be successful if these controls and resource browser are not added into the Work Order form.

### Using ScheduALL's Developer's Toolkit

You need to use the Developer's Toolkit in order to add controls and resource browser to the Work Order form.

1. Log in to the ScheduALL system as a supervisor or with permissions to the Developer's Toolkit Module.

2. From the **File** menu, select **Supervisor Options | Developer's Toolkit | Dialog Editor**.
3. Select **Work Order Form (Standard)** and click **Edit**.
4. Place the following controls on the Work Order form.

Type	Source	Source Option	Field	Title
Edit Control	Work Orders	Fields	Job Name	Title
Combo Box	Work Orders	Fields	External Type	Work Order Type
Edit Control	Work Orders	Fields	Special Instructions	Description
Edit Control	Work Orders	Fields	Clip Location	Clip Location
Linked Picklist Button	Work Orders	Fields	Clip Location	Clip Location

5. Create a browser with the following columns:

Source	Source Option	Field	Title
Resource Booking (Events)	Fields	Sequence Number	Sched ID
TR:Work Order	Fields	External ID 3	Ingest ID
Resource Booking (Events)	References	Resource Category	Category
Resource Booking (Events)	References	Resource Type	Type
Resource Booking (Events)	References	Start Time	Start Time
Resource Booking (Events)	References	Start Time	Start Time

The addition of controls and browser options can be seen below:

Title:  Work Order Type:   
 Clip Location:

Description:

Sched ID	Ingest ID	Category	Type	Resource	Start Time	Stop
11,321		Rooms	Ingest Systems	Aurora Ingest	6/23/2009 4:00 PM	6/23/2009 6:15 PM
11,321		Service		Aurora Ingest Order	6/23/2009 4:00 PM	6/23/2009 6:15 PM
11,321		Aurora Ingest	Router Sources	SRC2	6/23/2009 4:00 PM	6/23/2009 6:15 PM
11,321		Aurora Ingest	Record Channels	Channel 1	6/23/2009 4:00 PM	6/23/2009 6:15 PM

### Configuring ScheduALL application

ScheduALL application needs to be set up to include Aurora Ingest Room and the URL of SchedIngestAPI Web Service for the scheduling integration to be successful.

1. Launch the ScheduALL application.
2. Select **File | Supervisor Options | System Preferences | General**.
3. Click on the System Options tab and scroll down to the Request Room Options.

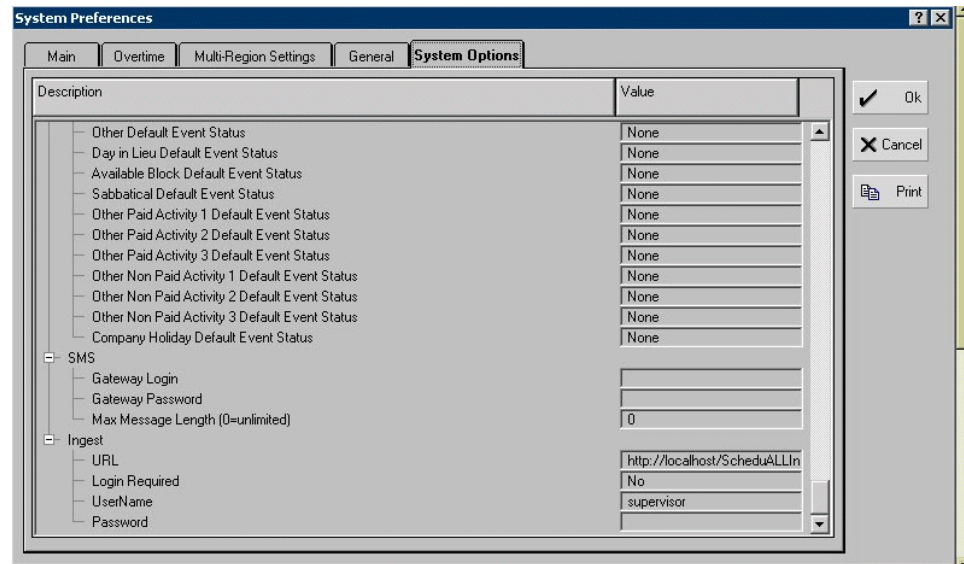
**System Preferences**

Main | Overtime | Multi-Region Settings | General | **System Options**

Description	Value
Keep Default Values set in DTK when copying Work Orders	Yes
Allow Concurrent User Sessions under the .NET Framework	Yes
Assign Copy Id upon Work Order Copy	No
Create Visual Path Image in Reports	No
Maximum Visual Path Image Width(In Pixels):	800
Disregard Library Episode Ownership	No
Login Method for Switch User Feature:	User Name/Password
Enable Alternate Vendor Invoice Reconcile Method	No
Assign Cost Unit of Measure per Default set in Vendor Cost Maintenance	No
Allow Duplicate Vendor Invoices with Unique Invoice Dates	No
Prompt to Print Label when Committing/Saving New Library Entry	No
<b>Request Room:</b>	<b>Aurora Ingest</b>
Request Room 2:	
Quote Attachment File:	
Mandatory Resource Questions Must be Answered by Status:	Confirmed
Append new Work Order/Trouble Ticket Notes to:	<Bottom of list>
Default Status for Trouble Ticket:	Request
Default Trouble Ticket Client:	
Set to Hold for Review at statuses:	0 status(es)
Enforce Booking of Volume Resources to Count > 0	No

Buttons: Ok, Cancel, Print

4. Select the Aurora Ingest Room.
5. Then, scroll down to Ingest options.



6. Enter the URL of the SchedIngestAPI Web Service.

The default URL is

*http://localhost/SchedIngestAPI/SchedIngestAPI.asmx*. If the web service had been installed on another machine, edit the URL to include the hostname or IP address of that machine.

7. Click **OK** to save the setting.



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## **Using Aurora Ingest - Scheduler**

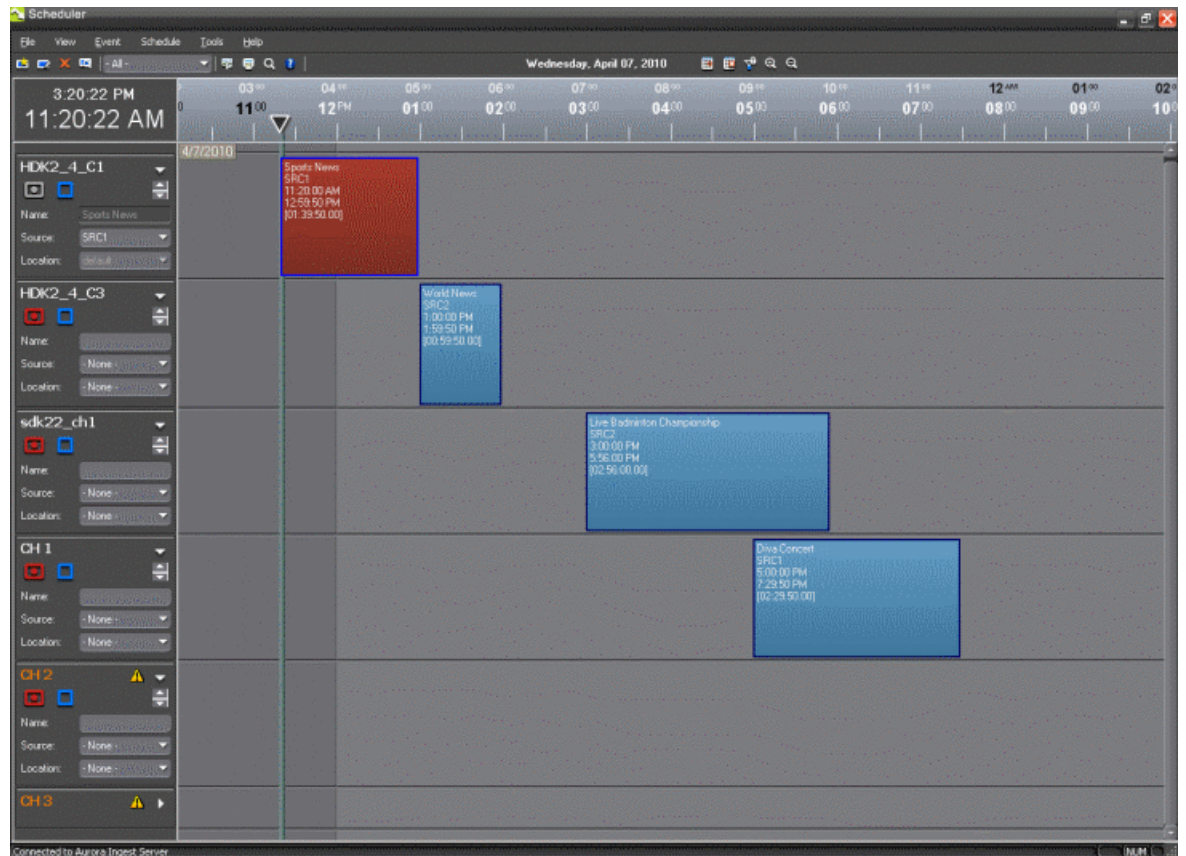
This section contains the following topics:

- *Using Aurora Ingest - Scheduler*
- *Using Scheduler toolbar*
- *Overview of clock and timeline*
- *Overview of channel window*
- *Overview of Schedule Viewer*
- *Crash Recording*
- *Scheduling recording*
- *Creating a template*
- *Using filters*
- *Using Channel Reservation*
- *Using MediaFrame in Scheduler*
- *Viewing recordings*

## Using Aurora Ingest - Scheduler

The Scheduler user interface allows you to quickly view channels configured via Aurora Ingest Server, and schedule or record events for your broadcast operation.

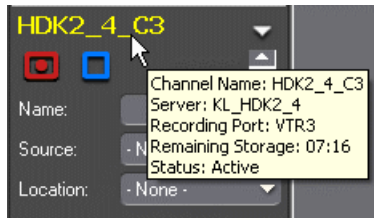
With Aurora Ingest - Scheduler, you can record an event from a VTR, router source, CompuSat satellite dish control system, and ENPS. You can crash record, allowing for the immediate recording from any router source, or schedule events to record in advance, including recurring events. You can also gang roll, allowing several router sources to start recording simultaneously. In addition, you can view a recording item or a previously recorded item, and trim the clip if it is already linked to an Aurora Playout placeholder. With MediaFrame integration, you can apply, add, edit and search metadata of assets created within the scheduling and ingest process. You can also play low-resolution video versions of ingested assets.



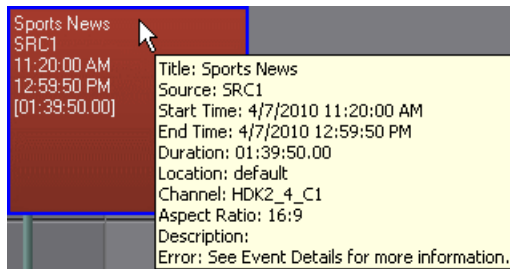
By default, Scheduler window opens to the current day, date and time according to your system time.

If you hover on a channel name on the left pane of the application, a tooltip will appear to show the channel name, server, recording port, remaining storage and status of the channel.


















If you hover on an event on the main Scheduler window, a tooltip will appear to show the title, router source, start time, end time, duration of the event, recording location, channel group (if applicable), aspect ratio setting of the channel, description of the event and error (if applicable).



## Using Scheduler toolbar

These buttons let you perform common Scheduler functions:

Icon	Function
	Add a scheduled event.
	Modify the selected event.
	Delete the selected event.
	View the selected event.
	Hide or show the Asset Viewer.
	Hide or show the Live Feed Viewer.
	Launch the MediaFrame Search window.
	Launch the Aurora Ingest Scheduler About window.
	Launch the Schedule Viewer window.

Icon	Function
	Go to a specific date on the main Scheduler window. When this button is selected, a calendar appears. Users can select a specific day of any month to be shown on the Scheduler.
	Toggle timelock on the main Scheduler window. When this button is selected, Scheduler automatically scrolls to the current time of day. If users manually scroll the timeline, it will turn timelock back off.
	Zoom in to the main Scheduler window. The maximum zoom level shows one-minute increments on the timeline.
	Zoom out of the main Scheduler window. The minimum zoom level shows three-hour increments on the timeline.

## Overview of clock and timeline

Clock and timeline display are two essential features to schedule recordings.



You also have the option to display a secondary clock and timeline on your Scheduler window. If you have multiple sites across many time zones, seeing another time zone and timeline can make the scheduling process easier.

Once configured, Scheduler will display both times on the main window.







However, the secondary time is only shown on the clock and timeline display. You will not see the secondary time within add feed dialogs or tooltips in Scheduler.

## Overview of channel window

The channel window shows channels that had been configured within your Aurora Ingest - Server.



Each channel window contains buttons and drop-downs that you need if you want to "crash record" an event immediately. In addition to scrolling up and down, you can type characters for quick auto-pick capability within those drop-downs.

Icon	Function
	Start recording an event.
	Stop recording the event.
	Expand channel window to show channel items. The arrow on the expand button points downward if the channel window is already expanded.
	Up/down arrow buttons to minimize/maximize channel display by row.

You can enter the name of the clip in the channel window prior to a crash record. Once the event begins recording, the name dialog box will be grayed out. However, you can still modify the name of the clip by right-clicking on the event and select **Rename Event** or press the F2 key to bring up the Rename window.

The source drop-down will show available router sources if you already configured your router and router sources for feeds.


The location drop-down shows folders that you can record your clips into. The location drop-down is set to **None** by default. If a crash record is started without populating it, the clip will be recorded into the Default Record Location as specified in Aurora Ingest Server options.

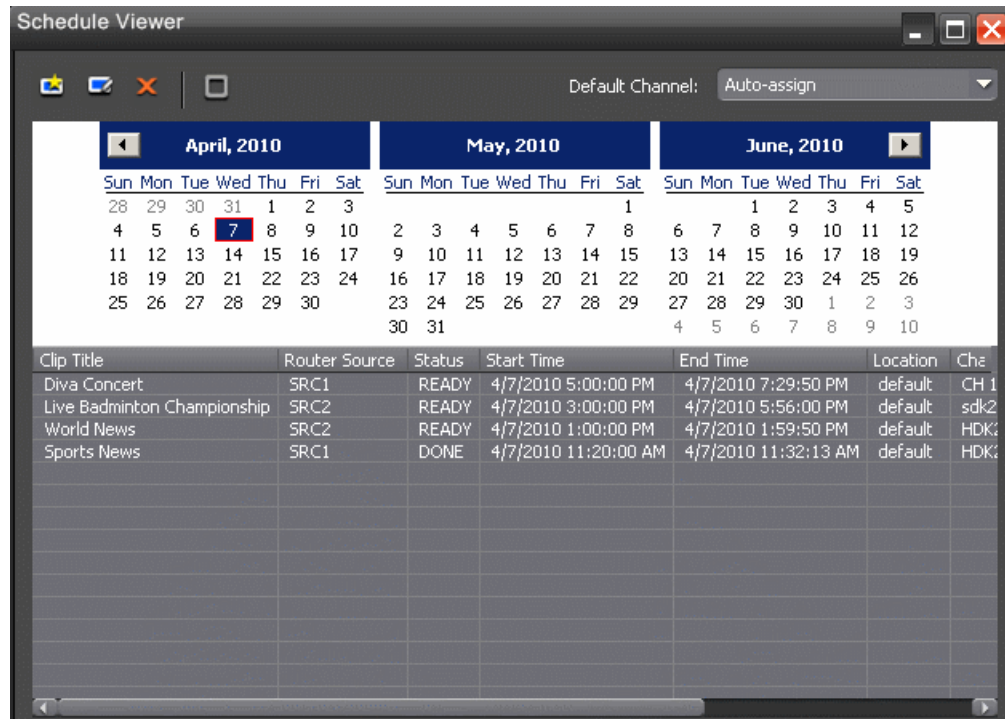
The aspect ratio drop-down will only be available if the Enable Option to Switch Aspect Ratio is selected in System tab within Tools | Options of Aurora Ingest Server. The availability of the drop-down also depends on user's permission to switch aspect ratio within the logon setup. This is done through the User Administration tool in Aurora Ingest Server.

The feature to change aspect ratio is currently supported for K2 version 3.2 and above, when controlling SD channels only. The feature will not work with previous versions of K2, HD channels, or other media servers, such as M-Series.

## Overview of Schedule Viewer

To see the details of events scheduled for a particular day, you might want to use Schedule Viewer. Schedule Viewer provides an easy way to select dates for scheduling and view scheduled events.

To access Schedule Viewer, click the **Schedule Viewer** icon  or select **View | Schedule Viewer**. Schedule Viewer opens, and displays all scheduled events for the selected day.




In Schedule Viewer, you can add, modify, and delete events using appropriate buttons just as you would from the toolbar on Aurora Ingest Scheduler main window.

Column	Description
Clip title	The name of the scheduled event.
Router source	The router source selected for this event.
Status	The current status of the event: Ready = The event is ready to record; Cueing = The event is preparing to record; Recording = The event is currently recording to the server; Done = The event has finished recording; Failed = The event could not record. Check the Error Message field for more information; Elapsed = The time for the event to record has passed.
Start time	The beginning and ending time for the event.
End time	

Column	Description
Location	The name of the folder where the clip resides in the database.
Channel	The channel that was selected for the event
Owner	The user who scheduled the event.
Error Message	Any error message describing why the event was not recorded to the server.


## Crash Recording

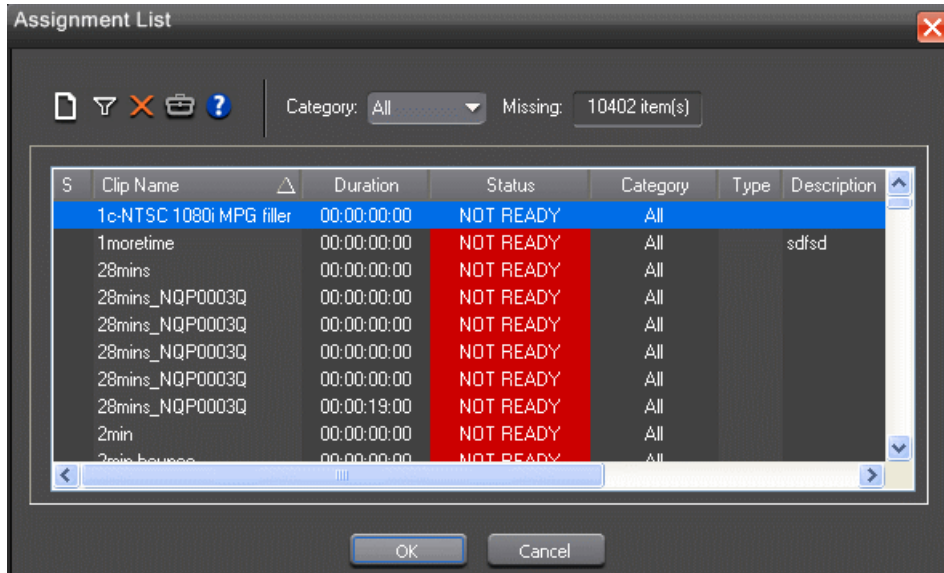
You can crash record when you want to record an event immediately.

1. Select the channel where you want to record the event.
2. Enter the name of the clip in the Name dialog box. If the name is not populated prior to the crash record, a default name will be set according to your setting within Aurora Ingest Server. The name will automatically increment the reference count if there's another name that matches it.
3. Select the router source for the recording by selecting from the Source drop-down list.
4. Select the location for the clip to be recorded into from the Location drop-down list. If the location is not populated prior to the crash record, the clip will be recorded into a default folder that had been set within your Aurora Ingest Server setting.
5. If the feature to switch aspect ratio is enabled within your Aurora Ingest - Server and the feature is supported on your media server, select the aspect ratio that you need from the drop-down list.
6. Click the **Record** button .


While the clip is recording, the record button flashes and the clip is displayed in red.

7. During the recording, you can modify event details by right-clicking on it and selecting **Modify Event**. The Modify Event dialog box will be displayed and you can modify details such as the event description, the end time of the recording or link the feed to an Aurora Payout placeholder.


You can just click  in the Modify event dialog box to browse for placeholders if you want to link the feed. The Assignment List window will be displayed and you can select a placeholder that you need.



After the feed is linked to the placeholder and recorded, you can trim the asset and set it for playback through Aurora Payout.

8. When you are done recording, click the **Stop Record** button .

Recording stops and the clip status changes to Done.

You can view the event properties by selecting a clip and clicking on the View Event button  or you can view the status of all the clips recorded that day by using Schedule Viewer.

## Scheduling recording

With Scheduler, you can set up events to record automatically at pre-defined times and dates.

You can also schedule recurring events, allowing you to record the same event every day of the week or once a week.

## Adding New Events

To record events, you add a scheduled event for each event you want to record. You need to provide information about the event and Scheduler adds the event to the schedule.

1. Click the **Add Event** button .



The Add Event dialog box appears with General tab and Metadata tab (if MediaFrame is configured within your Aurora Ingest Server).

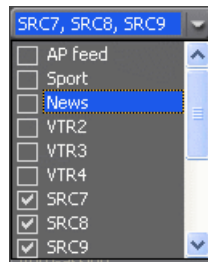
2. Fill out the information for the event you are scheduling:
  - a) Template—Select a template from the drop-down list.

Templates save information such as clip location and recording channel so that you can save time on repeated ingests.

- b) Clip Title—Enter a name for the scheduled event, if you want to.

If not, Aurora Ingest automatically will name each clip using the prefix you set when you configure feed and VTR settings on Aurora Ingest Scheduler.

- c) Assignment List Manager—Click **Assignment List Manager**  to link this event to an Aurora Playout placeholder.
  - d) Router Source—Select the source to record from in the drop-down list. If no router had been configured to your system, None will be displayed in the drop-down.
  - e) Gang Roll — Click Gang Roll button  to select several router sources to start recording simultaneously as can be seen in the window below:

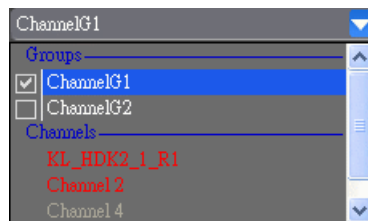


- f) Aspect ratio—Select the aspect ratio that you want for the recording of the feed.

This feature is enabled if the option is selected in System tab within Tools | Options of Aurora Ingest Server, the user is given permission to switch aspect ratio and the feed is going to be recorded into K2 version 3.2 when controlling SD channels only. This aspect ratio setting applies to both primary and backup event, if the option to record backup is selected.

- g) Recording Channel—Channel availability for a user depends on channel group and user administration setup within Aurora Ingest Server. If a user or user group is not configured to any channel groups, then those users could see and select any of all channels that had been configured on Aurora Ingest Server.

When using channel groups, the user can only see channels that they have access to. Once a channel group is selected; channels within that group will be displayed in red and they can no longer be individually selected. Other channels from other channel groups are grayed out and can no longer be selected as well. If needed, more than one channel group could be selected from the drop-down list. Events will be auto-assigned to channels displayed in red.



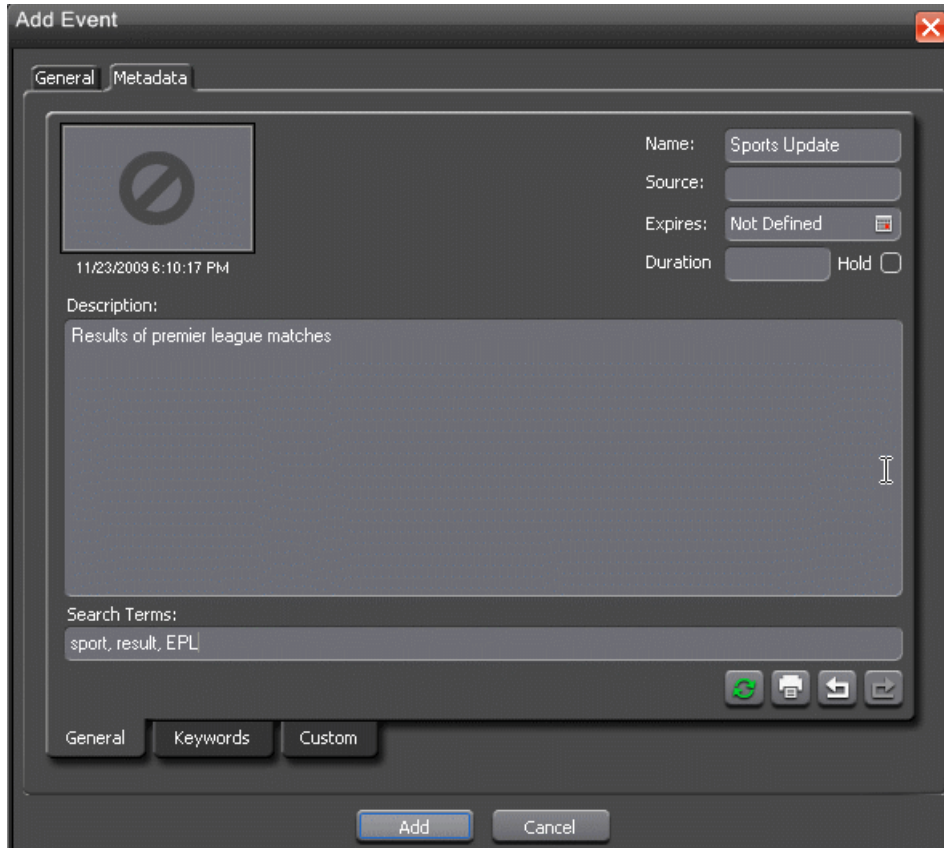
- h) Clip Location—Select a record location for the event from the drop-down list. Record locations are configured in the Media Server tab within Tools | Options of Aurora Ingest Server.
- i) Description—Enter description of the scheduled event, if you want to.
- j) Record Backup—Check this box if you want to record a backup of the feed. After the option is selected, you need to set the backup channel and location of the clip.



3. Within the Time/Date Info section, you have several options that you can choose regarding the timing of your recording.
  - a) **Start Record Now**—Check this box to start a recording as soon as you click **OK**. If you check this box, you can provide an ending time for the record or it can also be used with Open Ended Record.
  - b) **Open Ended Record**—Check this box if you want a recording to continue until you manually stop it. You only need to provide a start time for the record as the end time section is grayed out when this option is selected. It can also be used with Start Record Now.
  - c) **Start Date**—Select the date you want the recording to start on using the drop-down calendar. Move to a different month using the arrows at the top of the calendar.
  - d) **Start Time**—Enter the time you want the recording to start, using the format **hour:minutes:seconds**.

***NOTE:** When scheduling two events back-to-back, a space of 10 seconds is required from the stop of the first record to the start of the second record. In order to compensate for this, it is recommended that the default record duration reflect a stop time 10 seconds prior to the rounded duration (e.g., 00:59:50 for a 1 hour record).*

- e) **Stop Date**—Select the date you want the recording to end on using the drop-down calendar.
  - f) **Stop Time**—Enter the time you want the recording to end, using the format **hour:minutes:seconds**.
  - g) **Recurring**—Check this box if you want this scheduled event to occur more than once.
4. Click **Add** to add the event if you only have the General tab within the Add Event dialog.
5. If you already configured MediaFrame for use with Aurora Ingest, you can enter metadata for the asset within the Metadata tab.
  - **Name** — The name of the clip will be the same as the one that you entered in the General tab.
  - **Source** — Enter the source of the clip.
  - **Expires** — Select the expiry date for the placeholder. If no expiry date is needed, you can leave it at its default setting: Not Defined.
  - **Description** — The description will be the same as the one that you entered in the Settings tab.
  - **Search Terms** — Enter the search term for the clip so that it will be easy to find when you search for it using MediaFrame Search component later.



You can also enter metadata within Keywords tab, which referenced a specific timecode location in the media file. This is done by selecting mark-in/out points on the clip and inserting a keyword for that segment.

Within the Custom tab, you can enter additional asset metadata such as the name of editor, videographer, location and any metadata for other fields that had been listed. If you have the Administrator privileges, you can add, edit, or delete custom fields.

6. Click **Add**.

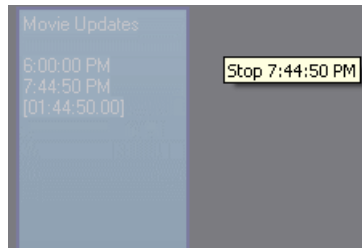
The scheduled event is added to Scheduler with a **Ready** status.

#### Adding New Events using Quick Schedule

With Quick Schedule, you can add events just by right-clicking on the scheduling interface.

1. Select the channel where you want to record the event.
2. Right-click on the scheduling grid of the channel and select **Quick Schedule**.
3. Once you are in the Quick Schedule mode, your mouse indicator turns into a Feed cursor with a start time tooltip that can be placed on the channel at any time that you want.

- After selecting the start time, you need to click and drag the Feed cursor to the right to select the end time.



- Then, release the Feed cursor after the end time is selected.

The Add Event dialog box appears with General tab and Metadata tab (if MediaFrame is configured within your Aurora Ingest Server).

- Fill out the information for the event you are scheduling as had been detailed in the Adding New Events section.
- Click **Add**.

The scheduled event is added to Scheduler with a **Ready** status.

### Adding Recurring Events

If you want to schedule an event to record on more than one occasion, such as every day of the week, or once a week, you can create a recurring event.

Scheduling a recurring event is the same as scheduling a one-time recording except that you enter information about how the event recurs throughout time. You can schedule the event to recur up to three years in advance.

**NOTE:** *If using CompuSat, you can only schedule weekly recurring events.*

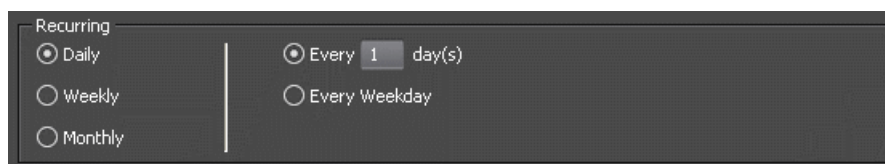
- Add new event as you normally would.

The Add Event dialog box appears.

- Check the **Recurring Event** checkbox.

The Add Event dialog box expands.

- Select information about how you want the event to recur:
  - For daily occurrence, select either Every Weekday or enter a number of days for the event to recur.



- For Weekly occurrence, check the boxes for the day or days you want the entry to record.

The screenshot shows the 'Recurring' section of the scheduler interface. On the left, there are three radio buttons: 'Daily', 'Weekly' (which is selected), and 'Monthly'. To the right, the text 'Recur every 1 week(s) on:' is followed by six checkboxes for the days of the week: Sunday, Monday, Tuesday, Wednesday, Thursday, and Friday. The 'Friday' checkbox is checked, while all others are unchecked.

- For Monthly occurrence, select a specific day each month to record, or select a specific day of the week, such as the second Friday, to record.

The screenshot shows the 'Recurring' section of the scheduler interface. On the left, there are three radio buttons: 'Daily', 'Weekly', and 'Monthly' (which is selected). To the right, there are two options for monthly recurrence. The first is 'Day 7 of every 1 month(s)'. The second, which is selected, is 'The second Wednesday of every 1 month(s)'. The 'second' and 'Wednesday' are shown in dropdown menus.

4. Select the range of occurrence, by selecting a Start date, and either an End by date or an End after a certain number of occurrences.

The screenshot shows the 'Range of Recurrence' section of the scheduler interface. It features a 'Start Date' dropdown menu set to '4/ 7/2010'. To its right, there are two radio buttons: 'End By' (which is selected) and 'End after'. The 'End By' option is followed by a date dropdown menu set to '4/ 7/2011'. The 'End after' option is followed by a text input field containing the number '1' and the word 'occurrences'.

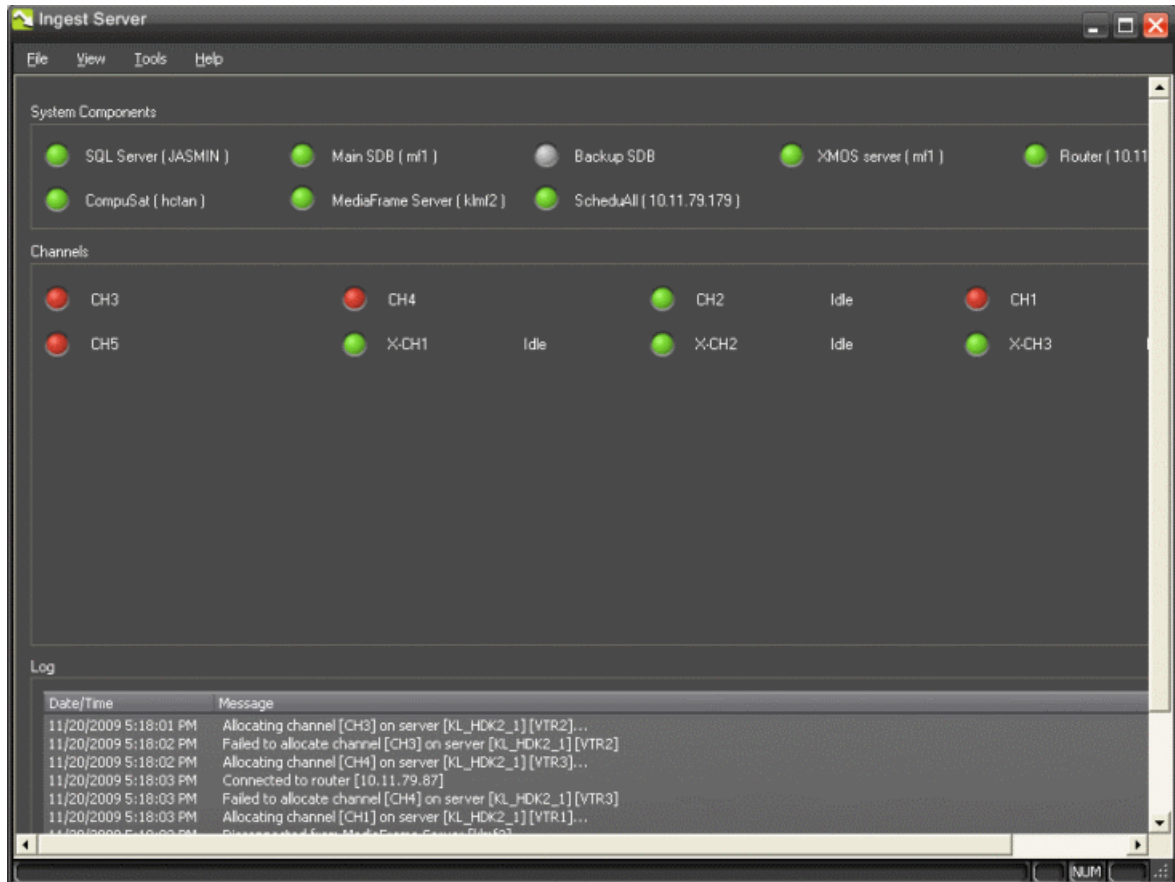
5. Click **Add**.

The recurring events can be viewed on the Aurora Ingest Scheduler.

## Adding New Events from CompuSat

To record events from a CompuSat-controlled satellite dish, you have to configure the CompuSat system to connect to Aurora Ingest Server.

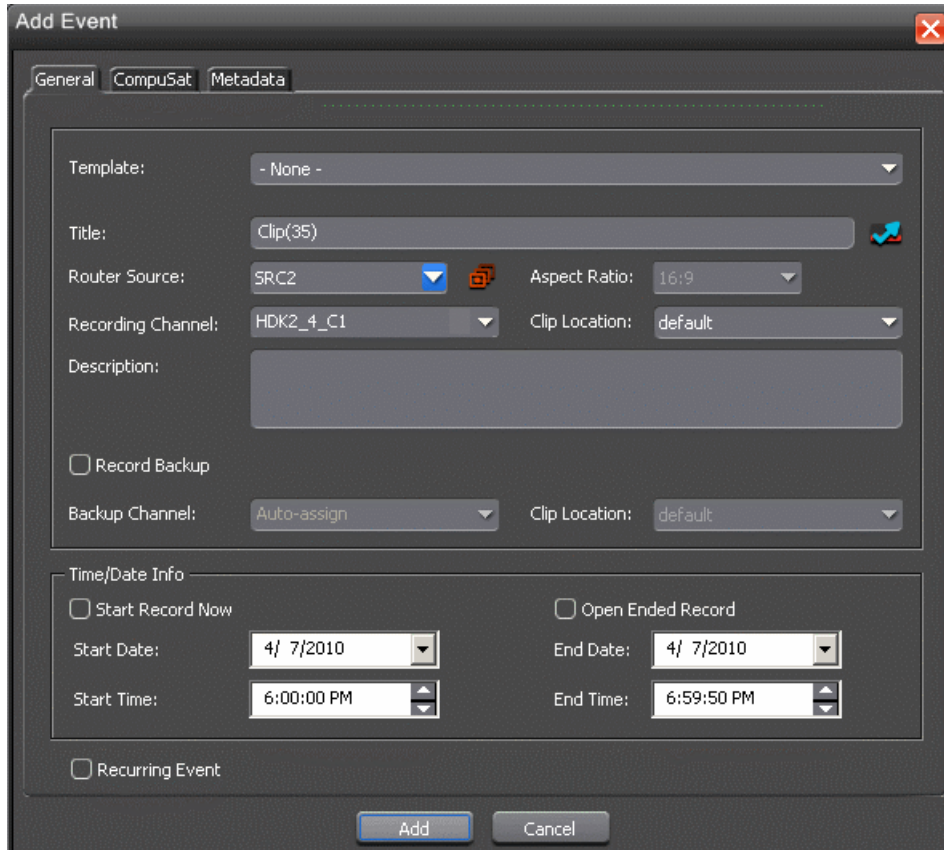
Make sure that the CompuSat system indicator is green to signify that the component is connected on the System Components display of Aurora Ingest Server.



1. Select the channel where you want to record the event.

If channel group is selected, channels from other groups will be grayed out and can no longer be individually selected. Your event will be auto-assigned to channels within the selected channel group(s).

2. Click **Add Event** .



The Add Event dialog box appears. Note that there is an additional CompuSat tab in the dialog box.

3. Fill out the information for the event you are scheduling in the General tab.
4. Then, fill out the information needed for CompuSat setting.


- **Event Name**—Enter a name for the scheduled event. If you had entered Clip Title in the General tab, the same name will appear in this box.
- **Satellite**—Select the satellite that you want to record the event from on the drop-down list.
- **Transponder**—Select the corresponding transponder to record the event from on the drop-down list.
- **Receiver**—Select the corresponding receiver to record the event from on the drop-down list.
- **Audio Frequency**—Select the corresponding audio frequency that you need for this event on the drop-down list.
- **Audio Level/Video level**—Set the corresponding percentage of audio and video levels that you need for this event. If not, you can always check the default box for default settings.

5. Click **Add**.

The scheduled event is added to Scheduler with a **Ready** status.

## Modifying Events

If you need to, you can modify a scheduled event.

1. Select the entry you want to modify and click **Modify Event** .

The Modify Event window opens.

2. If the event is part of a series, you see a message asking if you want to modify this occurrence or the entire series. Select the one you want to modify and click **OK**.
3. Make your changes in the Modify Event window.
4. Click **OK**.

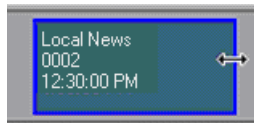
The event updates in Scheduler.

You can also modify events by drag and drop method. The selected event can be dragged around other channels and dropped in other locations.

## Extending Events

You can also modify the start and end time of an event on the Scheduler window, without opening the Modify Event window.

1. Select the event that you want to extend within the Scheduler.



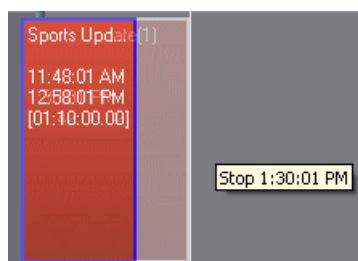
Once selected, an extend icon will appear if you hover over the start or end time of the event.

2. Click and drag to extend or retract the start or end time according to your broadcast needs.
3. You can also use hotkeys on your keyboard to extend events. Press **Home** to extend the start time or **End** to extend the end time. Then, you can press **D** to decrement the start or end time by 5 minutes for each key press; or press **F** to increment the start or end time by 5 minutes. If the **Ctrl** key is pressed simultaneously with **D** or **F** keys, the decrement or increment will be 1 minute for each key press.

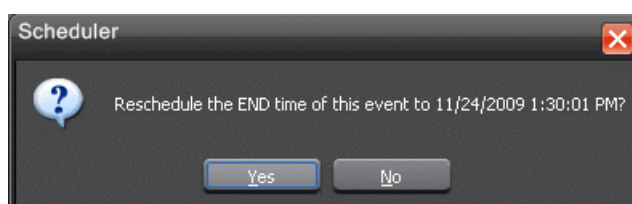
A time tooltip and a shadow will be displayed to indicate the time change.

4. You can also extend the end time of your feed while recording, as shown below:





5. Release your mouse after the new time for the event has been selected.




A window will be displayed for you to confirm the time change.

6. Click **Yes** to confirm the time change of your event.

## Deleting Events

If you need to, you can delete events on the Scheduler.

1. Select the event you want to delete or multiple events by **Ctrl** select or **Shift** select in order to highlight events for deletion .
2. Click the **Delete** button .
3. Select **Yes** in answer to the message asking if you want to delete the selected event or events.

## Using ENPS to schedule events

### Setting up ENPS Assignment Grid

ENPS provides a standard layout for assignment grid of Newsgathering that can be customized according to your needs.

In order to schedule events via ENPS, you need to set up specific assignment fields and assignment template.

Each line of the grid represents a separate story item. When you click on a line of the Newsgathering, you will see linked grids into which information about the story can be entered.

1. On an ENPS client, log in as the administrator and start up ENPS.
2. From the NEWS folder, select **System Maintenance | Global Configuration Options** and make sure that **DEFAULTMOSVERSION** is set to **2.6**.
3. Add a new field, `FormatSubFieldValues` and set its value to 1. (Only applicable for ENPS version 5.00.0077 or higher.)
4. If no setting has been changed or added, go directly to step 5. If yes, restart News Object Manager (NOM) to ensure that the new field is added.
5. From the NEWS folder, select **System Maintenance | [Enterprise Name] Fields** and add the following parameters:

ID	Default Caption	Just	Validation	List	Width	Type	Word Wrap	MOS Send
GVFeedSource	Feed Source	Left	ComboBox	List of router sources. [Available choices to appear in a pull-down list, delimited by pipes] E.g. Source 1\Source 2\Source 3	1000	Event Sheet		
GVStart	Start Time	Left	Time (For ENPS versions lower than 5.00.0077) MOSDateTime (For ENPS 5.00.0077 or higher)		1000	Event Sheet		
GVEnd	End Time	Left	Time (For ENPS versions lower than 5.00.0077) MOSDateTime (For ENPS 5.00.0077 or higher)		1000	Event Sheet		
GVFeedNotes	Feed Notes	Left	Text		1000	Event Sheet	✓	
GVDestination	Channel	Left	ComboBox	List of record channels. [Available choices to appear in a pull-down list, delimited by pipes] E.g. Channel 1\Channel 2\Channel 3	1000	Event Sheet		
GVLocation	Location	Left	ComboBox	List of record locations. [Available choices to appear in a pull-down list, delimited by pipes] E.g. default\Crash\Daily Feeds	1000	Event Sheet		
GVETA	ETA	Left	CheckBox		300	Event Sheet		✓
GVFeeds	Feeds	Left	Form	ETA...GVETA\Feed Source,C\{See note*},GVFeedSource\Channel,C\{See note**},GVDestination\Location,C\{See note***},GVLocation\StartTime,Time,.,GVStart\EndTime,Time,GVEnd\FeedNotes,GVFeedNotes (For ENPS versions lower than 5.00.0077)	1000	Event Sheet		✓
GVFeeds	Feeds	Left	Form	ETA...GVETA\Feed Source,C\{See note*},GVFeedSource\Channel,C\{See note**},GVDestination\Location,C\{See note***},GVLocation\StartTime,.,GVStart\EndTime,.,GVEnd\FeedNotes,.,GVFeedNotes (For ENPS 5.00.0077 or higher)	1000	Event Sheet		✓

**NOTE:** \*Available choices should be similar to the ones in `GVFeedSource`, but delimited by backslashes. E.g. `Source 1\Source 2\Source 3`

**NOTE:** \*\*Available choices should be similar to the ones in `GVDestination`, but delimited by backslashes. E.g. `Channel 1\Channel 2\Channel 3`

**NOTE: \*\*\*Available choices should be similar to the ones in GVLocation, but delimited by backslashes. E.g. default\Crash\Daily Feeds**

6. Restart ENPS client.

Sample assignment fields for ENPS versions lower than 5.00.0077:

ID	Default Caption	Just	Validation	List
GVDestination	Channel	Left	ComboBox	Channel 1 Channel 2 Channel 3
GVEnd	End Time	Left	Time	
GVETA	ETA	Left	Check-Box	
GVFeedNotes	Feed Notes	Left	Text	
GVFeeds	Feeds	Left	Form	ETA,,,GVETA Feed Source,C Source 1 Source 2 Source 3,,GVFeedSource Channel,C Channel 1 Channel 2 Channel 3,,GVDestination Location,C default Crash Daily Feeds,,GVLocation Start Time,Time,,GVStart End Time,Time,,GVEnd Feed Notes,,,GVFeedNotes
GVFeedSource	Feed Source	Left	ComboBox	Source 1 Source 2 Source 3
GVLocation	Location	Left	ComboBox	default Crash Daily Feeds
GVStart	Start Time	Left	Time	

Sample assignment fields for ENPS version 5.00.0077 or higher:

ID	Default Caption	Just	Validation	List
GVDestination	Channel	Left	ComboBox	Channel 1 Channel 2 Channel 3
GVEnd	End Time	Left	MOSDateTime	
GVETA	ETA	Left	Check-Box	
GVFeedNotes	Feed Notes	Left	Text	
GVFeeds	Feeds	Left	Form	ETA,,,GVETA Feed Source,C Source 1 Source 2 Source 3,,GVFeedSource Channel,C Channel 1 Channel 2 Channel 3,,GVDestination Location,C default Crash Daily Feeds,,GVLocation Start Time,,,GVStart End Time,,,GVEnd Feed Notes,,,GVFeedNotes
GVFeedSource	Feed Source	Left	ComboBox	Source 1 Source 2 Source 3
GVLocation	Location	Left	ComboBox	default Crash Daily Feeds
GVStart	Start Time	Left	MOSDateTime	

### Setting up ENPS assignment template

You need to set up ENPS assignment template before you can schedule events via ENPS.

1. Create a new Newsgathering by naming it `GV Assignments`.
2. Enable **MOS Control Active** and **MOS Story Send** (to Aurora Playout's MOS ID).
3. Delete all existing columns except **Story Slug**.
4. Select **Layout | Add Columns** and add following columns:
  - Break
  - ETA
  - Feed Source
  - Channel
  - Location
  - Start Time
  - End Time
  - MOS Status
  - Feed Notes

5. Insert two new rows, change the **Story Slugs** to **AM Assignments** and **PM Assignments** and select **Break** for both.

***NOTE:** Make sure that both rows are inserted above the black line that appears in the Assignment Grid.*

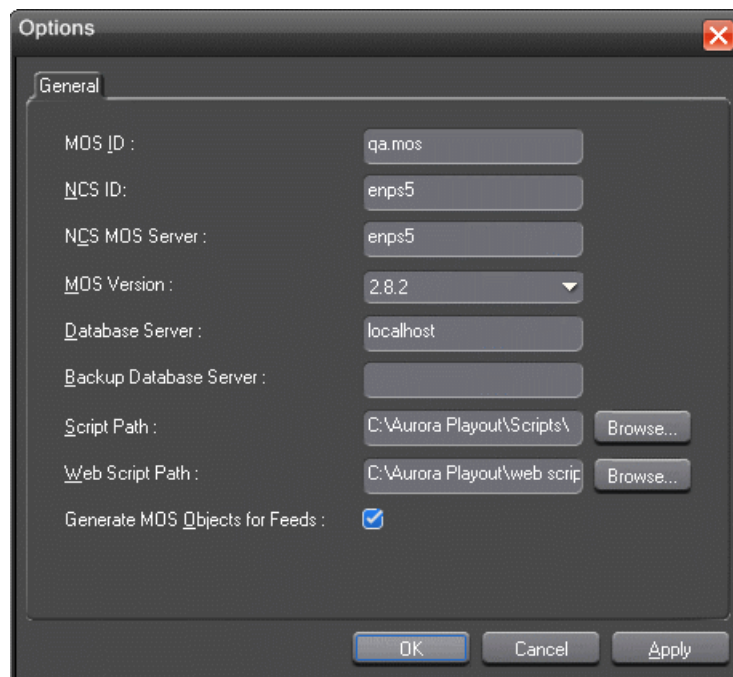
6. Delete the **Break** column.
7. Select **Layout | Save as template** and click **Yes** to save the template.

### Scheduling events with ENPS

You can schedule events on the Scheduler via ENPS by creating a newsgathering grid.

Prior to creating a newsgathering in ENPS, take note of the MOS ID of your XMOS Server (by clicking **Tools | Options**) and ensure that the NCS ID is configured to ENPS.

If your workflow requires embedded MOS Object IDs with each scheduled event, ensure that the **Generate MOS Objects for Feeds** checkbox is selected in XMOS Server and Aurora Ingest Server.



Channel availability depends on channel group and user logon that had been setup within Aurora Ingest Server.

Make sure there is at least 10 seconds of space between scheduled feeds.

1. From the NEWS folder, select **New | Newsgathering** and the following window will be displayed:

The screenshot shows a configuration window for 'GV Assignments' with a start date of 17/12/2009. On the left, a 'Blank Newsgathering Event Sheet' is visible with 'GV Assignments' selected. The main area contains a list of settings:

Allow External Modification	
Duplicate Slug Options	
Publishing Days	
Publishing Active	
Publishing Target	
Story Log Preview Size	
MOS Control Active	<input checked="" type="checkbox"/>
Auto Archive	
Enable CTOS	
MOS Story Send	gvg.nqp.mos
AutoCreate Time	
AutoCreate Days In Advance	
AutoCreate Days	

Buttons for 'Go', 'Cancel', and 'Apply' are at the bottom right.

2. Select **GV Assignments** template and configure the newsgathering:

The program name will also be GV assignments by default; you can change the program name to suit your broadcast operation.

- a) Enable the **MOS Control Active** field by clicking on it.

A check sign will be displayed.

- b) Click on **MOS Story Send** and select your MOS ID from the list.

You can also select **ETA Assignments** template if you want to assign an ETA event. The ETA event is a channel reservation through ENPS interface for an event that has tentative start time. As the ETA event reserves a specific channel on the Scheduler, you cannot assign another event on it. You can crash record the ETA event after the scheduled time has lapsed.

3. Click **Go**.

Story Slug	Segment	Object Autocreate	Feed Source	Channel	Location	Start Time	End Time
AM Assignments							
PM Assignments							

The above window will be displayed.

If you selected ETA Assignments template, the below window will be displayed:

Story Slug	Segment	Object Autocreate	ETA	Feed Source	Channel	Location	Start Time	End Time
AM Assignments	✓							
PM Assignments	✓							

4. To create a story or newsgathering item, right-click on AM Assignments or PM Assignments and select Insert row or press CTRL-I for the hotkey.
5. Enter the name of the story and click on each column on the selected line of the assignment grid to fill out other information of the event you are scheduling:

- Object Autocreate—Select the MOS ID that you use for MOS Story Send. If the **Generate MOS Objects for Feeds** option is selected in Aurora Ingest Server and XMOS Server, a MOS Object ID will be created within the system and assigned to that story. Then, the feed event will be recognized as a MOS Object and it can be searched within ENPS.


**NOTE: The ObjectAutoCreate column is the trigger mechanism that adds the MOS Object into the system.**

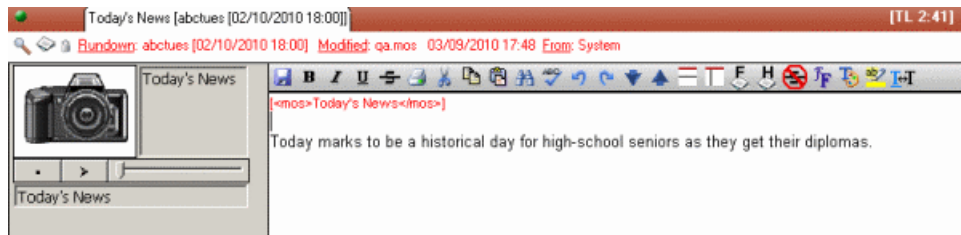
- ETA—Click the field in the column to assign the story as an ETA event.  
A check sign will be displayed in the ETA column.
- Feed Source—Select the feed source from the drop-down list. If a router is configured within Aurora Ingest - Server, router sources are available within the drop-down.
- Channel—Select the name of the channel for the recording. Available channels depend on channel group and user logon setup within Aurora Ingest - Server. A channel will be auto-assigned, if no channel is entered for this setting.  
**NOTE: If there aren't any channels available on the Scheduler, ENPS doesn't have any way of alerting the user.**
- Location—Select the record location of the event from the drop-down list.
- Start Time—Enter the start time of the event. The time format is HH:MM.
- End Time—Enter the end time of the event. The time format is HH:MM.
- MOS Status—The status changes to Standby and the event shows up in Aurora Ingest Scheduler.
- Feed Notes—Enter the description or any extra information of the event.


6. Create more stories if you want to schedule more events via ENPS.

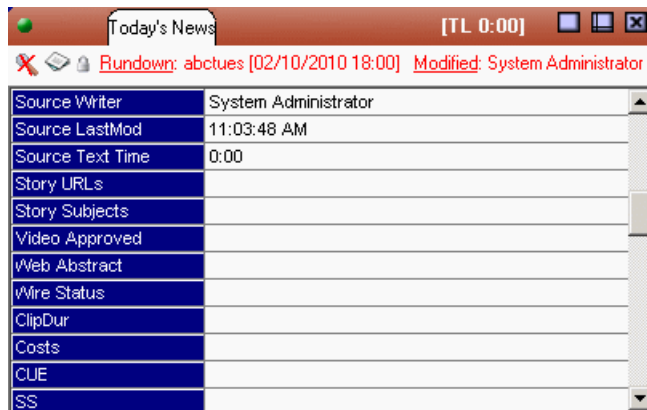
Details of the scheduling can easily be changed and viewed on the assignment grid.

GV Assignments [01/20/2010]							
Story Slug	Segment	Feed Source	Channel	Location	Object Autocreate	MOS Status	
<b>AM Assignments</b>							
NewsPath 7AM		SRC2	SD-chan1	default	gvg.nqp.mo		
CNN 9AM		SRC2	k2_hd2	default	gvg.nqp.mo		
Reuters 11AM		SRC1	SD-chan1	Aerials			
<b>PM Assignments</b>							
CNN 1PM					gvg.nqp.mos		
CNN 2PM		SRC1	K2_HD chan3	PFTTransfer	gvg.viz.mos		
CNN 3PM					gvg.xmosx.mos		

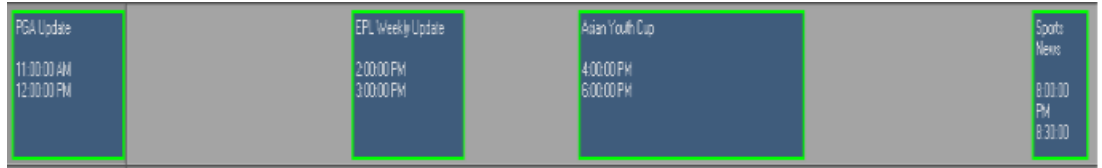
7. Double-click on the Script icon  if you want to write scripts for the story.



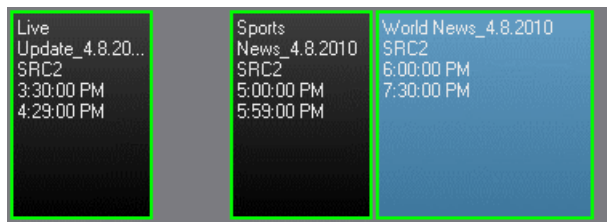
8. You can also click  within the script window to edit details of the scheduling.



9. Open your Scheduler main window to see events scheduled via ENPS. Those events are distinguished from other events by green borders.

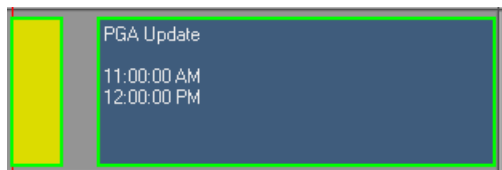


Even an ETA event has a green border because it is scheduled via ENPS. However, the event has a black background which is similar to a channel reservation event on the Scheduler. While, a regular ENPS event has the same background color as other events on the Scheduler.



10. You can also change the border color of ENPS events in the color tab within **Tools | Options** of the Scheduler.

Status colors of ENPS events are the same as other events setup on the Scheduler. As can be seen below, the ENPS event displays in yellow as the event is cueing.



11. The MOS Status change is updated on the assignment grid of ENPS in this sequence:
  - Standby
  - Cueing/Cued
  - Recording
  - Done
12. To delete an event, you need to delete it from the assignment grid in ENPS.

You cannot delete an ENPS event in Aurora Ingest Scheduler.



## Scheduling events between Scheduler and ScheduALL

The scheduling integration between Aurora Ingest Scheduler and VizuAll, Inc.'s ScheduALL allows cross-over compatibility between both applications and with strengths from both programs, users will benefit more for a greater management solution of transmission operations.

In order to use ScheduALL with Scheduler, ScheduALL configuration is done within **Tools|Options|System** of Aurora Ingest Server. Channel names and router sources that are used should match respectively for both applications. The integration also allows ScheduALL to communicate with multiple Aurora Ingest Servers within an operation. Therefore, each channel on those Ingest Servers must be configured with unique names to avoid scheduling conflicts with ScheduALL.

With the scheduling integration, feeds that are set up on the Scheduler will appear on the ScheduALL interface. While, adding feeds on the ScheduALL will have those feeds appear directly on the Scheduler. If there is a conflict during the scheduling process, a dialog box will pop up to alert users of the issue and the status of the feed will be unconfirmed.

### Adding New Events from Scheduler into ScheduALL

With scheduling integration between Scheduler and ScheduALL, you can add events as you normally would on the Scheduler and have those events appear on the ScheduALL interface.

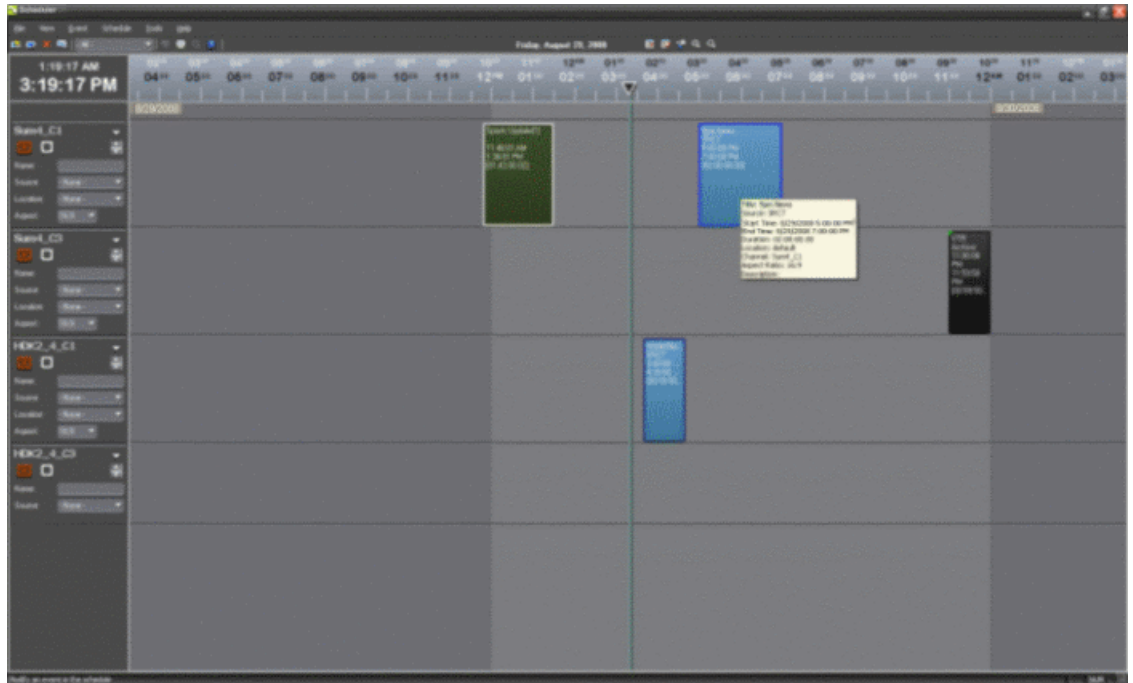
The ScheduALL web service must be configured within Aurora Ingest Server before you can use it with Aurora Ingest Scheduler.

To add a new event:

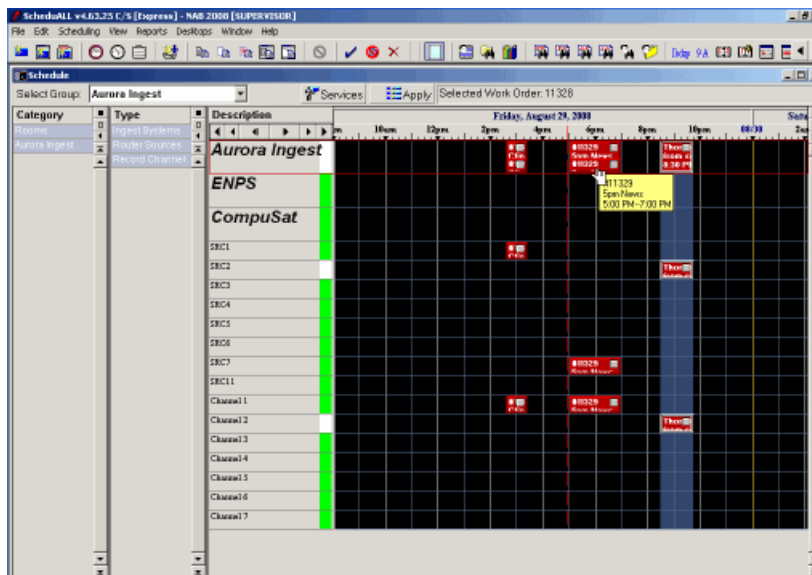
1. Add an event by clicking the  button on the Scheduler toolbar.

The Add Event dialog box appears and fill in the event information as you normally would.

2. Click **Add** and the event appears on the Scheduler interface.



3. Within a few seconds, you can see the same event appears automatically on the ScheduALL interface.



If there's a scheduling conflict between Scheduler and ScheduALL, a dialog box will appear to alert the issue. You can then adjust the start or end time of your event to avoid the conflict.

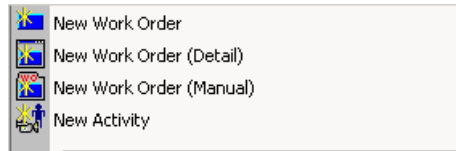
### Adding New Events from ScheduALL into Scheduler

With scheduling integration between Scheduler and ScheduALL, you can add events on the ScheduALL and have those events appear on the Scheduler interface.

Aurora Ingest group and room with respective router sources and channels must be configured within ScheduALL in order to synchronize with the Scheduler. ScheduALL must also be configured to use Ingest web service for the scheduling integration to run smoothly.

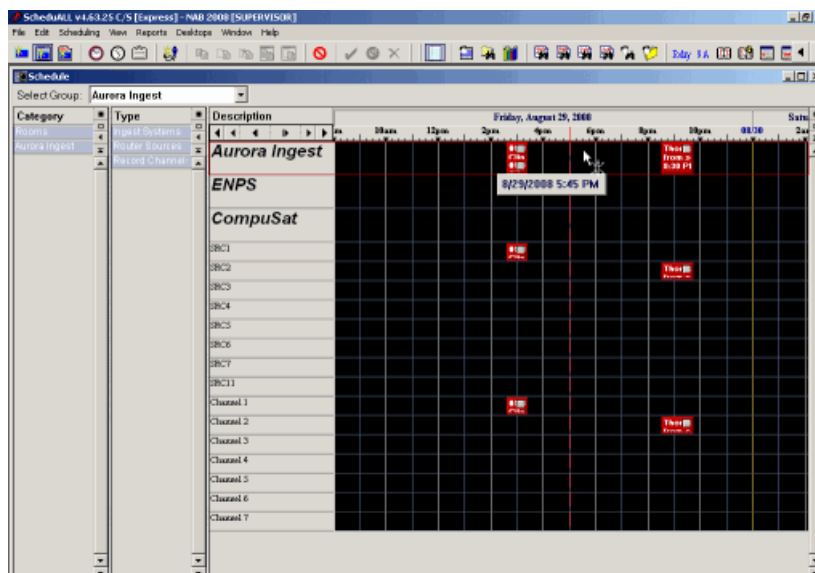
To add a new event on ScheduALL:

1. Log in to the ScheduALL for Windows application.
2. From the File menu, select ScheduALL and click ScheduALL Screen.
3. Right click on the schedule grid and select **New Work Order (Detail)** from the menu.



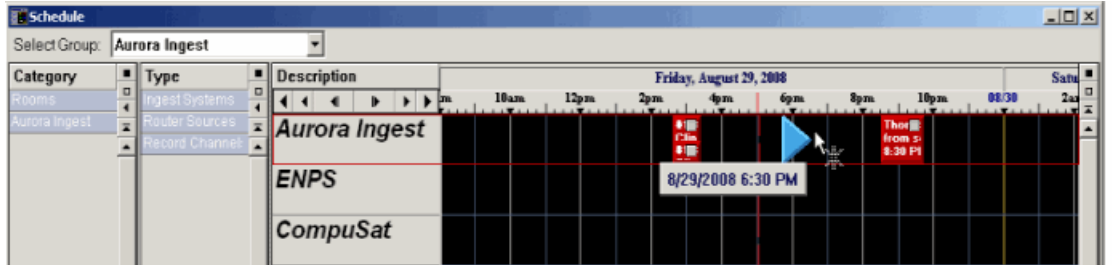
The cursor changes to an asterisk marker with date and time indicators for users to book a time slot within the grid.

4. Click and drag the marker to book a time slot.

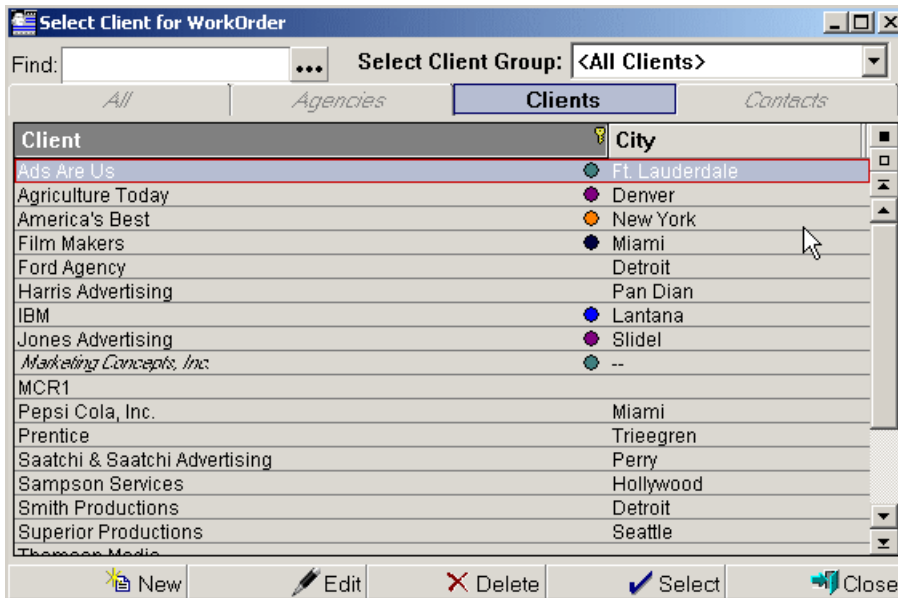


5. You can see a blue arrow on the grid to indicate the slot that had been chosen.

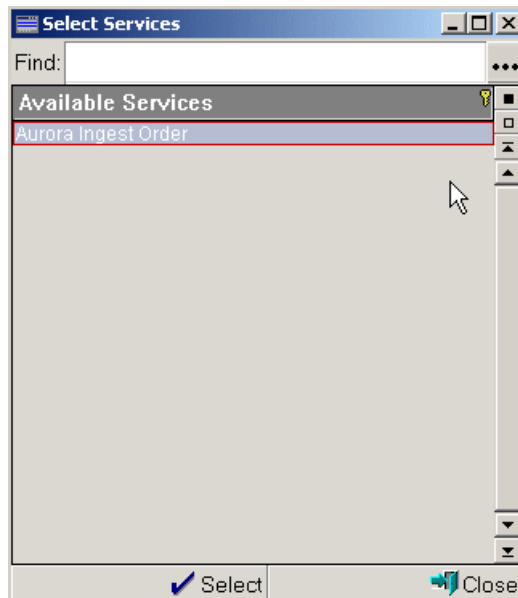
Click at the selected end time on the grid to book the time slot.



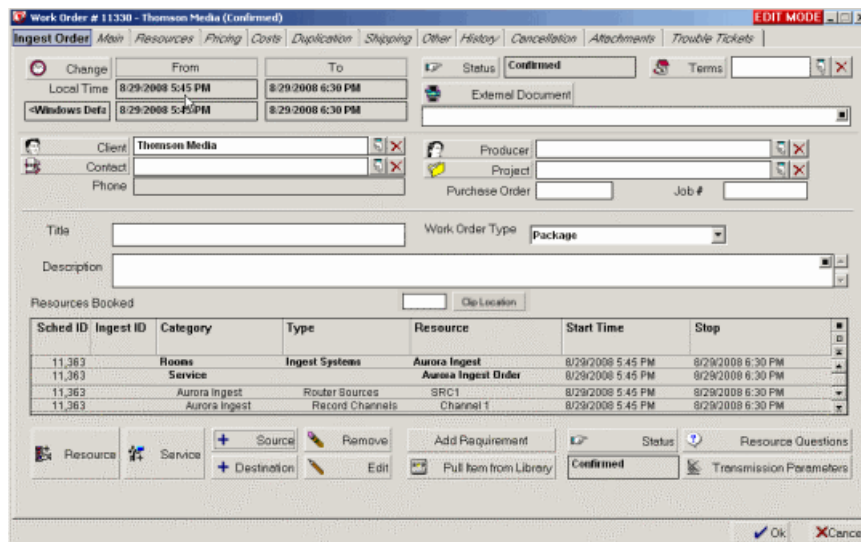
6. The Select Client for WorkOrder dialog box launches automatically (if configured to do so in User Preferences). Double-click a client to continue.



7. The Select Services dialog box launches automatically (if configured to do so in User Preferences). Double-click the **Aurora Ingest Order** service to continue.

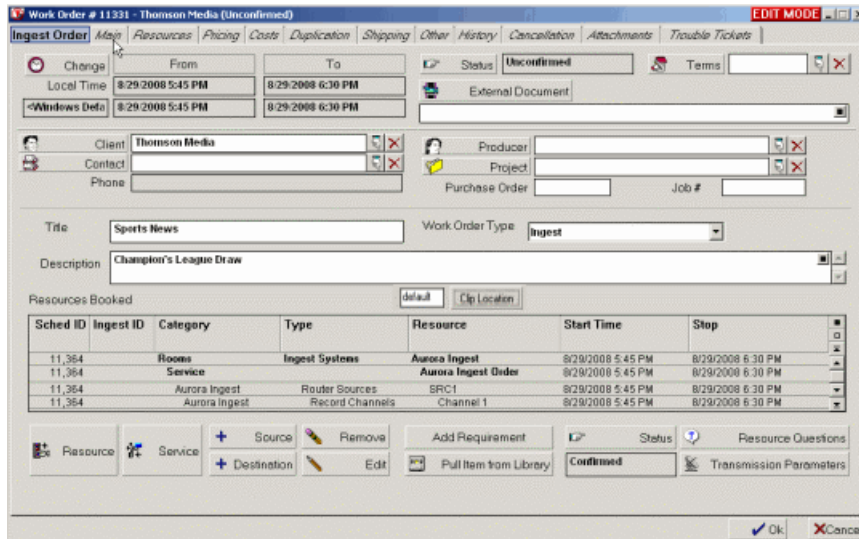


- The Work Order dialog box launches automatically once the client and service had been selected.



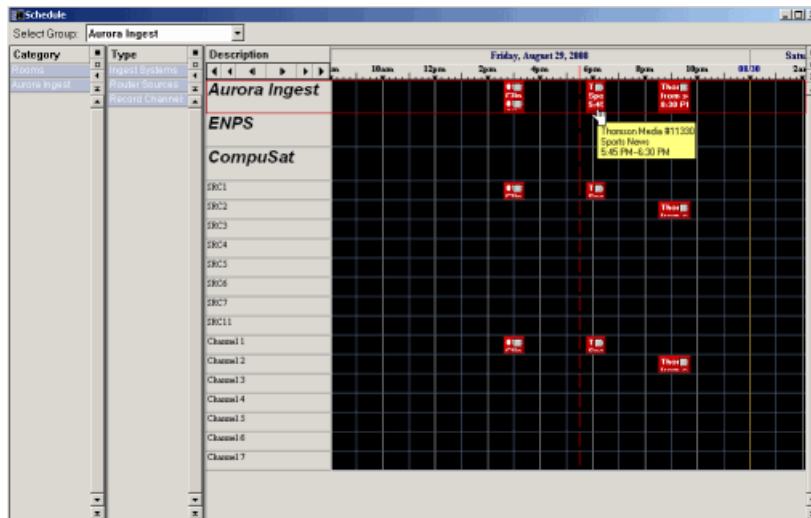
- Enter the title and description of the event in the Work Order dialog box.

You also need to change the Work Order Type from **Package** to **Ingest**.

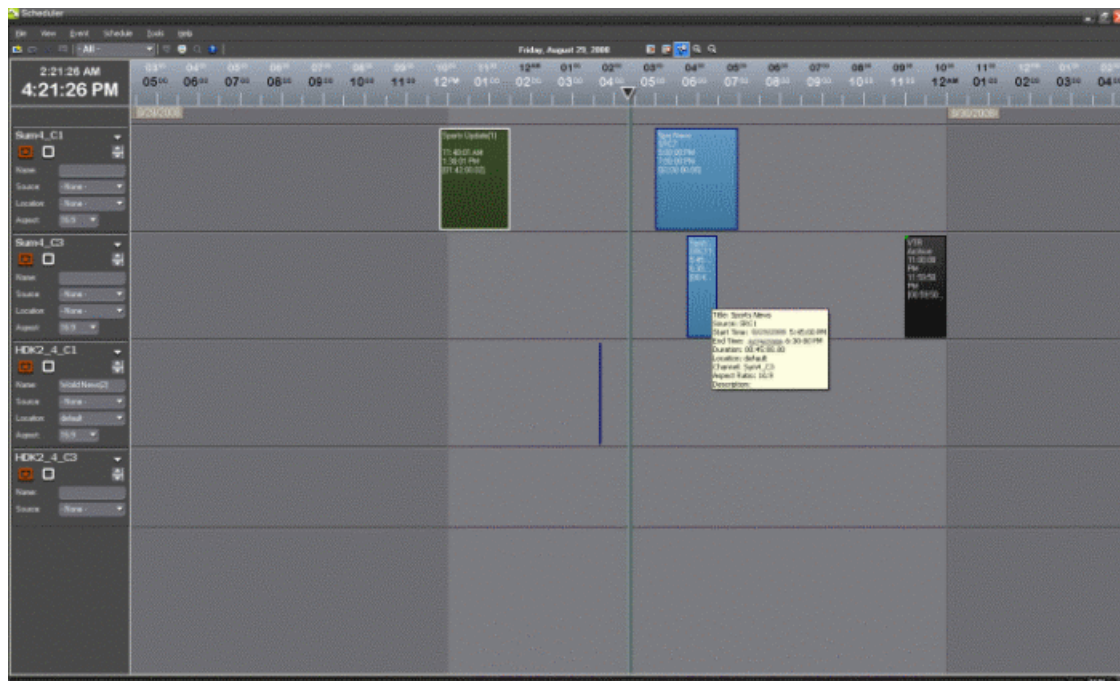


10. Lastly, change the Status from Confirmed to Unconfirmed. The status will be automatically changed to Confirmed once Scheduler verified that no time conflicts exist on the scheduled event.
11. Click **OK**.

The Work Order is created and you can see the event on the ScheduALL interface.



12. You can see the event created on ScheduALL appears automatically on the Scheduler interface.

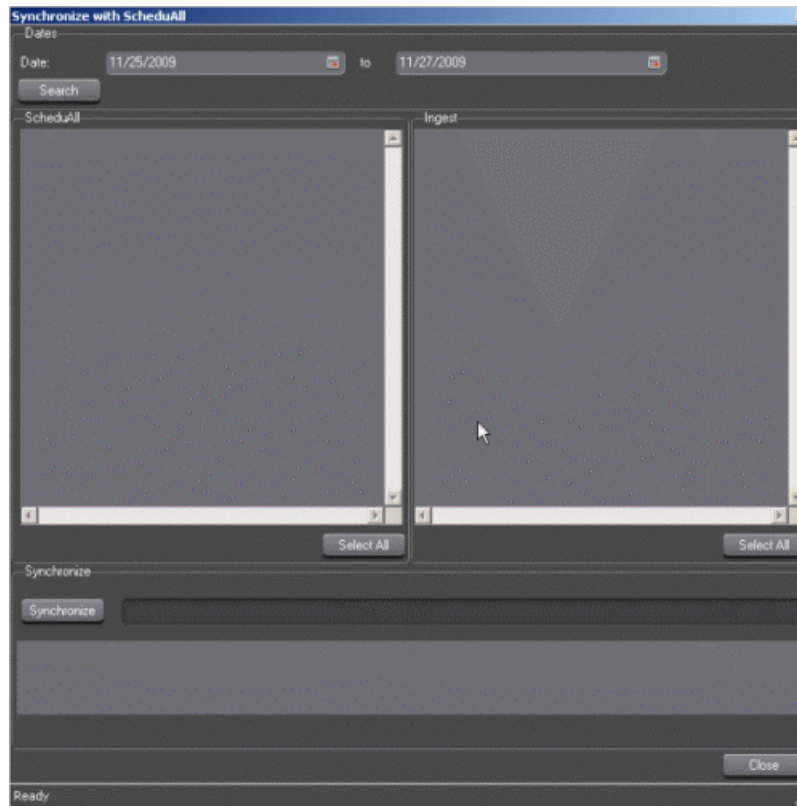


### Synchronizing Events between Scheduler and ScheduALL

Events on both applications need to be synchronized especially when Ingest Server or ScheduALL is suddenly closed and needs to be restarted.

To synchronize events:

1. Select **Tools | Options | System** within Aurora Ingest Server.
2. Click the **Configure** button, beside the ScheduAll Server setting to launch the ScheduAll Properties window.
3. Then, click the **Synchronize Events** button to launch the Synchronize with ScheduAll window.



4. Select the date range of events that need to be synchronized and click the **Search** button.

All events that had been scheduled in Aurora Ingest Scheduler and ScheduALL within the specified date range will be listed on the window.

5. To synchronize events from ScheduALL into Aurora Ingest Scheduler, select events on the ScheduAll window and click the **Synchronize** button.

Events that have been scheduled within ScheduALL will be added into Aurora Ingest Scheduler.

6. To synchronize events from Aurora Ingest Scheduler into ScheduALL, select events on the Ingest window and click the **Synchronize** button.

Events that have been scheduled within Aurora Ingest Scheduler will be added into ScheduALL.

## Creating a template

A template saves time by storing information that will be used for multiple events.

A template is created from an event. Without details from a prior event, you can also create a template within Schedule Manager window of the Scheduler. You can also




create a template that enable gang rolls, that is, a template that lets you trigger multiple channel records from disparate sources simultaneously. With MediaFrame integration, you can save metadata in your template as well.

1. Select the event you want to use as a template.

If there is no event in Aurora Ingest Scheduler, add an event now.

2. Select **Event | Save as Template**.

3. Fill in the information that you want included in the template.
  - a) **Template Name**—Enter the name of the event template.
  - b) **Clip Title**—Enter a different clip title if needed. By default, the clip title of the selected event is automatically entered in this field.
  - c) **Router Source**—Select a different router source to record from in the drop-down list if needed. By default, the router source of the selected event is automatically entered in this field.
  - d) **Gang Roll**—Click Gang Roll button  to select several router sources to start recording simultaneously.
  - e) **Aspect ratio**—Select the aspect ratio that you want for the recording of the feed.

This feature is enabled if the option is selected in System tab within Tools | Options of Aurora Ingest Server, the user is given permission to switch aspect

ratio and the feed is going to be recorded into K2 version 3.2 controlling SD channels only.

- f) **Recording Channel**—Select a different channel than the one automatically entered from the selected event if you want. Channel availability depends on channel group and user logon setup within the Aurora Ingest Server.
- g) **Clip Location**—Select a different record location than the one automatically entered from the selected event if you want. Availability of record locations depend on your setup within the Aurora Ingest Server.
- h) **Record Backup**—Check the box if you want to record backup of an event as part of the event template. Select the recording channel and recording location of the backup from the drop-down lists.
- i) **Make Public**—This option is available if your logon configuration had been setup to allow you making public templates and filters.

The permission to allow this option for a user is within User Administration setup of Aurora Ingest Server. Check the box if you want to set the template as a public template.

- j) **Save MediaFrame metadata**—This option is available if you already configured MediaFrame within your system. Check the box if you want to save MediaFrame metadata with your event template.
  - k) **Save as Default Template for Recording Channel: CH1**—Check this box if you want to assign the template as a default template for the particular channel. This allows users to crash record easily and saves time by not having to fill up details of the event.
4. If you already configured MediaFrame for use with Aurora Ingest, you can enter metadata for the asset within the Metadata tab.
- **Name** — The name of the clip will be the same as the one that you entered in the General tab.
  - **Source** — Enter the source of the clip.
  - **Expires** — Select the expiry date for the placeholder. If no expiry date is needed, you can leave it at its default setting: Not Defined.
  - **Description** — Enter the description of the template if needed.
  - **Search Terms** — Enter the search term for the template so that it will be easy to find when you search for it using MediaFrame Search component later.

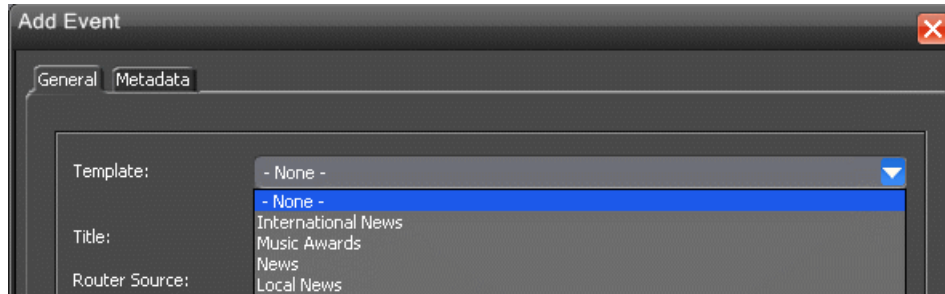
You can also enter metadata within Keywords tab, which referenced a specific timecode location in the media file. This is done by selecting mark-in/out points on the clip and inserting a keyword for that segment.

Within the Custom tab, you can enter additional asset metadata such as editor, videographer, location and any other fields that had been listed. If you have the Administrator privileges, you can add, edit, or delete custom metadata fields.

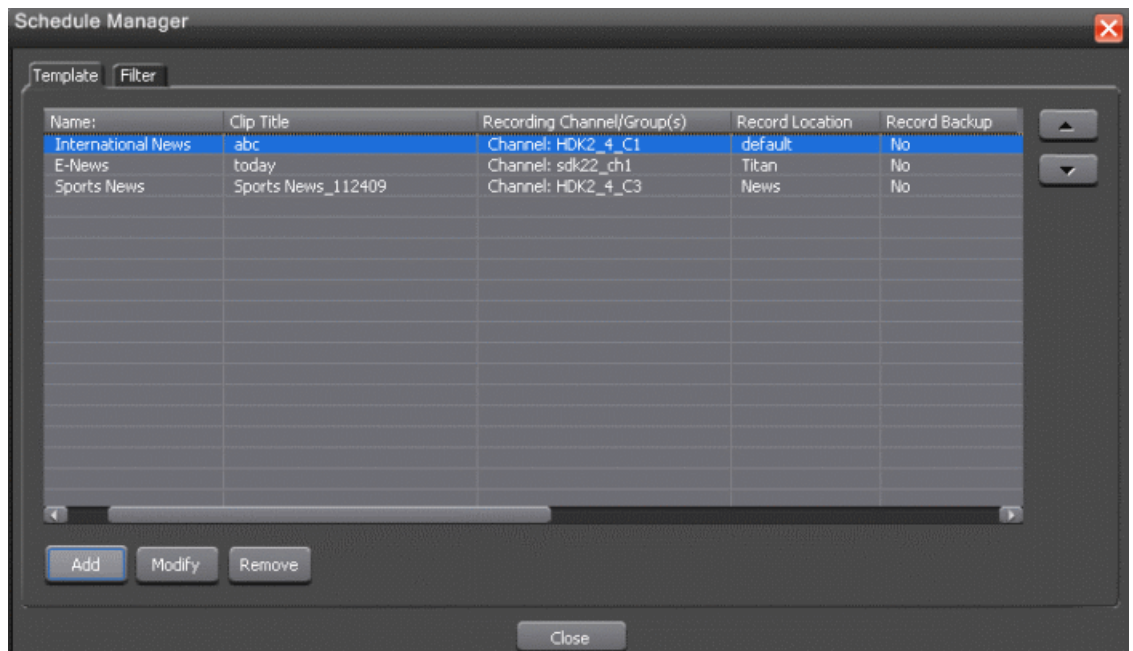
5. Click **OK** to save the template.

You cannot create a template from a channel reservation, only from a feed event on the Scheduler.

The template will be available for you, and other users within your broadcast operation if you set it as a public template. You can select it within the Template drop-down list in the Add Event or Modify Event window.



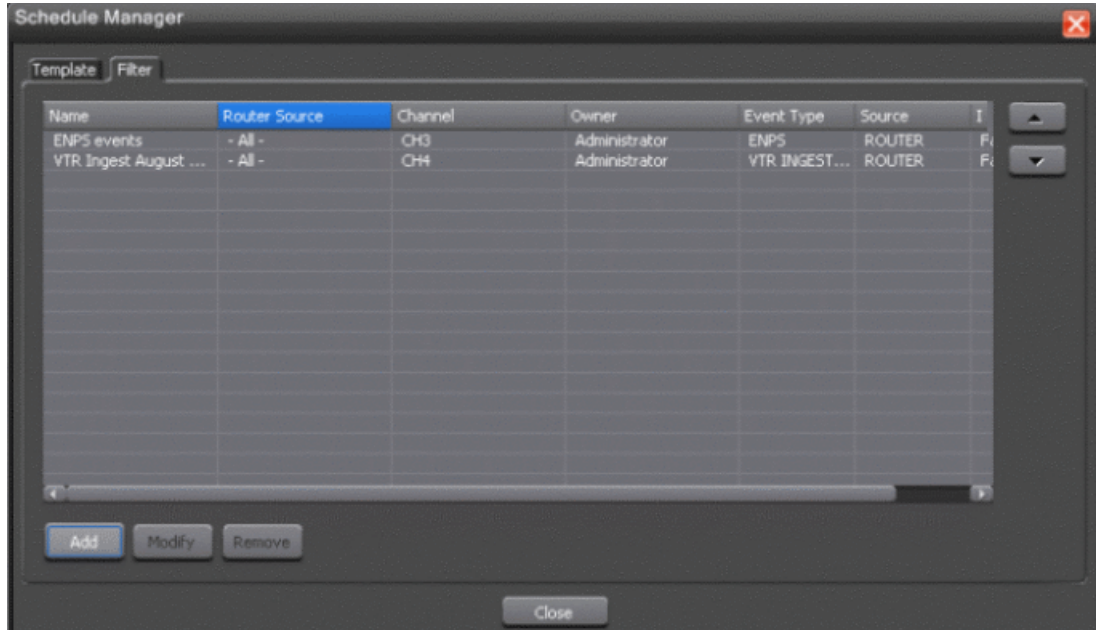
You can also add a new template, modify or remove existing template within **View | Schedule Manager** of the Scheduler.



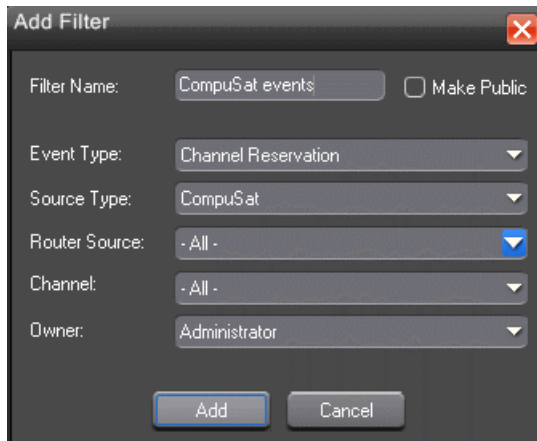
## Using filters

If you have a large number of feeds, it can be tedious trying to locate a particular type of event, or channel, and so on, that you want to view. You can use filters to view events that you are particularly interested in.

1. In Scheduler, select the Filter tab within **View | Schedule Manager**, as displays below.



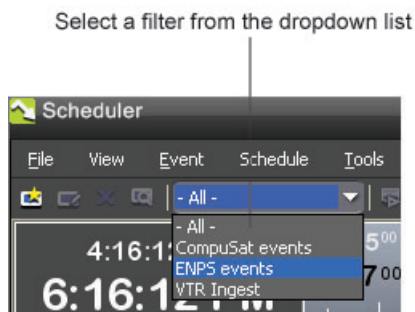
2. Click **Add** to add a new filter.



The Add Filter dialog box displays.

3. Name the filter and select the criteria you want to use to filter:
  - **Make Public**—This option is available if your logon configuration had been setup to allow you making public templates and filters. The permission to allow this option for a user is within User Administration setup of Aurora Ingest -Server. Check the box if you want to set the filter as a public filter.
  - **Event Type**—Select the event type from the dropdown list. You can select all or select a particular event type such as ENPS, Feed, VTR or Channel Reservation.
  - **Source Type**—Select the source type that you need to filter. You can select all or select a particular source such as CompuSat or a router.
  - **Router Source**—Select the particular source if it's applicable for your filter or select all if needed.
  - **Channel**—Select the channel that you will be recording the feeds into. You can select all or select the specific channel that you need to filter.
  - **Owner**—Select all or a particular user of Aurora Ingest that had recorded the feeds. Names that appear on the dropdown list are according to user administration setup in Aurora Ingest - Server.
4. Click **Add** to add the filter to Schedule Manager.

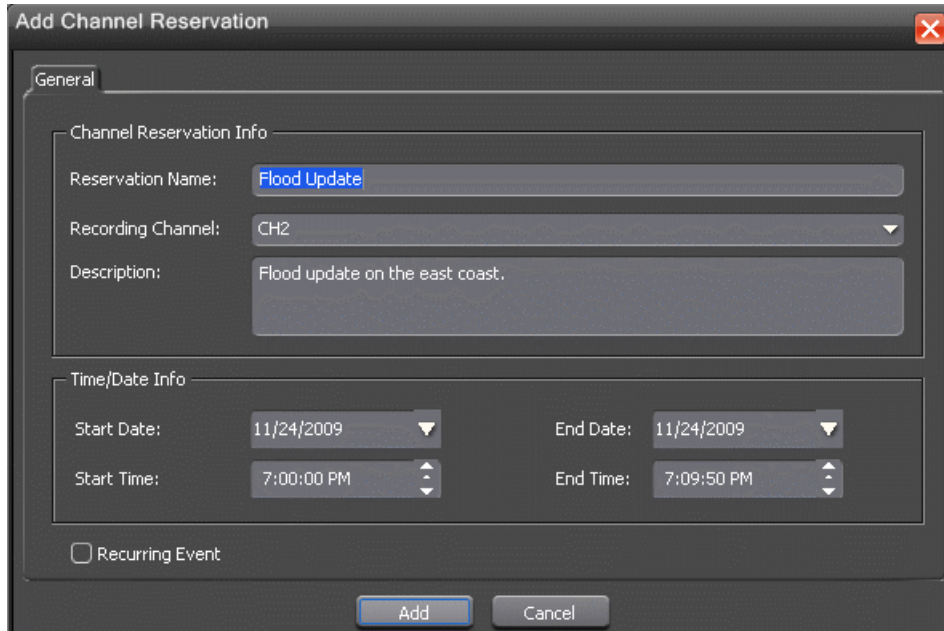
Once the filter is added, you can select it from the dropdown list on the Scheduler toolbar and only filtered events can be seen on the main Scheduler window.



## Using Channel Reservation

Using Channel Reservation allows you to reserve a channel for a future record. This ensures that the channel is reserved for a specific recording and cannot be used to schedule any other events.

1. Select **Event | Add Channel Reservation**.



The Add Channel Reservation dialog box displays.

2. Specify the name of the reservation and the time/date info. If desired, add a description of the clip.

You can also make the reservation as a recurring event. If you do not specify a channel, Ingest will automatically assign one based on availability.

## Using MediaFrame in Scheduler

MediaFrame components can be used within Scheduler after MediaFrame server has been specified within the System setting of Aurora Ingest Server.


There are three MediaFrame components that can be used with Scheduler:

- Adding and editing metadata of assets using the Metadata tab
- Searching assets within servers and MediaFrame database
- Viewing proxy assets via the Asset Proxy Viewer

The adding and editing metadata of assets on the Metadata tab has been described within the Adding New Events section.

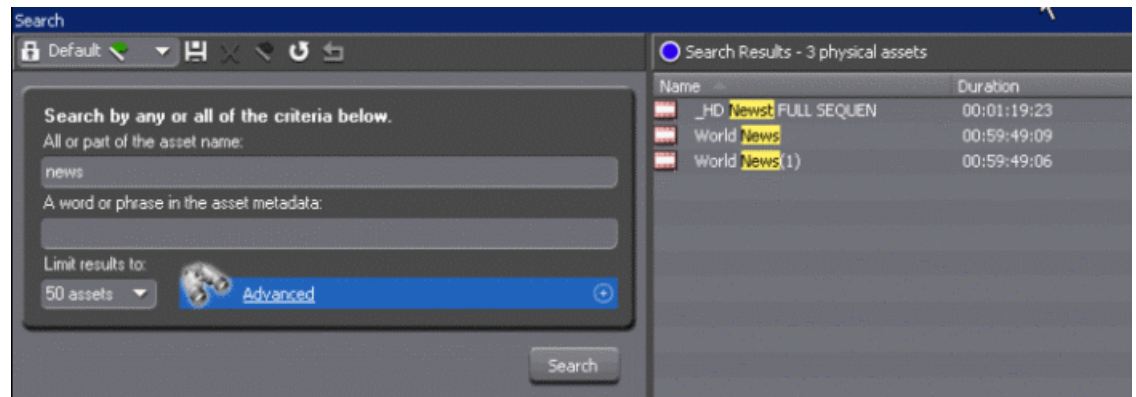
## Searching Assets

With MediaFrame integration, users can quickly search assets using keywords and metadata within the Search window.

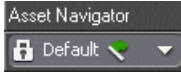








1. Click  on the Scheduler toolbar to launch the MediaFrame Search window.

The Search window is launched at the bottom of the Scheduler interface.

2. Search terms can be entered within the left column and search results will be displayed within the right column of the Search window.



#### Search icon reference table

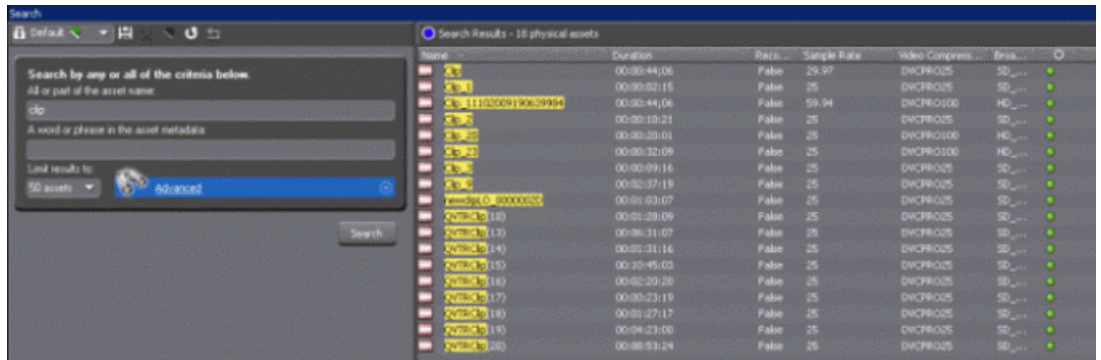
Icon	Description
	Displays the name of the current search, if any.
	Saves search criteria, either globally or locally.
	Deletes the current search.
	Sets the current search to be the default search.
	Resets the default search.
	Undoes the default search reset.
	Indicates a search saved on the MediaFrame server by a particular user. Can be accessed by the user from any Browse Client where they're logged in.
	Indicates a search saved globally.
	Indicates a default search (installed with the application, cannot be modified).

### Searching for an asset by name

Do not enter more than one word in the Asset Name text field unless you want to find both words exactly as typed with spaces.

**NOTE:** *The Asset Name field does not recognize quotation marks.*

To search for an asset by name, enter text or numbers in the Asset Name text field and click the **Search** button.



Search results return in a list of assets that contain the search term in the name of the asset, even if it is a fragment of the name.


### Searching for numbers

You can search for numbers in three ways:

- To find a number in an asset's name, use the Asset Name text field.
- To find a number in the asset's text field metadata, such as the description, use the Asset Metadata text field.
- To find a number only in a specific category, such as a number metadata field or a specific Creation Date, Modification Date, etc., create a filter and select the property to search on.

### Saving a search

You can create a customized search that searches specifically for particular text or properties.

1. Enter your search criteria.
2. Click the **Add Saved Search** icon .
3. Name the search, and if desired make the search accessible globally. You cannot give a search the same name as one of the default searches (which are indicated by a lock icon).



## About searching with filters

Using a filter, you can search assets by name, description, or other specific criteria. You can also use a filter if you are searching for a fragment of metadata.





You can also use a filter in conjunction with text in the asset name or asset metadata text fields. If you search using a text field and a filter, Search returns only assets that have the search term and meet the specified criteria.

You can create an unlimited number of filters and save them as part of a search. Filters can be used as independent search criteria or together with a text search that uses Boolean operators, fragments of asset names, or other asset metadata. Creating a keyword-based filter or an association-based filter lets you find logical assets that are associated with specific criteria.

If more than one filter is defined, an AND operator is implied between them.

### Filter icon reference table

The following table describes the Filter icons.

Icon	Description
	Creates a new filter
	Displays favorite filters
	Modifies a created filter
	Deletes the selected filter.

### Creating a filter

Filters let you customize your searches so that you can quickly locate specific assets.

1. In the Search view, click the plus sign next to Advanced.

The **Advanced Settings** dialog box displays.

2. Click the **Add Filter** icon .

The Add Filter dialog box displays.

3. Select the Property and Comparison criteria from the drop-down lists.
4. If you want to use this filter frequently, check the Add to Favorites box.


If you want to delete the filter from the Favorites list later, you can select Modify Favorites.

5. Click **OK** to add the newly created filter to the active filter list.
6. Press the **Search** button.

The new filter is displayed in the Filters field.

#### About favorite filters

When you create a filter, you can add it to your list of favorite filters. This allows you to quickly access the filters.

The favorite filters are only accessible on the PC where they were created, but they are available regardless of which search you are using. You can access the list by clicking on the Favorite Filters icon. 

#### MediaFrame Character limitations

The following characters are not allowed in MediaFrame asset and bin names.

Position	Character	Description
Anywhere in name	\	backward slash
	/	forward slash
	:	colon
	*	asterisk
	?	question mark
	<	less than
	>	greater than
	"	double quote
		pipe

#### Viewing recordings

With Aurora Ingest - Scheduler, you can view scheduled recordings via two different viewers known as Live Feed Viewer and Asset Viewer.

With the Live Feed Viewer, you can view an incoming video feed as it is recording, add metadata to the feed and crash record events directly from the Live Feed Viewer window.

With the Asset Viewer, you can view previously recorded high-resolution clips and trim the top and tail of a clip if it is already linked to an Aurora Playout placeholder. You can also view low-resolution clips via the Asset Proxy Viewer, add metadata and trim those proxies if needed.

Both Live Feed Viewer and Asset Viewer buttons are easily accessible on the toolbar of Scheduler.

## Using Live Feed Viewer

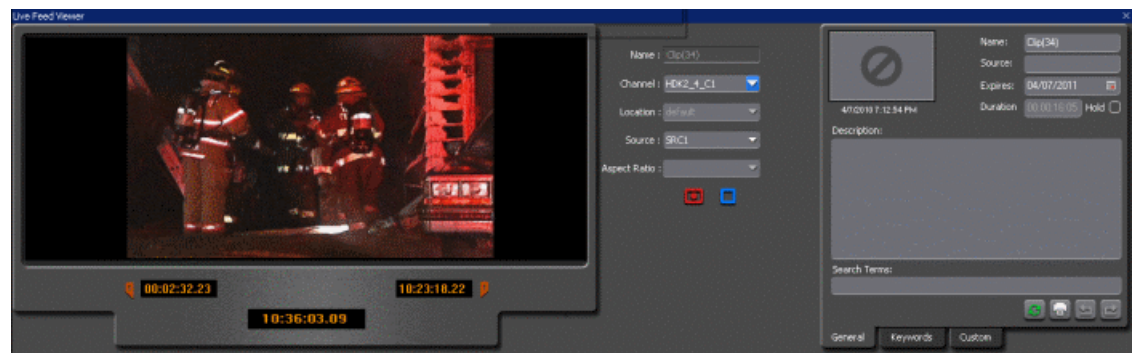
The Live Feed Viewer or also known as Live Previewer can be used to monitor the recording of an event, add metadata to the event, crash record an event directly from the viewer window and trimming of assets.


You need to enable the feature in the video viewer tab within Tools | Options of the Scheduler.

If you have a router configured in your system, you can setup the router source for the Live Previewer in the video viewer tab within Tools | Options of the Scheduler. You do not need to have a video capture card installed in order to use this feature. You can set the Video Display Device drop-down to No Capture Device and configure your router source to an external monitor to preview the feed.

1. Click the **Live Feed Viewer** icon  or select **View | Live Feed Viewer**.

The Live Feed Viewer window opens to the bottom half of the Scheduler interface.



2. You can set details of an event and start a crash record by clicking the **Record**  button within the window.

As the recording starts, you can view the incoming feed and also add metadata for the feed within the right portion of the Live Previewer window.

3. You can also open any recording feeds on Scheduler with the Live Feed Viewer and trim the clip in real-time. Once mark-in and mark-out points had been selected, you can enter keyword for the trimmed clip and the keyword should be searchable within the MediaFrame database.

## Selecting the Asset Viewer

With the Asset Viewer, you can view a previously recorded item or a currently recording item, and trim the top and tail of the clip if it is already linked to an Aurora Playout placeholder. The feature for playback of high-resolution clips on the High Resolution Asset Viewer is currently supported on K2 media clients only. With the MediaFrame integration; you can view low-resolution clips using the Asset Proxy Viewer, provided that proxies have been generated from ingested physical assets.

Playback of high-resolution clips on Asset Viewer requires the configuration of preview channels in the Preview tab within **Tools|Options** of Aurora Ingest - Server.

If you have a router configured in your system, you need to setup the router source for the playback channel. Aurora Ingest - Server will switch the router source of the playback channel to the router destination of video capture card or video monitor defined in the Video Viewer tab within **Tools|Options** of the Scheduler.

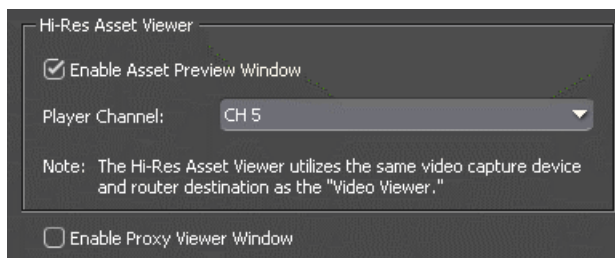
A video capture card is not mandatory because the Asset Viewer window will still launch and you can trim the clip by previewing it using an external monitor. The Asset Viewer uses the same video capture device and router destination as the Video Viewer.

Once configured, preview channels will be available for individual clients of Scheduler. Although multiple clients can be configured to use the same preview channel, it is advisable to configure multiple preview channels and assign different channels to different clients.

You can decide whether to view high-resolution or low-resolution clips within **Tools|Options|Video Viewer** of the Scheduler. To view high-resolution clips, you can set up the preview channel; while to view low-resolution clips, you can check the box to enable the Proxy Viewer window. Once the Proxy Viewer is selected, the ability to setup a preview channel is grayed out.

- To configure a particular playback channel for the Hi-Res Asset Viewer:

Select it from the Player Channel dropdown list in the Hi-Res Asset Viewer section within **Tools|Options|Video Viewer** of the Scheduler.




- To enable the Proxy Viewer:

Check the box to Enable Proxy Viewer Window.

### Using Asset Viewer

The Asset Viewer can be used to view physical assets, add metadata and trimming of assets.

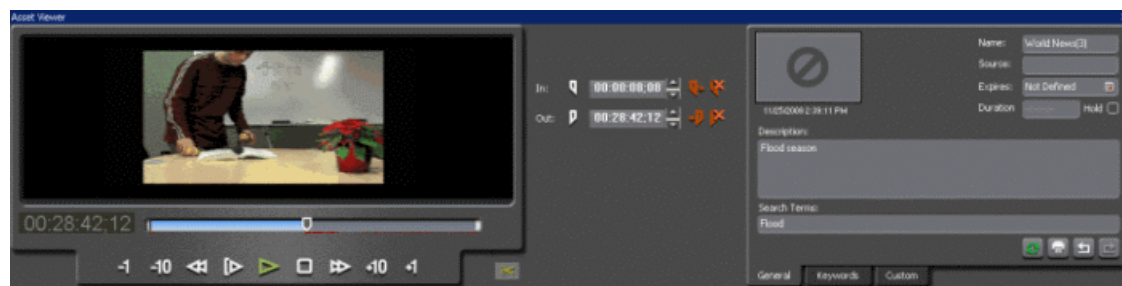
1. Select an event on the Scheduler.
2. Click the Asset Viewer icon  on the Scheduler toolbar or select **View | Asset Viewer**.

The clip loads to the playback channel and the Asset Viewer window opens to the bottom half of the Scheduler interface.

3. You can use control buttons within the Asset Viewer window to view the clip.


At the same time, you can add metadata for the asset within the right portion of the Asset Viewer window.

4. You can also trim the clip and insert keyword for the asset. Once mark-in and mark-out points had been selected, you can enter keyword for the trimmed clip and the keyword should be searchable within the MediaFrame database.



### Using Asset Proxy Viewer

The Asset Proxy Viewer can be used to view low-resolution clips (provided that proxies had been generated), add metadata to the asset and trimming of proxy clips.

1. Click  on the Scheduler toolbar to launch the MediaFrame Search window.

The Search window is launched at the bottom of the Scheduler interface.

2. Enter any words related to the clip that you want to view within the Search window and click the **Search** button.

The search returns a list of clips related to the term that you searched for on the right side of the window.

3. Double-click on a proxy that you want to view .

The Asset Proxy Viewer window opens and loads the proxy.



4. You can use control buttons within the Asset Proxy Viewer window to view the clip.

At the same time, you can add metadata for the asset within the right portion of the window.

5. You can also trim the clip and insert keyword for the asset. Once mark-in and mark-out points had been selected, you can enter keyword for the trimmed clip and the keyword should be searchable within the MediaFrame database.

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## ***Using Aurora Ingest - VTR Controller***

This section contains the following topics:

- *Using VTR Controller*
- *Overview of the VTR Controller Window*
- *Viewing VTR Properties*
- *Accessing VTR Controller*

## Using VTR Controller

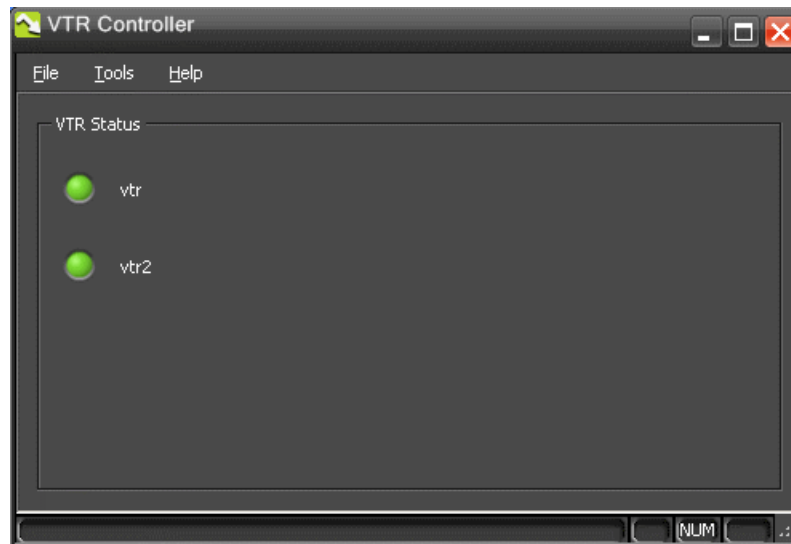
VTR Controller allows you to control up to eight VTRs for VTR Ingest application. Furthermore, VTR Controller allows you to add, modify, or edit VTRs and configure them to work with other Aurora Ingest applications.

You can have VTR Controller and VTR Ingest on the same machine or on two machines connected via Ethernet. If you modify a VTR in VTR Controller, verify the change doesn't conflict with the VTR settings in the VTR Ingest application.

## Overview of the VTR Controller Window

The VTR Controller window shows the status of one to eight VTRs.

The status of each VTR is indicated by the colors: a green indicator shows that the VTR is connected, while a red indicator shows that the VTR is not connected. The status bar at the bottom of the window show the status of the VTR Controller application.

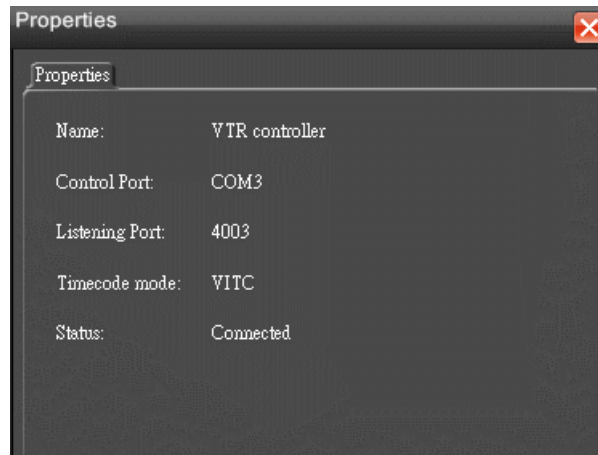


## Viewing VTR Properties

Properties of each VTR can be viewed via the VTR Controller user interface.

- Click on the red or green icon next to the VTR.





The Properties window displays.

## Accessing VTR Controller

There are two ways to launch the VTR Controller application.

- Click on the VTR Controller shortcut icon on the desktop.
- From the Start button follow this path: **Start | Program | Grass Valley | Aurora | VTR Controller**

When VTR Controller is first started, it automatically minimizes to an icon in the right-hand corner of the Windows taskbar.



VTR Controller icon

Double-click on the icon to bring up the main VTR Controller window.

**NOTE:** *If you click the X in the upper-right corner of the VTR Controller window or select **File | Exit**, the application does not exit. Instead, it is minimized, and the VTR Controller icon appears in the Windows taskbar. You can exit the VTR Controller application by right click on the icon and select **Exit**.*



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## ***Using Aurora Ingest - VTR Ingest***

This section contains the following topics:

- *Using VTR Ingest*
- *Overview of the VTR Ingest window*
- *Recording with VTR Ingest*
- *Scanning tape with broken timecodes*
- *Importing an EDL*
- *Exporting an EDL*

## Using VTR Ingest

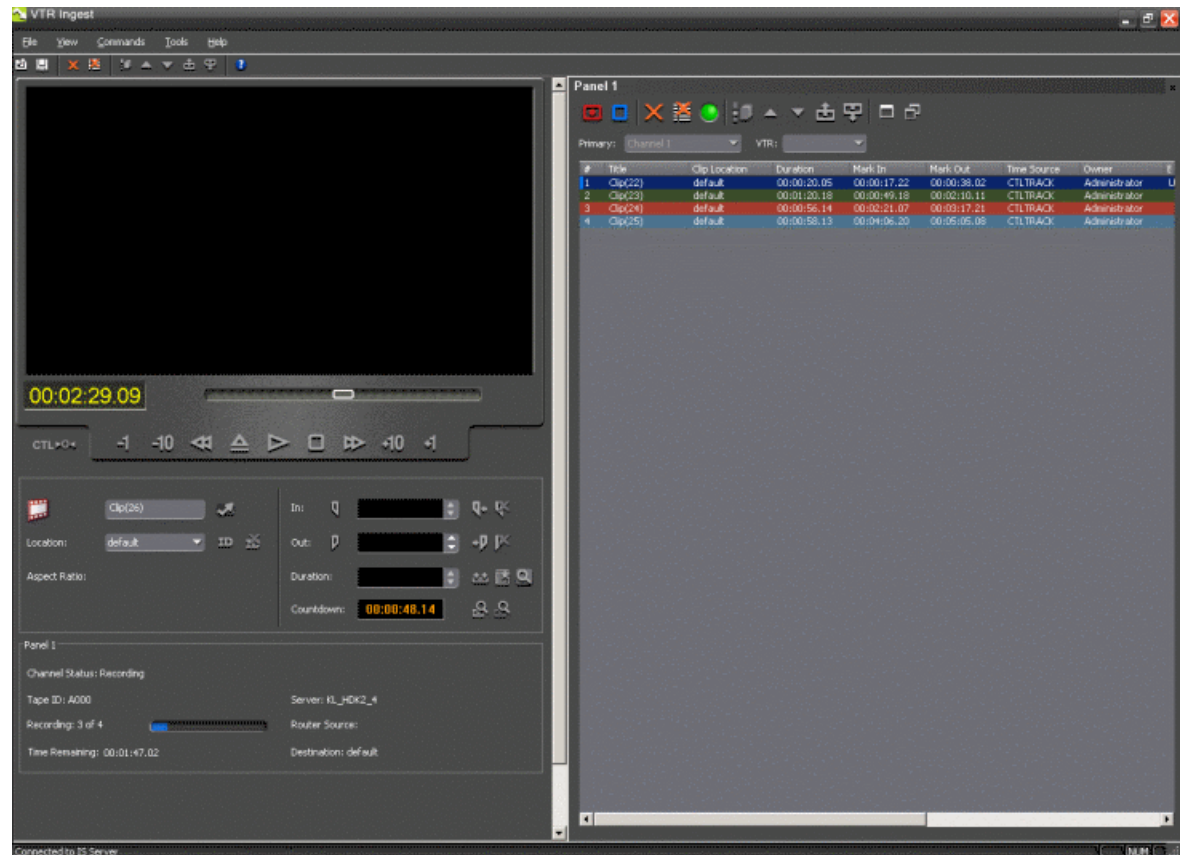
Aurora Ingest - VTR Ingest allows you to record footage from VTRs or feeds from a router directly to a media server in your newsroom.

With VTR Ingest, you can select clips from multiple VTR tapes, create a batch (also known as a segment) list, and record it to the server. You can also export the segment list as an EDL and import it into Aurora Edit.

With MediaFrame integration, you can add and edit metadata for a tape or clips in a batch list. The metadata that had been keyed-in will be searchable within the MediaFrame database.

## Overview of the VTR Ingest window

The VTR Ingest window consists of one to eight channel windows, a viewing window, and a dynamic clip record area.



## Overview of clip record area

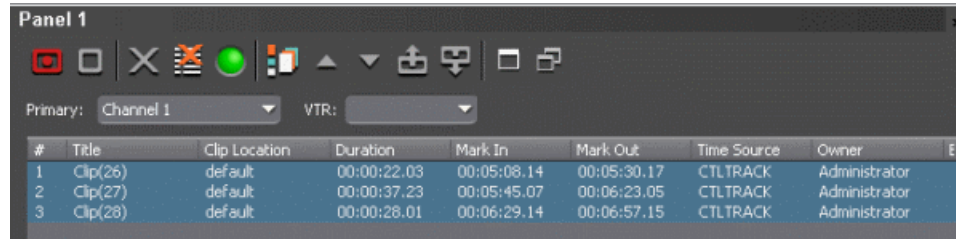
The clip record area of VTR Ingest window consists of a viewing window, VTR control buttons, clip details and recording status.

Users can also use buttons within the clip record area to add clips to a segment list, record handles, clear the tape ID, scan and ingest tapes with broken timecodes, link clips to Aurora Playout placeholder, add metadata to the tape or clips and scan tapes to ingest segments with assigned keyword.



## Overview of channel window

The channel window on the VTR Ingest user interface consists of channel lists, VTR source list, segment list buttons and list of clips to be ingested.



The Toolbar lets you perform common functions for recording clips.

Icon	Function
	Displays channel status—A green icon indicates status is OK; a red icon indicates a problem. Click on this icon to see status for the VTR.
	Deletes the selected clip(s).
	Clears the segment (batch) capture list.
	Organize the segment (batch) capture list firstly by tape IDs, and then by mark in points.
	Move up the selected clip in the capture list.
	Move down the selected clip in the capture list.
	Move segments within the same tape up in the capture list.
	Move segments within the same tape down in the capture list.
	Maximize display of the channel window.
	Restore the previous display of channel window.

Each channel window lists clips that need to ingested on that particular channel and details of each clip can be seen easily as they are arranged in columns.

Column	Description
Title	The name of the clip.
Clip Location	The name of the folder where the clip resides in the media server.
Duration	The duration of the clip.
Mark In	The mark points for the clip.
Mark Out	
Time Source	Control track (CTLTRACK), LTC, or VITC. Note: if using CTL, clip will not be frame accurate, instead it will be +/- 10 frames.
Owner	The name of the person who marked the clip

Column	Description
Error Message	Any error messages describing why the clip was not recorded to the server.
Use Handles	Indicate whether handles have been added to the clip.
Tape ID	The identification of the particular tape

## Recording with VTR Ingest

You can use VTR Ingest to create a segment (batch) list of clips from videotape recordings, which you then record to your media server.

1. Decide if you want to add handles to your clips.
2. Create a segment list or import an EDL.
3. Record the segment list to your media server.

## Adding Handles

If you add handles to your clips, you will have additional frames to choose from when trimming your clips. Grass Valley recommends handles to be used.


- Click the **Record Handle** button .

Handles will automatically be added to your clip.

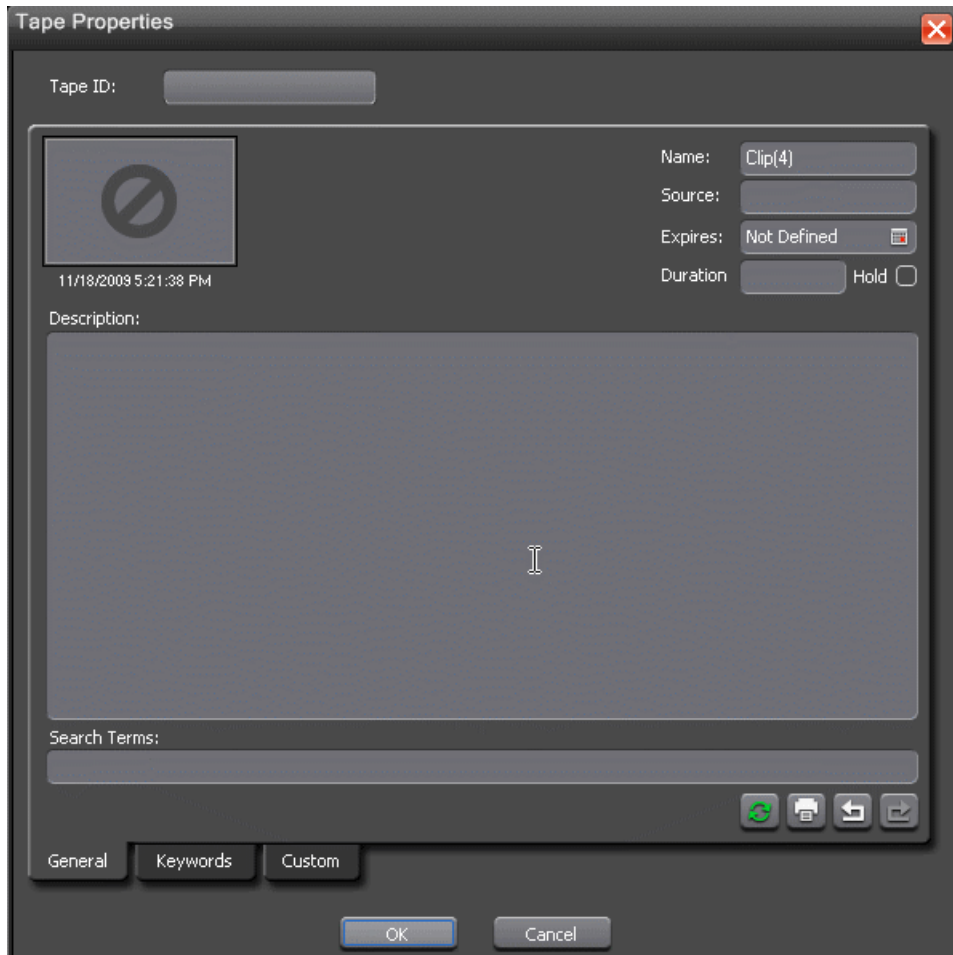
You can set the duration of the handles on the VTR tab of Aurora Ingest Server configuration options.

## Creating a segment list

You can create a segment (or batch) list using VTR Ingest.

1. Insert a tape into the VTR.
2. Click the **Tape ID** button .

If you don't enter a Tape ID and you already checked the **Prompt for Tape ID** box within VTR Ingest configuration, Aurora Ingest prompts you before you add the first clip. The Tape Properties dialog box displays on the screen.




3. Enter the Tape ID. If you don't have MediaFrame configured in your system, you only need to enter the Tape ID.
4. If you already configured MediaFrame for use with Aurora Ingest, you can enter metadata for the asset within the Tape Properties dialog box. Once metadata is entered for the tape, each clip within the batch list will inherit the same metadata.
  - **Name** — The name of the clip that will be in the segment list. The name will be incremented each time you add a clip to the list.
  - **Source** — Enter the source of the clip.
  - **Expires** — Select the expiry date for all clips from the tape. If no expiry date is needed, you can leave it at its default setting: Not Defined.
  - **Description** — Enter the description of the tape.
  - **Search Terms** — Enter the search term for the tape so that it will be easy to find all clips ingested from the tape, when you search using MediaFrame Search component later.

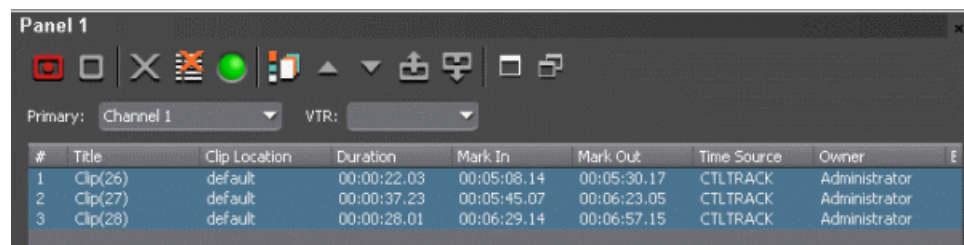


You can also enter metadata within Keywords tab, which referenced a specific timecode location in the media file. This is done by selecting mark-in/out points on a clip and inserting a keyword for that segment.


Within the Custom tab, you can enter additional asset metadata such as the name of editor, videographer, location and any metadata for other fields that had been listed. If you have the Administrator privileges, you can add, edit, or delete custom fields.

5. Play through the videotape to get the footage you need.
6. Select a different record location for the clip, if you want to.
7. Mark an In and Out point for a clip.
8. Click **Add Segment to List**  button or press **C** on your keyboard.

The clip is added to the list on the Channel Window.



9. Repeat steps 5-8 for additional clips.



You can click the **Clip Metadata**  button if you want to add or edit metadata of each clip.

10. To use additional tapes, insert a new tape into the VTR and repeat the steps above.

When you eject a tape, Aurora Ingest clears the tape ID field. You can add the new videotape name anytime after you insert a new tape. If you haven't entered a new Tape ID before you add the first clip from that tape to the segment (batch) list, Aurora Ingest prompts you to add one.










## Deleting the Segment List

You can delete a clip or the entire segment list.

Button	Function	Other Ways to Access
	Deletes the selected clip.	Right-click in segment list and select Delete.
	Clears the segment list.	Right-click in segment list and select Clear All.

## Controlling the VTR with VTR Ingest

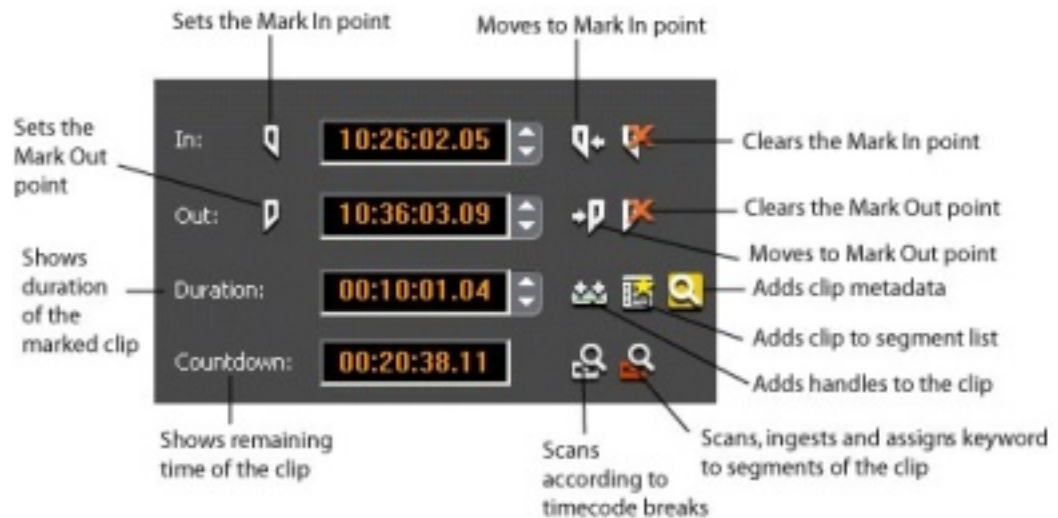
To get the footage you need to create clips, you need to play through the videotape in the VTR. Aurora Ingest provides transport control buttons like those on a tape deck.



Button	Function
	Jogs one frame back.
	Jogs 10 frames back.
	Jogs one frame forward.
	Jogs 10 frames forward.
	Ejects the tape.
	Rewinds the tape.
	Plays the tape.
	Fast forwards the tape.
	Stops the tape.

Use these controls to locate the material you want to record as a clip.

## Marking In and Out Points

Mark points are used to determine the length of a clip.




1. Find the spot on the videotape where you want your clip to begin.
2. Mark an In Point using any of the following methods:
  - Press **I** on your keyboard.
  - Click the **Mark In** button  on the Aurora Ingest window.
  - Type the timecode in the In field.
  - Create a Mark In on the VTR.
3. Play through the tape until you reach the point where you want the clip to end.
4. Mark an Out Point using any of these methods:
  - Press **O** on your keyboard.
  - Click the **Mark Out** button  on the Aurora Ingest window.
  - Use the up or down arrows to find the correct timecode.
  - Type the ending timecode in the Out field.
  - Create a Mark Out on the VTR.

## Recording clips to the media server

After you've created a segment (batch) list, you can record the clips to your media server.

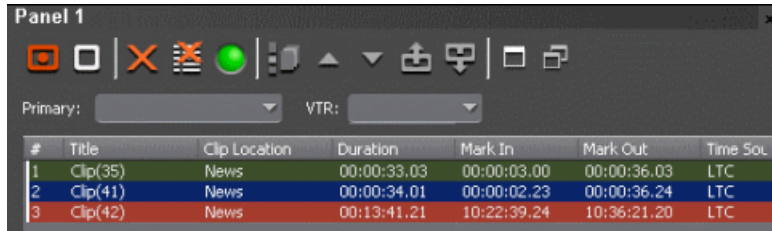
If you want to reserve a channel to record a clip using VTR Ingest, you can ensure this in Scheduler by using Channel Reservation.

If you are recording to SD channels of K2 version 3.2 or higher, you can also set the clip aspect ratio in the clip record area of VTR Ingest. The option to switch aspect ratio is set in the System tab within Tools|Options of Aurora Ingest - Server and it depends on the user administration setup of your ingest operation.

1. Make sure the Channel Window is selected.
2. Click the **Record** button .

While the clip is recording, the record button flashes to indicate an active record.

Aurora Ingest records clips from the VTR tape to the server for later use in a news story.







The clip status in the VTR Ingest window changes from Ready -> Cueing -> Recording -> Done. If the clip didn't record for some reason, status shows as Failed.

## Scanning tape with broken timecodes

Regardless of which timecode mode is used with your VTR; you can scan tapes with broken timecodes, capture clips and assign keywords according to timecode breaks. A batch list will automatically be created and saved as the .vlg EDL type.

To enable the feature, you need to select the **Enable Timecode Break Scan** checkbox in the VTR tab within Tools | Options of VTR Ingest. Once selected, two additional buttons will appear on the clip record interface of VTR Ingest.

Button	Function
	Find and ingest segments in tape according to timecode breaks.
	Find, ingest segments in tape and assign keywords according to timecode breaks.

1. Insert a tape into the VTR and click the **Timecode Break Scan** button .
2. You can choose to scan for timecode changes from the beginning of the tape or you can choose to start the scan from the current position of the tape. VTR Ingest will rewind the tape if you choose to scan from the beginning.
3. VTR Ingest will insert mark in and mark out points around timecode changes, and the clip is then automatically added to the segment list.
4. If you want to assign keywords to each captured clip, you can click the **Keyword Scan** button  at the beginning of the operation. VTR Ingest will run the operation from step 2 to step 3 above, and add keywords to each clip in the segment list.
5. When all clips have been logged, VTR Ingest will then ingest all clips in the batch list at the end of the operation.

**NOTE:** You can also choose not to ingest segments automatically by deselecting the **Automatically start recording after Timecode Break Scan** checkbox within Tools | Options of VTR Ingest.

Do not save the EDL in .ale or .edl format, as the internal “control track” to properly locate broken timecodes could be lost and may result in standard VTR confusion when dealing with timecode direction. Save the EDL as .vlg type only.

## Importing an EDL

You can also import an Edit Decision List (EDL) to use as your segment (batch) list. Supported EDL formats are .ale, .edl, .vlg, and .xml. Clip names in the imported file cannot be longer than 32 characters.

1. Choose **File | Import EDL**.
2. In the Open window, navigate to the correct folder, select the EDL to import, and click **Open**.
3. Enter the Tape ID and select where to record the clips and click **OK**.

The EDL appears in the segment (batch) list for the selected channel and is ready to record:

4. Click Record to record your clips to the media server.

If you have a clip that failed to record for some reason, you can change its status back to Ready by highlighting the clip, right-clicking and selecting **Mark Ready**.

Importing an EDL will clear any existing segments in a VTR’s segment list.

## Exporting an EDL

Instead of recording your clips to a media server, you can export them as an EDL file, which can be used by other programs. By default, EDLs are saved in a .vlg format.

1. Highlight the file or group of files you want to export.
2. Choose **File | Export EDL**.
3. Navigate to the folder where you want to export the EDL.
4. Enter a name for the file and click **Save**.

The EDLs can also be opened using Aurora Edit’s batch (segment) capture feature.



# Chapter **10**

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## ***Using Aurora Ingest - RMI***

This section contains the following topics:

- *Overview of RMI*
- *Using Aurora Ingest - RMI*

## Overview of RMI

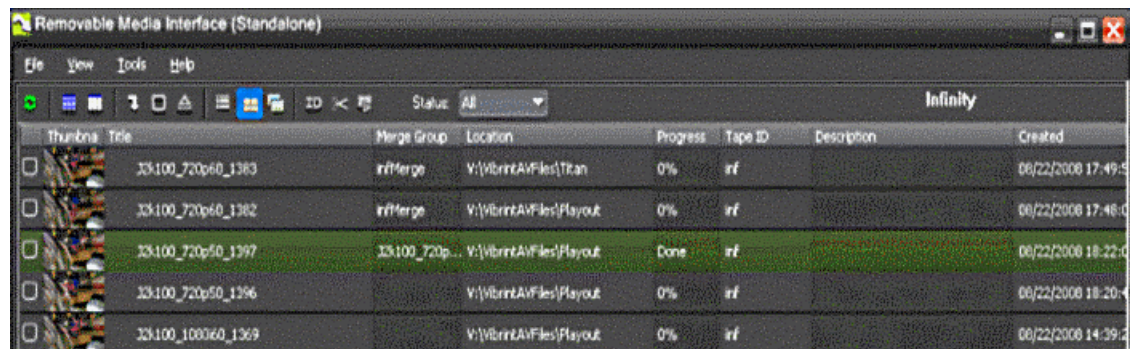
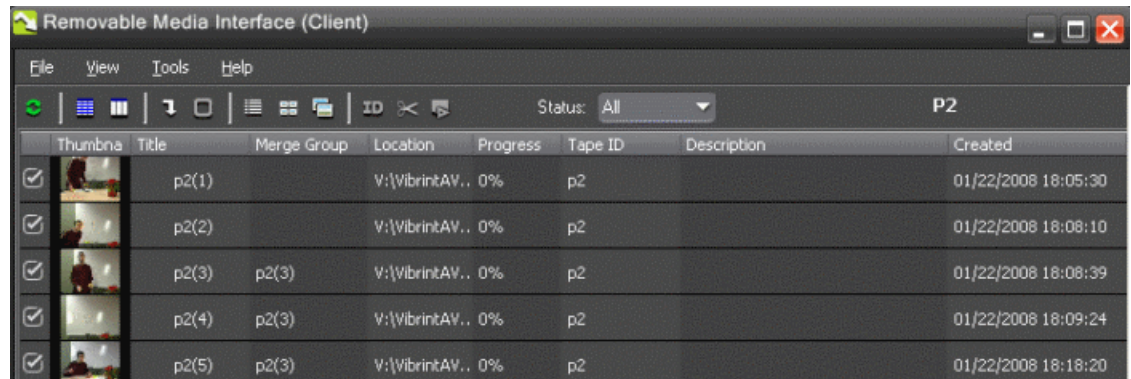
Aurora Ingest - RMI is an application that lets you simultaneously ingest files from multiple removable media devices such as Infinity, Panasonic P2 and Sony XDCAM.

You can choose whether to run a Standalone RMI or RMI client during the installation. The Standalone RMI does not need Aurora Ingest Server in order to import files from removable media devices. Only a local database is required, to ensure that the Standalone RMI can recognize previously imported clips and disks. The Standalone RMI can also be configured with SDB Server, XMOS Server and MediaFrame Server.

RMI allows you to preview, trim, import and record footages from those removable media devices into the NewsShare DSM (Database System Manager) or directly into K2 Summit. RMI that imports directly into K2 Summit can either be saved into shared Summit storage or into a single standalone Summit. RMI cannot be setup to import to a combination of shared and standalone Summits or a combination of multiple standalone Summits.

With RMI, you can preview proxy clips from Sony XDCAM material before import. As part of the supported XDCAM series, RMI also supports Sony EX media import.

If MediaFrame is already configured within your ingest operation system, you can add, edit and apply metadata to clips imported via RMI. The metadata that had been entered will be searchable within the MediaFrame database.






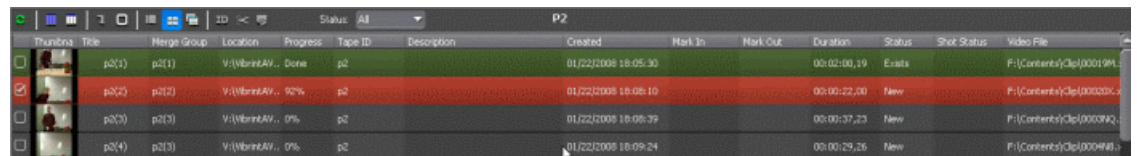
## Using Aurora Ingest - RMI

After you have configured RMI setting and attached the removable media device, RMI is ready for use.

1. Verify that the removable media device is plugged in and media is attached or inserted.
2. Select **Programs | Grass Valley | Aurora | RMI**.
3. Enter the Tape ID when the dialog box is displayed on screen.

The detachable media option (Rev, P2, XD) is seen automatically.

4. To select clips that you want to ingest, check the box next to each of those clips.
5. You can also modify properties, rename, trim and merge clips into groups via the right-click menu before importing them.
6. Click the Start  button to begin the ingest operation.



Thumbnail	Title	Merge Group	Location	Progress	Tape ID	Description	Created	Mark In	Mark Out	Duration	Status	Shot Status	Video File
	p0(1)	p0(1)	V:\VbrnAV...	Done	p2		01/22/2008 18:05:30			00:00:01,19	Exists		F:\Content\Clip\0001991
	p0(2)	p0(2)	V:\VbrnAV...	50%	p2		01/22/2008 18:06:10			00:00:22,00	New		F:\Content\Clip\0002000
	p0(3)	p0(3)	V:\VbrnAV...	0%	p2		01/22/2008 18:06:39			00:00:37,23	New		F:\Content\Clip\0003000
	p0(4)	p0(3)	V:\VbrnAV...	0%	p2		01/22/2008 18:09:24			00:00:29,26	New		F:\Content\Clip\0004000

While the transfer is proceeding, the clip information has a red background, and the percentage of the transferred media is displayed. Once the clip has been transferred, the clip information has a green background.

RMI recognizes good-shot marks. Select “Marked” from the Status drop-down list to see only those good shots. The screenshot below shows the Status drop-down list from the Panasonic P2 removable media device:



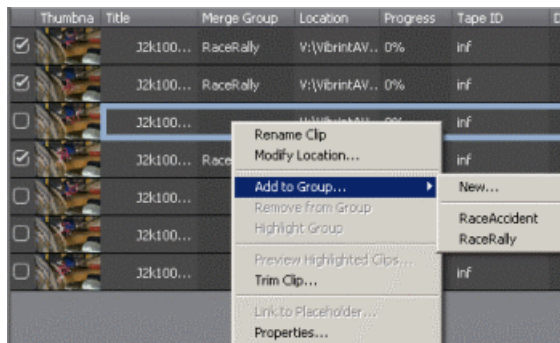
For XDCAM, RMI recognizes good-shot and bad-shot marks. Select from the drop-down list as shown below to choose a particular status for your view.



## Adding clips to groups

If needed, you can create groups and add clips into a group before importing in RMI. This allows operators to create a number of groups of clips, name them, and then import them into the system without having to stand by and repeat multiple merge imports separately. Trimmed clips can also be merged into a group and the edited marks will still be preserved.

1. Select a clip or multiple clips that you want to merge into a group.
2. Right-click and select **Add to Group**. You can create a new group name or use existing group names.



3. Enter the group name if you choose to create a new group.

The group name that you selected will appear in the Merge Group column of that clip. Then, the group name will become the name of the imported clip once in the system.


You can also remove clips from the group by selecting **Remove from Group** in the right-click menu. The **Highlight Group** option will go ahead and select all clips that have the same group name.

## Previewing clips

When multiple clips are selected within the RMI import list, the operator now has the option to Preview Clips. This allows users to easily select, deselect and decide what to import from the list.

1. Verify that the removable media device is plugged in and media is attached or inserted.
2. Select **Programs | Grass Valley | Aurora | RMI**.
3. Enter the Tape ID when the dialog box is displayed on screen.

The detachable media option (Rev, P2, XD) is seen automatically.


4. To preview clips, select multiple clips and click the  **Preview Clips** button.
5. The Preview window is launched and you can preview clips by clicking control buttons on the window.

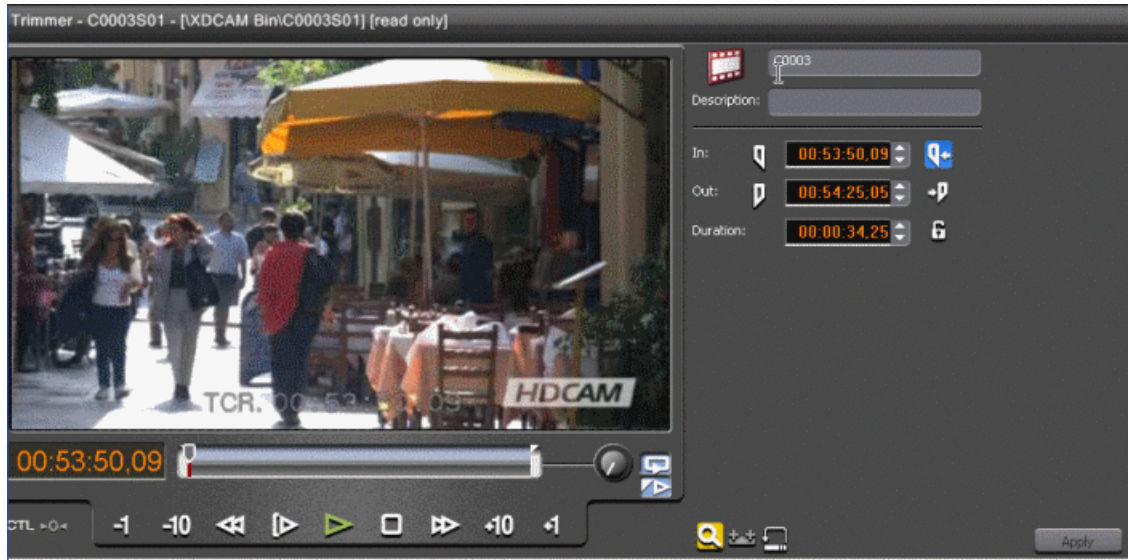


***NOTE: This feature is only for multiple clips preview. When playing through clips, the RMI import list will display the currently playing clip in blue. Therefore, users can easily select what to import on the RMI list. Trimming is not supported when multiple clips are loaded for preview.***

## Previewing and trimming a clip

Once clips have been loaded into the list view of RMI, users will be able to select clips and open them for preview. If an individual clip is selected, users can also trim the clip before import.

1. To preview and trim a clip, right-click on the particular clip and select **Trim Clip**. Or you can also highlight the clip and select the  **View Trimmer** button.
2. The Trimmer window is launched and you can preview the clip by clicking control buttons on the window.



3. As you are previewing the clip, you can click the **Mark In** and **Mark Out** buttons at specific points to trim the clip.

You can see the new duration of the trimmed clip in the duration column.

4. Click the **Apply** button to commit the trimming.

Once the clip is trimmed, you can see a scissor icon next to the clip title within the list view of RMI. The duration column on the list view will show the new duration of the trimmed clip.

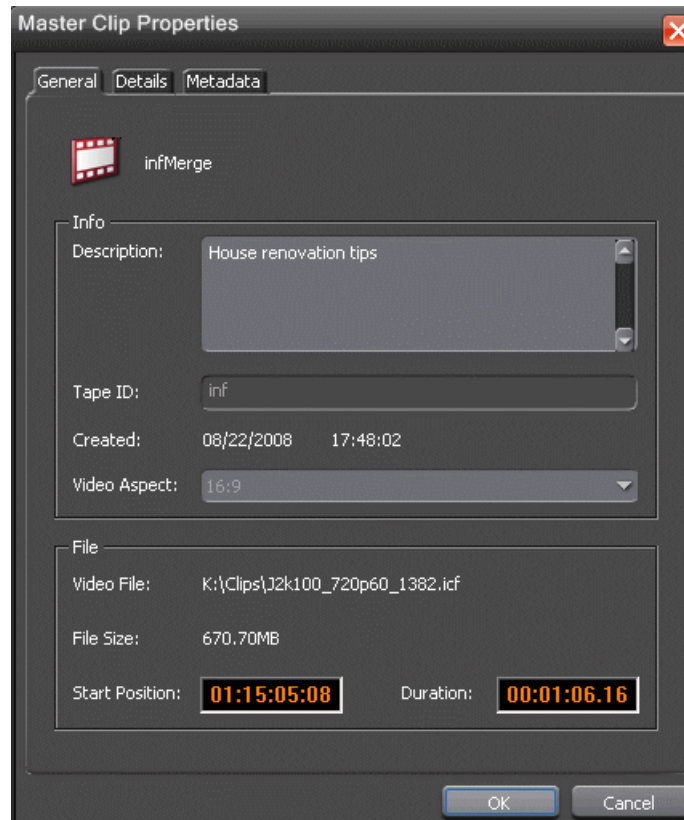
**NOTE:** *Trimming is only supported with individual clips.*

If the clip is loaded again into the Trimmer window, it will load with those trimmed mark in and mark out points. However, ejecting or reinserting the disk will erase those mark points.

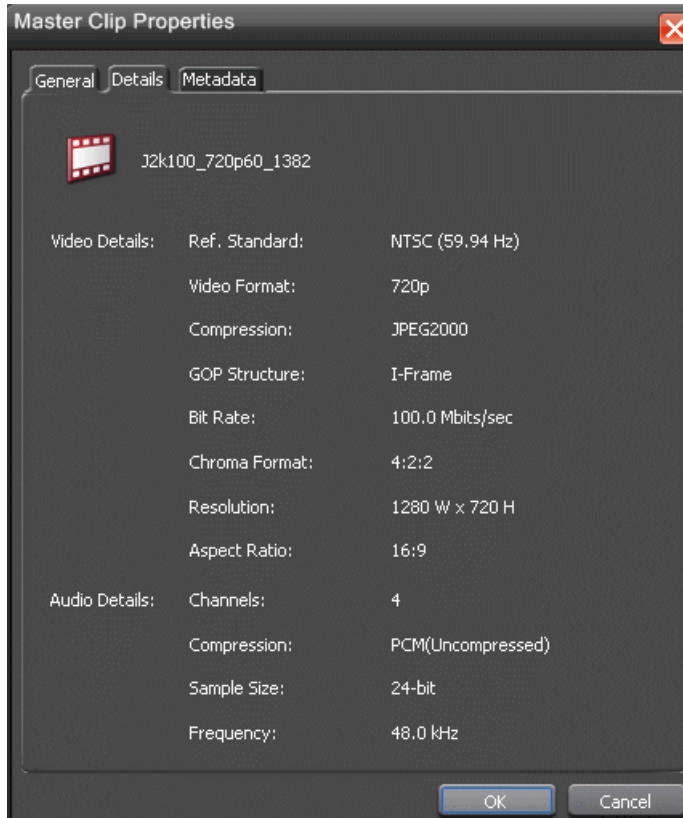
## Editing clip properties and metadata

With MediaFrame integration, you can apply, add and edit metadata of clips within the RMI application.

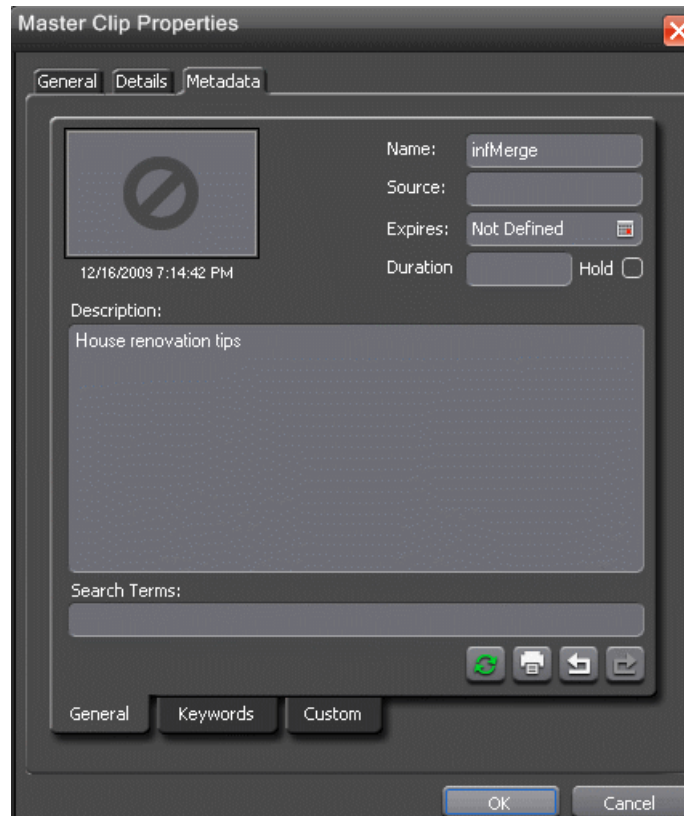
1. Select a clip from the RMI list view, right-click on the clip and select **Properties**.
2. The Master Clip Properties dialog box is displayed. You can add or edit description of the clip in the General tab within the dialog box.



3. In the Details tab, you can view Video and Audio details of the clip.




4. If you have MediaFrame configured within your system, you will have the Metadata tab in the Master Clip Properties dialog box. Once committed into the MediaFrame database, the entered metadata will be searchable within MediaFrame clients.



You can also enter keywords within Keywords tab, which referenced a specific timecode location in the media file. This is done by selecting mark-in/out points on the clip and inserting a keyword for that segment.

Within the Custom tab, you can enter additional asset metadata such as the name of editor, videographer, location and any metadata for other fields that had been listed. If you have the Administrator privileges, you can add, edit, or delete custom fields.

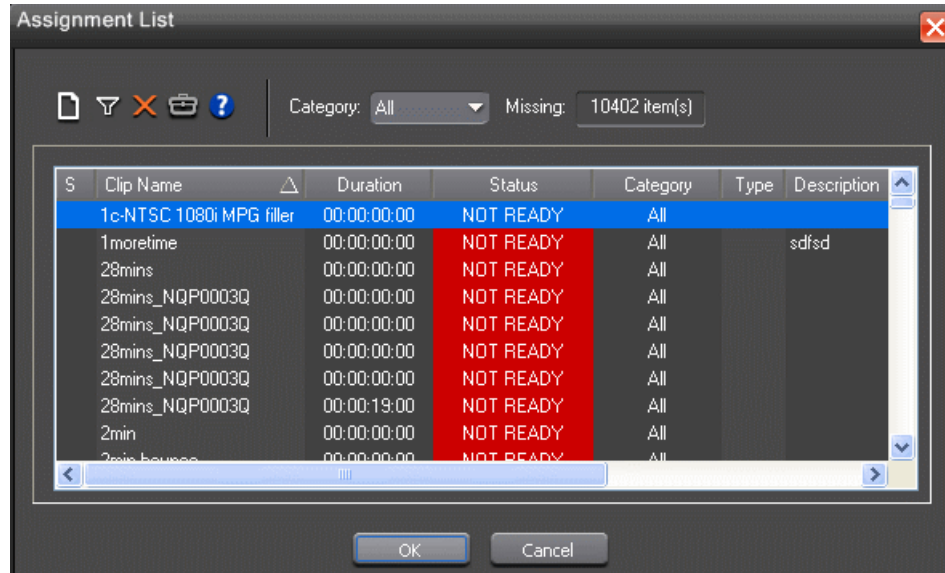
5. The Metadata tab is also accessible via the Trimmer window. You can click the **Add Metadata**  button within the Trimmer window to launch the Metadata tab, and add metadata directly for the clip.


## Linking clips to Aurora Playout placeholders

Prior to import, you can link clips in RMI to Aurora Playout placeholders. To enable the feature, ensure that you are connected to SDB Server if you are using the RMI Standalone, or your Aurora Ingest Server is connected to SDB Server if you are using the RMI Client.

1. In RMI, select a clip in the list view.
2. Right-click on the clip and select **Link to Placeholder**.

The Assignment List Manager will be displayed.




3. Select a placeholder and click **OK**.
4. Import the clip by clicking the  button on the RMI application.

The imported clip is now associated with the Aurora Playout placeholder.

### Caching proxy assets

For high-resolution material from Sony XDCAM, proxy assets will be the the only valid media that can be played and trimmed within the RMI application. Proxy assets get cached to a shared directory, therefore proxies imported on one system will be available for other users as well.

1. Within the XDCAM list view, select the **Cache All Proxies**  button.

The caching progress can be seen within the list view of RMI.

2. Once cached, there will be a yellow triangle indicator at the top right of the clip's thumbnail view.





The screenshot shows a software interface window titled "XDCAM". At the top, there is a toolbar with various icons and a "Status: All" dropdown menu. Below the toolbar is a table with the following columns: "Thumbnail", "Title", "Merge Group", "Location", "Progress", "Tape ID", "Description", "Created", "Mark In", "Mark Out", and "Duration". The table contains five rows of data, each with a checkmark in the "Thumbnail" column.

Thumbnail	Title	Merge Group	Location	Progress	Tape ID	Description	Created	Mark In	Mark Out	Duration
<input checked="" type="checkbox"/>	xidcam(1)		V:\WbrinAV...	0%	xidcam		01/10/2007 21:10:10			00:00:20,20
<input checked="" type="checkbox"/>	xidcam(2)		V:\WbrinAV...	0%	xidcam		01/10/2007 21:10:40			00:00:23,01
<input checked="" type="checkbox"/>	xidcam(3)		V:\WbrinAV...	0%	xidcam		01/10/2007 21:11:12			00:00:15,27
<input checked="" type="checkbox"/>	xidcam(4)		V:\WbrinAV...	0%	xidcam		01/10/2007 21:11:42			00:00:18,10
<input checked="" type="checkbox"/>	Intervie...		V:\WbrinAV...	0%	xidcam		01/10/2007 21:12:27			00:00:21,14

3. You can then preview and trim the proxy assets before import.



# Chapter **11**

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## ***Linking Clips To Aurora Playout Placeholders***

This section contains the following topics:

- [\*Linking clips to Aurora Playout placeholders\*](#)
- [\*Linking Clips\*](#)
- [\*Creating New Placeholders\*](#)

## Linking clips to Aurora Payout placeholders



If you are using Aurora Payout for playback, you can link clips you record with Aurora Ingest to placeholders in Aurora Payout.

You can link clips within VTR Ingest, Scheduler and RMI using the Assignment List Manager. In VTR Ingest, you can link a placeholder to any of the individual clips in the batch list. In RMI, you can link a placeholder to any individual clips prior to import.

In Scheduler, you can link the placeholder to the entire feed, and you can also trim the top and tail of the feed via Asset Viewer. You can link to Aurora Payout placeholders for scheduled feeds, but not for recurring feed recordings.

## Linking Clips

Prior to ingesting, you can link clips to Aurora Payout placeholders.

1. In VTR Ingest, mark an In and Out point to create a clip; in Scheduler, select your feed source.
2. For VTR Ingest, click the **Assignment List Manager**  button on the left pane of the VTR Ingest user interface; for Scheduler, click the **Assignment List Manager**  button in the Add Event window.

The Assignment List Manager opens.

3. Select a placeholder to link to and click **OK**.


The placeholder name and description filled in to replace previous information of the clip.

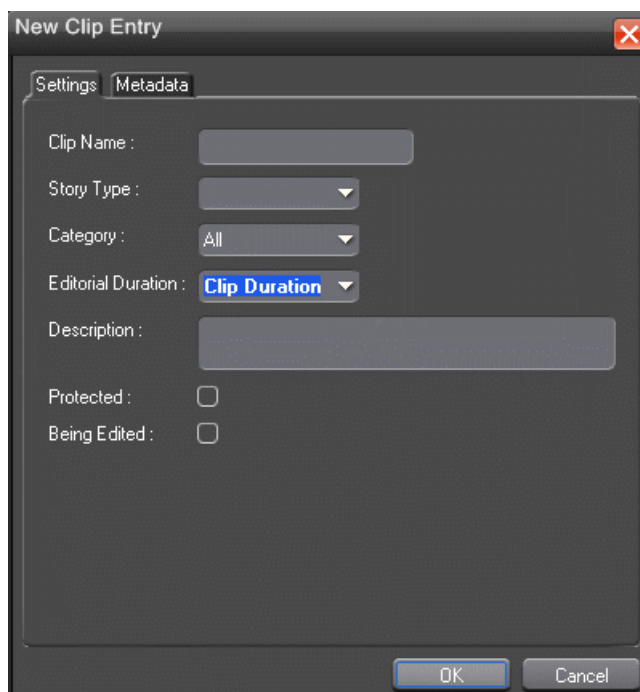
4. In VTR Ingest, click the **Add Clip to Batch List**  button; in Scheduler, click the **Record**  button.

The ingested clip or feed is now associated with the Aurora Payout placeholder.

## Creating New Placeholders

If you need to, you can create additional placeholders for clips you want to link to Aurora Payout.

1. In the Assignment List Manager, click the **New clip** button .



The New Clip Entry window appears.

2. Enter the clip information:

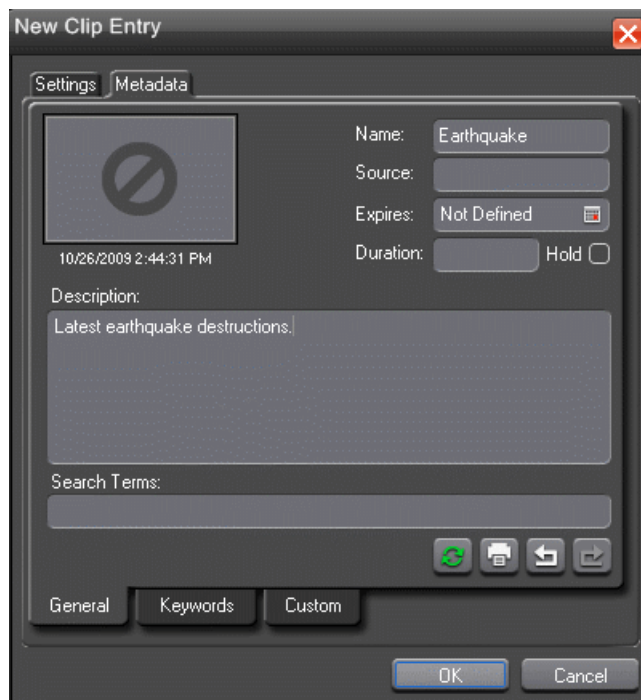
- **Name** — Enter a name for the placeholder. The name identifies the placeholder in your Assignment List Manager, the Assignment List (plug-in on the ENPS system), and the Aurora Payout playlist.
- **Description** — Enter a description for the placeholder to help identify the clip you need to create.
- **Category** — Select a category from the drop-down menu. The category determines who receives the placeholder as an assignment. Selecting **ALL** makes the placeholder accessible to all editors who select **ALL** in their Assignment List Manager.
- **Editorial Duration** — If desired, enter an estimated duration for the story or select one from the drop-down list. The editor can also enter an editorial duration that is less than the clip length, which is sent back to the NCS for show timing.
- **Protected** — Check this box to prevent the clip from being deleted from the database.
- **Being Edited** — Check this box to show that the clip for a placeholder is being edited. This field allows editors to easily see that a clip is already being worked on in another edit room.

3. If you already configured MediaFrame for use with Aurora Payout, you can enter metadata for the placeholder in the Metadata tab.

- **Name** — The name of the clip will be the same as the one that you entered in the Settings tab.
- **Source** — Enter the source of the clip.
- **Expires** — Select the expiry date for the placeholder. If no expiry date is needed, you can leave it as the default setting: Not Defined.
- **Description** — The description will be the same as the one that you entered in the Settings tab.
- **Search Terms** — Enter the search term for the clip so that it will be easy to find when you search for it using MediaFrame Search component later.

You can also enter metadata within Keywords tab, which referenced a specific timecode location in the media file. This is done by selecting mark-in/out points on the clip and inserting a keyword for that segment.

Within the Custom tab, you can enter additional asset metadata such as editor, videographer, location and any other fields that had been listed. If you have the Administrator privileges, you can add, edit, or delete custom metadata fields.



4. Click **OK**.

The Clip ID and Date are automatically set when you create the placeholder.

# Appendix **A**

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## ***Aurora Ingest Appendix***

This section contains the following topics:








- [\*Aurora Ingest keyboard shortcuts\*](#)
- [\*Aurora Ingest error messages\*](#)

## Aurora Ingest keyboard shortcuts

This table lists all of the keyboard functions that control Aurora Ingest, including key combinations using the Control keys.

Icon	Key	Name	Function
	F12	Record	Starts recording the clips in the segment list or the feed from the router source.
	Ctrl + Q	Eject	Ejects tape from tape deck.
	W	Play	Plays the tape or feed.
	E	Rewind	Rewinds the tape or feed.
	R	Fast Forward	Fast Forwards the tape or feed.
	I	Mark In	Marks an In point.
	Ctrl + I	Go to Mark In	Moves to the Mark In point.
	O	Mark Out	Marks an Out point.
	Ctrl + O	Go to Mark Out	Moves to the Mark Out point.
	P	Clear Mark In	Clears the In point.



Icon	Key	Name	Function
	[	Clear Mark Out	Clears the Out point.
	A	Back 1 Frame	Moves cursor one frame back on the Timeline.
	S	Forward 1 Frame	Moves cursor one frame forward on the Timeline.
	D	Back 10 Frames	Moves cursor 10 frames back on the Timeline.
	F	Forward 10 Frames	Moves cursor 10 frames forward on the Timeline.
	C	Add Clip to Segment List	Adds marked clip to segment list.
	Space Bar	Stop	Toggles between recording and stopping recording.

## Aurora Ingest error messages

The following table describes Aurora Ingest error messages.

Error Message	Description
No available channel at the time of record	Could not allocate channel for recording. Please make sure that AppCenter is running and channel is set to AMPRecorder.
Could not switch router	Could not switch router. Please make sure that the destination is not locked and router is running.
Could not switch timecode mode	Could not switch timecode mode.
Could not cue the clip	Could not cue the clip. Please make sure that channel is set to AMPRecorder, not AMPPlayer.

<b>Error Message</b>	<b>Description</b>
Clip already exists at this location	Clip already exists at this location. Please use a different name.
Could not start record	Could not start record. Please make sure your media server is running and responding.
Could not stop record	Could not stop record. Please make sure your media server is running and responding.
The server storage is full	The server storage is full. Please clean up the server storage.
Could not eject clip	Could not eject clip. Please make sure your media server is running and responding.
Event may not start record as it conflicts with another allocated event	Event did not/may not start record as it conflicts with another allocated event.
Could not control CompuSat for recording	Could not control CompuSat for recording. Please ensure that you have the correct CompuSat configuration.
Aurora Ingest Server could not complete record due to system shutdown	Aurora Ingest Server could not complete record due to system shutdown. Please restart the system in order to resume.
A user has canceled this Ingest event	A user has cancelled the Ingest event.
This event was prematurely stopped by the media server	The event was prematurely stopped by the media server. Please check your storage status.
This event may not have started and/or stopped at correct timecode	The event may not have started and/or stopped at correct timecode.

## **Software Licenses**

This section contains the following topics:

- *cmemdc*
- *cping*
- *CSizingToolBar*
- *CTextProgressCtrl*
- *MIT*
- *mozilla*
- *Paintlib*
- *resizeable lib*
- *tconvert*
- *zlib*

## **cmemdc**

### **License**

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CMemDC - memory DC

/Author: Keith Rule

Email: keithr@europa.com

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### **History**

10/3/97 Fixed scrolling bug. Added print support. - KR

11/3/99 Fixed most common complaint. Added background color fill. - KR

11/3/99 Added support for mapping modes other than MM\_TEXT as suggested by Lee Sang Hun. - KR

02/11/02 Added support for CScrollView as supplied by Gary Kirkham. - KR

This class implements a memory Device Context which allows flicker free drawing.

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## CSizingToolBar

### License

CSizingControlBar Version 2.43

Created: Jan 24, 1998 Last Modified: August 03, 2000

See the official site at [www.datamekanix.com](http://www.datamekanix.com) for documentation and the latest news.

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Send bug reports, bug fixes, enhancements, requests, flames, etc. to [cristi@datamekanix.com](mailto:cristi@datamekanix.com) or post them at the message board at the site.

The sources and a short version of the docs are also available at [www.codeproject.com](http://www.codeproject.com). Look for a "Docking Windows" section and check the version to be sure you get the latest one ;)

Hint: These classes are intended to be used as base classes. Do not simply add your code to these file - instead create a new class derived from one of CSizingControlBarXX classes and put there what you need. See CMyBar classes in the demo projects for examples.

Modify this file only to fix bugs, and don't forget to send me a copy.

Acknowledgements:

- Thanks to Harlan R. Seymour for his continuous support during development of this code.
- Thanks to Dundas Software for the opportunity to test this code on real-life applications.
- Some ideas for the gripper came from the CToolBarEx flat toolbar by Joerg Koenig. Thanks, Joerg!
- Thanks to Robert Wolpow for the code on which CDockContext based diagonal resizing is based.
- Thanks to the following people for various bug fixes and/or enhancements: Chris Maunder, Jakawan Ratiwanich, Udo Schaefer, Anatoly Ivasyuk, Peter Hauptmann.
- And, of course, many thanks to all of you who used this code, for the invaluable feedback I received.

## CTextProgressCtrl

### License

Written by Chris Maunder (chrismaunder@codeguru.com)

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Modified : 26/05/98 Jeremy Davis, jmd@jvf.co.uk

Added colour routines

TextProgressCtrl is a drop-in replacement for the standard CProgressCtrl that displays text in a progress control.

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Chris Maunder is the original author.

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#### **Zlib**

zlib.h -- interface of the 'zlib' general purpose compression library version 1.2.2, October 3rd, 2004

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The data format used by the zlib library is described by RFCs (Request for Comments) 1950 to 1952 in the files <http://www.ietf.org/rfc/rfc1950.txt> (zlib format), [rfc1951.txt](http://www.ietf.org/rfc/rfc1951.txt) (deflate format) and [rfc1952.txt](http://www.ietf.org/rfc/rfc1952.txt) (gzip format).

---

# Glossary

## **ASK**

The central registry for all the MediaFrame components. Other software components refer to the ASK component to establish communication and exchange commands and data as well as populate fields and lists.

## **Asset**

See Logical Asset and Physical Asset.

## **Asset Details**

The MediaFrame view that contains detailed information about the assets, including all the associated metadata and storyboard and video proxy information.

## **Asset List**

The MediaFrame view that lists all the assets in a search or a folder.

## **Asset Navigator**

The MediaFrame view that is used for searching logical assets or browsing for physical assets.

## **Device**

In Aurora Browse, a term used to designate a component that contains physical asset. Devices have MDIs that represent the device's assets in a way that is understandable by the other components of the system. This allows the MediaFrame server to coordinate the activity of the system. Different devices perform different functions in the MediaFrame system. For example, the K2 MDI device is used for transferring assets, while the News MDI is used for Aurora Edit assets and the Flashnet (SGL) MDI is used for archiving assets.

## **Essence**

See Physical asset.

## **FTP**

File Transfer Protocol is a common IT protocol for the bulk movement or transfer of large volumes of data. K2 servers can handle multiple FTP transfers simultaneously at faster than real-time speeds.

## **HD**

High Definition video.

**Logical Asset**

A logical asset is a combination of the MediaFrame database information, physical asset or assets on the server, and proxy assets. A logical asset has a globally unique Universal resource Name (URN) that uniquely identifies it.

**Material**

A high-resolution clip, upon which the low-resolution proxy is based.

**MDI**

Managed Device Interface.

**MediaFrame**

A metadata storage and asset management architecture deployed in the Aurora suite. This architecture shares media asset management (MAM) components with other applications and systems such as servers, Aurora Ingest, and Aurora Edit workstations.

**MediaFrame Status**

A tool in Aurora Browse that tracks the status of the various components of Aurora Browse.

**Metadata**

Data about data. For example, metadata can include keywords, descriptions, and other terms that you would use to search for an asset in a database. Foreign metadata is imported XML metadata that is associated with a MediaFrame logical asset.

**Offline**

In Aurora Browse, offline refers to an asset that has been archived. An asset can be both offline and online simultaneously.

**Online**

In Aurora Browse, online refers to an asset that is located on the high-resolution server. An asset can be both offline and online simultaneously.

**Physical Asset**

A physical asset, or essence, is the raw program material, represented by pictures, sound, text video, etc. It carries the actual message or information.

**Proxy**

A low-resolution clip that represents high-resolution material.

**SD**

Standard Definition video.

**Storyboard**

A series of video thumbnails used to show scene changes in an asset.

**Storyboard proxy**

The low-resolution video clip that provides the thumbnails for the storyboard.

**Subclip**

A clip created by referencing a portion of media from another clip.

**Thumbnail**

A frame of video used for visual identification of a clip. By default, the thumbnail is generated in the K2 server from the 16th frame of video. You can select a new thumbnail using the Storyboard.

**Thumbnail view**

The MediaFrame view that shows the Asset List information with thumbnails instead of strictly textual information.

**Transfer Monitor**

A tool in Aurora Browse that monitors asset transfers.

**Up Conversion**

Conversion of an SD (standard definition) video format to an HD ((high definition) video format.



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