Enterprise Call Recorder
Multi-User Call Recording Installation and Setup

INSTALLATION GUIDE
Version 2.1.0

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Table of Contents

1   Pre-Installation Considerations

The Enterprise Call Recorder (ECR) can be used with differing hardware layouts to best match the requirements of each installation. The software installation flow depends on which layout is chosen. This section describes the considerations to be taken into account before software installation begins.

1.1   Choose a Hardware Layout

The Software Installation procedure will vary depending on the hardware layout chosen. The ECR supports two types of hardware layout: Centralized Layout, based on the ECR Shelf System; and Distributed Layout, based on the AuxBox. The diagram below illustrates the differences in the two configurations and how they can be combined.
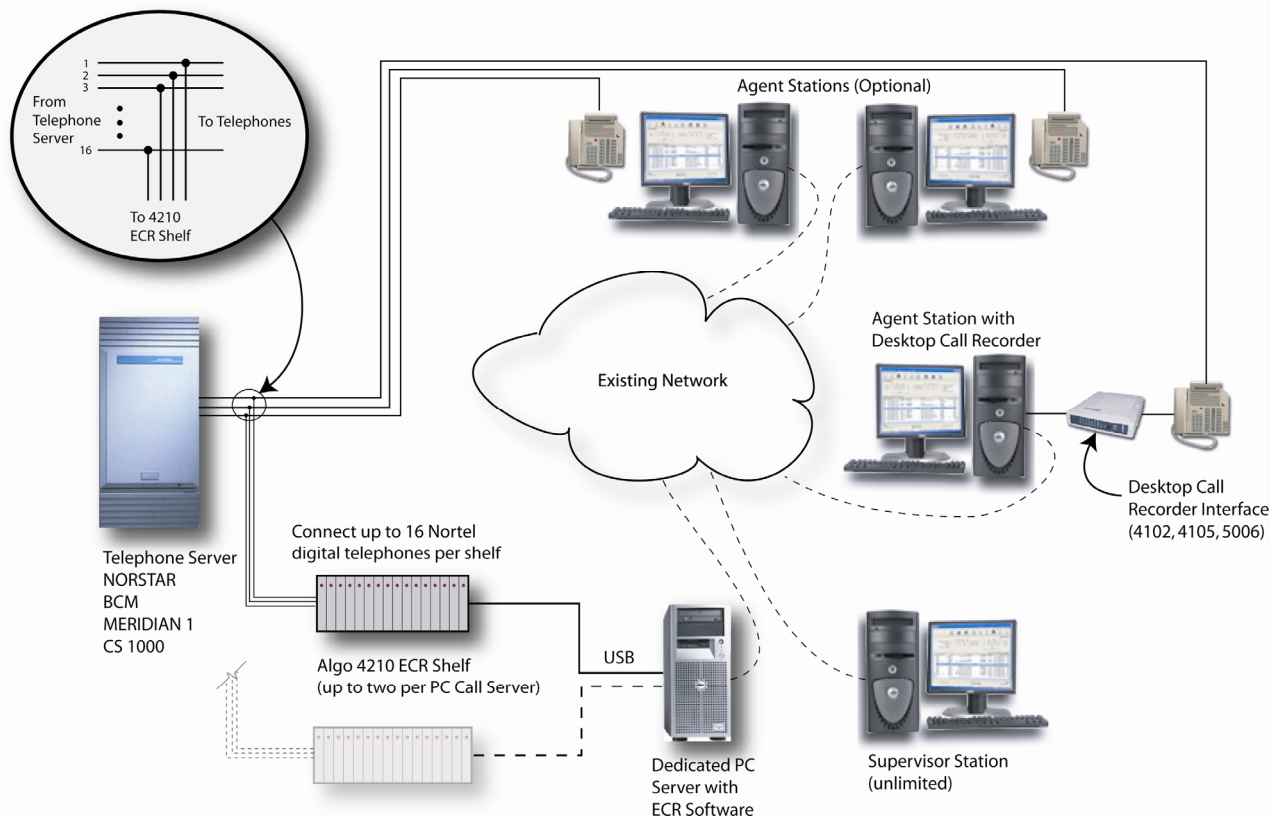
1.2   Choose a PC to be the ECR Server

Independent of layout, each ECR installation must have one PC designated the ECR Server.

Algo recommends that this PC be **dedicated** to the task of call recording and that no other CPU intensive software be installed. The nature of real-time call recording requires continuous access to CPU and memory resources to encode all audio streams instantaneously. Limited access to these resources could result in lost call information beyond the ability of the ECR to recover.

The ECR Server PC must meet the following **minimum** hardware requirements. These are the minimum specifications required to ensure a stable and robust call recording system. It is recommended that mission critical call recording installations consider the addition of backup hardware like RAID drives and DVD burners to ensure that no call information is lost in the event of hardware failures.

By definition, the robustness of the ECR is limited by the quality of the hardware and operating system it is running on. Please consult with Algo if you have any concerns regarding hardware or software compatibility that may conflict with the ECR.

For up to 16 Station call recording, the ECR Server PC must meet the following hardware specification:

CPU:	Pentium 4 at 3.0GHz with HyperThreading
MEMORY:	512MB RAM
I/O:	USB port
	CD-ROM Drive
OS:	Windows® XP Pro
	Windows® Server 2003
Optional:	Sound Card (Required to playback audio)

For 17-32 User systems using the ECR Shelf System (4102R Digital AuxCard), Algo recommends a dual processor computer meeting the following specifications:

CPU:	Dual Xenon at 3.2 GHz
MEMORY:	1 GB RAM
I/O:	USB port
	CD-ROM Drive
OS:	Windows® XP Pro
	Windows® 2003 Small Business Server
Optional:	Sound Card (Required to playback audio)

1.3   Choose Client PCs for Disturbed Layout or Operator Access

Client PC installations are required on any PC with an attached AuxBox (in Distributed Layouts) and PCs where Operator or Supervisor access to the ECR is desired. Client PCs must be able to connect to the ECR Server over the network, and must meet the follow minimum hardware requirements:

CPU:	Pentium 3 at 450MHz
MEMORY:	256MB RAM
I/O:	CD-ROM Drive
OS:	Windows® 2000
	Windows® XP Home
	Windows® XP Pro
Optional:	Sound Card (Required to playback call audio)
	USB port (Required to attach AuxBox recorder)

2   Centralized Installation Instructions

2.1   Connect Hardware to ECR Server

Connect the Algo recording hardware to the ECR Server PC. Consult the Installation Guide included with the recording hardware for connection instructions.

2.2   Install ECR Software on Server PC

1. Place the ECR Installation CD in the CD-ROM drive of the PC chosen to be the ECR Server to begin installation. The installation wizard will start automatically; if it does not, navigate to the CD-ROM drive and run **ECR_Install_V2_1_0.exe.**

2. InstallShield will automatically check for Windows® Media Encoder. If Windows® Media Encoder is detected, InstallShield will go directly to the Installation Package screen. If Windows® Media Encoder is not detected, it will be automatically installed.

3. **Enterprise Call Recorder Installation Type:** Choose <u>Server Installation</u> when prompted to select installation type.
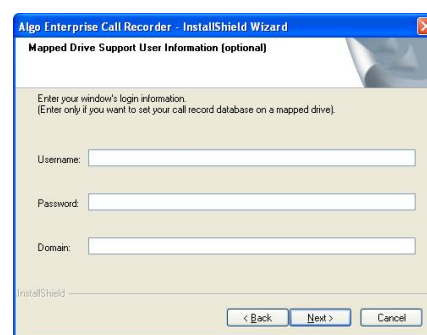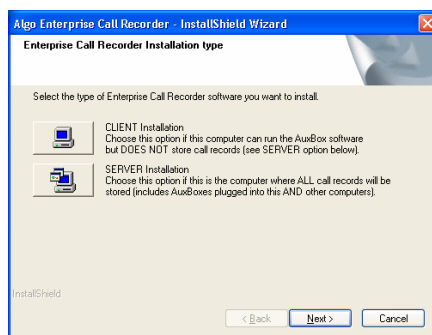
4. **Mapped Drive Support User Information (Optional):** If desired, fill in the Username, Password and Domain fields to grant the ECR access to a network drive for call data storage. This information is only needed for network (mapped) drive access. Skip this step if calls are to be stored locally on the Server PC.

5. **Program Files Directory:** Select the directory where the ECR program files are to be stored. The Program Files Directory must be located on the local machine. A network drive can not be selected to store the programs.

6. **Data Files Directory:** Select the call storage directory when prompted. All call records from all Stations will be stored in sub-directories within the selected folder. The User Information from the previous step must be correct to select a network drive.

7. Restart the computer when prompted.

8. **Note on Firewalls:** When the ECR runs the first time, your firewall may prompt you to allow the ECR components access to the network. Allow access to any of the following when prompted:

- ECCR_Admin.exe
- ECCR_Agent.exe
- ECCR_Server.exe
- ECCR_M2250Recorder.exe
- ECCR_4102Recorder.exe
- ECCR_4105Recorder.exe
- ECCR_5006Recorder.exe
- ECCR_Config.exe
- ECCR_ECV.exe
- ECCR_ESV.exe

Firewalls can block communication between the ECR Server PC and Client PCs resulting in lost call data. The firewall included with Windows® XP Pro SP2 is enabled by default. Disabling the Windows® firewall is another option, but should only be done in secure environments.

9. The Windows® name of the Server PC is required during the Client installation on remote PCs. Have the Windows® name on hand when installing the Client software for quick installation.

The Windows® name can be found in the Control Panels -> System -> Computer Name Tab. The value listed in the 'Full Computer Name:' section contains the Windows® computer name. Note the trailing period, if one is populated, is not part of the computer name.

2.3 License Key Entry

1. Launch the ECR Configuration Tool from the desktop icon.

Default administrator login is:
Username: admin
Password: admin

2. The New Installation window will pop up after logging in. Click **<Yes>** to begin configuration.
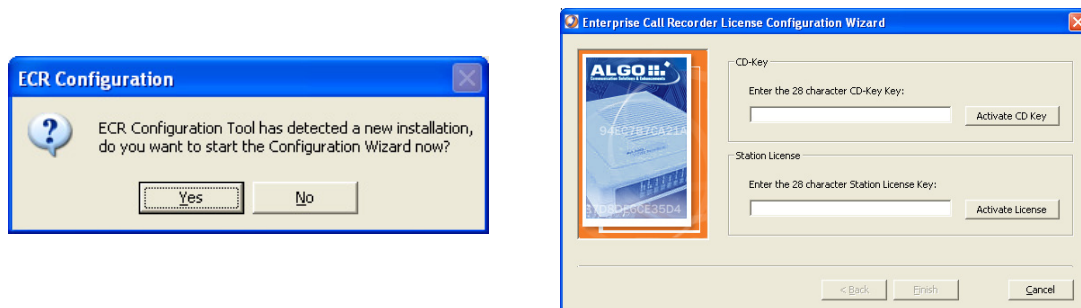
3. Enter the CD-Key and Station License Key when prompted. The Keys can be found in the envelope included with your installation CD. The License Key entry screen can also be accessed from "**Tools -> License Management -> Add License Key**" menu.

2.4   Telephone Station Configuration

1. The Station Wizard starts automatically after entering the License Keys. The Station Wizard will step through the Station creation process. A "Station" in the ECR is defined as a telephone with an attached recording device. This is used to allow the software to identify and communicate with the hardware; a later section describes configuration of user accounts which allows various user to interact with the software. The Station Wizard can also be accessed from the icon in the ECR Configuration Tool window.

2. Read the instructions on each screen and click **<Next>** to proceed. When prompted to 'Shutdown Recording System', click **<Yes>**.

3. Select the first AuxBox or AuxCard to be configured from the list.

   Note: The AuxCard order in the window does not correspond to the AuxCard order in the shelf. Correlating the listed serial number with an AuxCard or AuxBox can be done a number ways:

   a. Selecting an entry will flash the lights on the corresponding AuxCard or AuxBox. (Firmware version 1.32 or greater is required for this feature)

   b. The back page of the user guide supplied with the ECR Shelf system contains all card positions and corresponding serial numbers

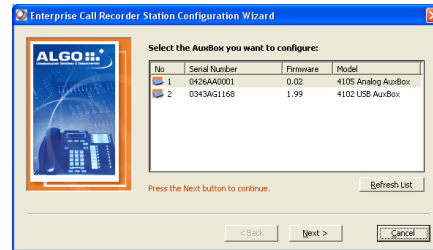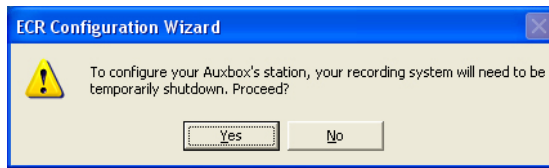   c. The AuxBox serial number is recorded on the bottom of the unit

4. Upgrade selected AuxBox firmware. **There is no need to upgrade the firmware if the current version already meets the requirements of the ECR:**

   Note: All new AuxBoxes and AuxCards ship with the latest firmware.
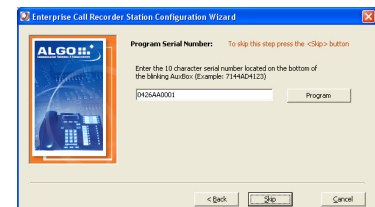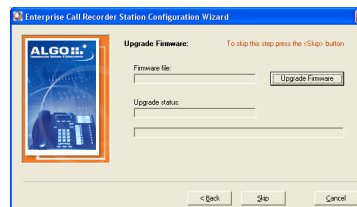
Model	Minimum required firmware version
4102 Digital AuxBox	1.34
4102R Digital AuxCard	1.34
4105 Analog AuxBox	1.14
5006 Centrex AuxBox	1.14

5. If the serial number is not correctly populated, enter the serial number and click **<Program>**. The serial number should populate automatically so this step can generally be skipped.

6. Assign a name to the Station. Common names are the extension ("Ext 105", "10240") or the phone attendant name ("Greg's Desk", "Reception"). Click **<Create Station>** to complete the process.

   To configure more stations, click **<Configure More Stations>**; otherwise click **<Finish>** to close the Station Wizard.

7. Repeat the instructions in Steps 3-6 for each recording device connected to the ECR Server PC.

2.5   User Account Creation

1. This section can be skipped completely if the ECR System only requires the 'admin' login to operate the ECR.

   User accounts are required for Operators and Supervisors who will access the ECR. Each user account can be granted specific privileges (i.e. the ability to playback call records, but not delete them) unique to that account. Access can also be restricted to specific Stations (e.g. Operators can be granted access only to their own specific telephones, but not Supervisor telephones).

   User's unique privileges and station access needs to be determined by the end users or the administrator of the ECR system.

2. Launch the **<User Wizard>** in the ECR Configuration Tool interface. Click **<Start>** to begin the Wizard.

3. Enter the username and password of the User to be configured. The password is case insensitive. Click **<Create user account>** when completed.

4. Select the privileges to be granted to this User. Click **<Select All>** to quickly grant all privileges allowing this User full administrator access.

5. Select which Stations this User will be able to access. Click **<Select All>** to quickly access all Stations in the ECR system.

6. Click **<Configure more user accounts>** to continue adding Users to the system. Otherwise click **<Finish>** to complete User configuration.
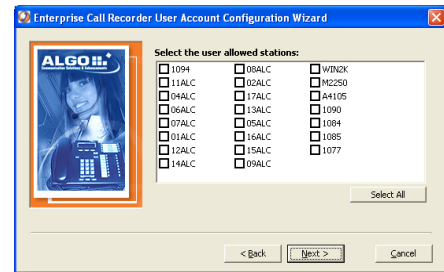
2.6   Install ECR Software on Client PCs

Access to the ECR from networked PCs is provided by the Client installation. Users can access the ECR through the interfaces provided by the Client installation. Windows® network access to the ECR Server PC is required to access the system.

If the ECR is to be accessed directly from the Server PC only, no Client installations are required and this step can be skipped.

1. Place the ECR Installation CD in the CD-ROM drive of the PC to begin installation. The installation wizard will start automatically; if it does not, navigate to the CD-ROM drive and run **ECR_Install_V2_1_0.exe.**

2. InstallShield will automatically check for Windows® Media Encoder. If Windows® Media Encoder is detected, InstallShield will go directly to the Installation Package screen. If Windows® Media Encoder is not detected, it will automatically be installed.

3. **Enterprise Call Recorder Installation Type:** Choose <u>**Client Installation**</u> when prompted to select installation type.

4. **Server Name:** Enter the Windows® name of the Server PC when prompted. To find the Server PC computer name, see Section 2.2.

5. **Program Files Directory:** Select the directory where the ECR program files are to be stored. The Program Files Directory must be located on the local machine. A network drive can not be selected to store the programs.

6. Restart the computer when prompted.

7. **Note on Firewalls:** When the ECR runs the first time, your firewall may prompt you to allow the ECR components access to the network. Allow access to any of the following when prompted:

   - ECCR_Admin.exe
   - ECCR_Agent.exe
   - ECCR_Server.exe
   - ECCR_M2250Recorder.exe
   - ECCR_4102Recorder.exe
   - ECCR_4105Recorder.exe
   - ECCR_5006Recorder.exe
   - ECCR_Config.exe
   - ECCR_ECV.exe
   - ECCR_ESV.exe

   Firewalls can block communication between the ECR Server PC and Client PCs resulting in lost call data. The firewall included with Windows® XP Pro SP2 is enabled by default. Disabling the Windows® firewall is another option, but should only be done in secure environments.

2.7 Test and Secure ECR System

The ECR System should be tested and secured once configuration is completed. Call records contain sensitive information that need to be secured properly to ensure privacy and limit liability. Please follow the following instructions to verify the ECR System is fully functional and secured.

1. **Change the admin password.** Via the ECR Configuration Tool, right click on the User 'admin' in the Users list in the main window. Select **<Change Password>** and enter the new password.

   The 'admin' user has full access to all ECR features. Changing this password is essential to restrict unauthorized access to ECR. Ensure that the new password is not lost otherwise software reinstall and configuration will be required.

2. **Confirm all recorders are operational.** Test each AuxBox or AuxCard by going off-hook on each connected telephone. Verify the telephone status (Ring, or Call in Progress), is reported in the ECR Supervisor Viewer. Listen to a sample recorded call to confirm audio is clear and of high quality.

3. **Verify Client access to the ECR System.** Access the ECR System by viewing a Station via the Supervisor or Station Viewer from the Client PC. Next, listen to a test call on the Client PC to confirm audio is clear and of high quality.

4. **Important Security Notice.** The ECR cannot restrict access to the call storage directories directly via Windows® interfaces. Specific security policies should be enforced on the ECR Server PC to ensure no unauthorized access to call storage directories.

3 Distributed Installation Instructions

3.1 Install ECR Software on Server PC

1. Place the ECR Installation CD in the CD-ROM drive of the PC chosen to be the ECR Server to begin installation. The installation wizard will start automatically; if it does not, navigate to the CD-ROM drive and run **ECR_Install_V2_1_0.exe.**

2. InstallShield will automatically check for Windows® Media Encoder. If Windows® Media Encoder is detected, InstallShield will go directly to the Installation Package screen. If Windows® Media Encoder is not detected, it will be automatically installed.

3. **Enterprise Call Recorder Installation Type:** Choose <u>Server Installation</u> when prompted to select installation type.

4. **User Information (Optional):** If desired, fill in the Username, Password and Domain fields to grant the ECR access to a network drive for call data storage. This information is only needed for network (mapped) drive access. Skip this step if calls are to be stored locally on the Server PC.

5. **Program Files Directory:** Select the directory where the ECR program files are to be stored. The Program Files Directory must be located on the local machine. A network drive can not be selected to store the programs.

6. **Data Files Directory:** Select the call storage directory when prompted. All call records from all Stations will be stored in sub-directories within the selected folder. The User Information from the previous step must be correct to select a network drive.

7. Restart the computer when prompted.

8. **Note on Firewalls:** When the ECR runs the first time, your firewall may prompt you to allow the ECR components access to the network. Allow access to any of the following when prompted:

   - ECCR_Admin.exe
   - ECCR_Agent.exe
   - ECCR_Server.exe
   - ECCR_M2250Recorder.exe
   - ECCR_4102Recorder.exe
   - ECCR_4105Recorder.exe
   - ECCR_5006Recorder.exe
   - ECCR_Config.exe
   - ECCR_ECV.exe
   - ECCR_ESV.exe

   Firewalls can block communication between the ECR Server PC and Client PCs resulting in lost call data. The firewall included with Windows® XP Pro SP2 is enabled by default. If possible, disable the Windows® firewall to avoid any possible conflicts with the ECR Software.

9. The Windows® name of the Server PC is required during the Client installation on remote PCs. Have the Windows® name on hand when installing the Client software for quick installation.

   The Windows® name can be found in the Control Panels -> System -> Computer Name Tab. The value listed in the 'Full Computer Name:' section contains the Windows® computer name. Note the trailing period, if one is populated, is not part of the computer name.

3.2 License Key Entry

1. Launch the ECR Configuration Tool from the desktop icon.

   Default administrator login is:
   Username: admin
   Password: admin

2. The New Installation window will pop up after logging in. Click **<Yes>** to begin configuration.

3. Enter the CD-Key and Station License Key when prompted. The Keys can be found in the envelope included with your installation CD. The License Key entry screen can also be accessed from "**Tools -> License Management -> Add License Key**" menu.
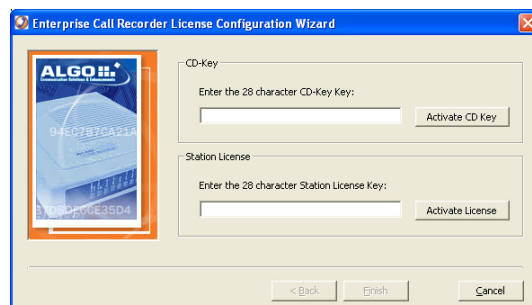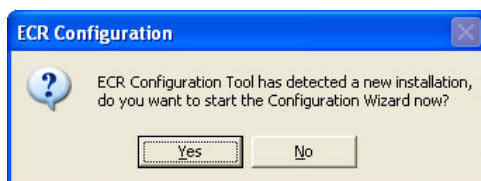
3.3   Install Hardware on Client PC

Connect the Algo recording hardware to a Client PC. Consult the Installation Guide included with the recording hardware for connection instructions.

3.4   Install ECR Software on Client PC

An ECR Client installation is required on every PC with an attached AuxBox recorder. The Client installation provides the recording software to transfer and store call data to the ECR Server. The Client installation also provides all the ECR interface programs to access the recording system. Windows® network access to the ECR Server PC is required to access the system.

1. Place the ECR Installation CD in the CD-ROM drive of the PC to begin installation. The installation wizard will start automatically; if it does not, navigate to the CD-ROM drive and run **ECR_Install_V2_1_0.exe.**

2. InstallShield will automatically check for Windows® Media Encoder. If Windows® Media Encoder is detected, InstallShield will go directly to the Installation Package screen. If Windows® Media Encoder is not detected, it will automatically be installed.

3. **Enterprise Call Recorder Installation Type:** Choose **Client Installation** when prompted to select installation type.

4. **Server Name:** Enter the Windows® name of the Server PC when prompted.

5. **Program Files Directory:** Select the directory where the ECR program files are to be stored. The Program Files Directory must be located on the local machine. A network drive can not be selected to store the programs.

6. Restart the computer when prompted.

7. **Note on Firewalls:** When the ECR runs the first time, your firewall may prompt you to allow the ECR components access to the network. Allow access to any of the following when prompted:

    - ECCR_Admin.exe
    - ECCR_Agent.exe
    - ECCR_Server.exe
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    - ECCR_4102Recorder.exe
    - ECCR_4105Recorder.exe
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    - ECCR_Config.exe
    - ECCR_ECV.exe
    - ECCR_ESV.exe

    Firewalls can block communication between the ECR Server PC and Client PCs resulting in lost call data. The firewall included with Windows® XP Pro SP2 is enabled by default. Disabling the Windows® firewall is another option, but should only be done in secure environments.

3.5 Telephone Station Configuration on Client PC

1. The Station Wizard starts automatically after entering the License Keys. The Station Wizard will step through the Station creation process. A "Station" in the ECR is defined as a telephone with an attached recording device. This is used to allow the software to identify and communicate with the hardware; a later section describes configuration of user accounts which allows various user to interact with the software. The Station Wizard can also be accessed from the icon in the ECR Configuration Tool window.

2. Read the instructions on each screen and click **<Next>** to proceed. When prompted to 'Shutdown Recording System', click **<Yes>**.
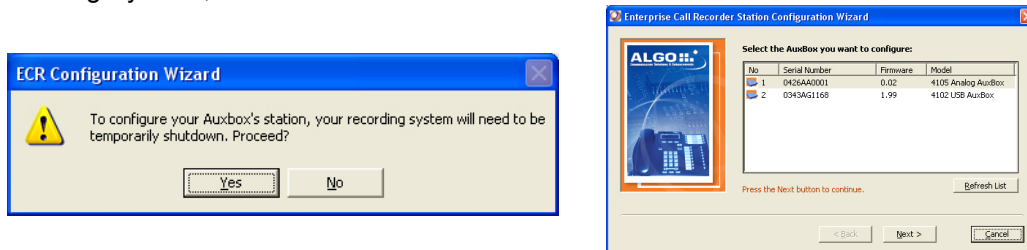
3. Select the first AuxBox to be configured from the list. Correlating the listed serial number with an AuxBox can be done by referencing the serial number at the bottom of the unit.

4. Upgrade selected AuxBox firmware. **There is no need to upgrade the firmware if the current version already meets the requirements of the ECR:**

Model	Minimum required firmware version
4102 Digital AuxBox	1.34
4105 Analog AuxBox	1.14
5006 Centrex AuxBox	1.14

Note: All new AuxBoxes ship with the latest firmware.
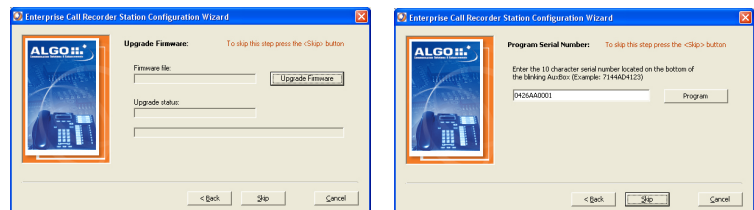
5. If the serial number is not correctly populated, enter the serial number and click **<Program>**. The serial number should populate automatically so this step can generally be skipped.

6. Assign a name to the Station. Common names are the extension ("Ext 105", "10240") or the phone attendant name ("Greg's Desk", "Reception"). Click **<Create Station>** to complete the process.

   To configure more stations, click **<Configure More Stations>**; otherwise click **<Finish>** to close the Station Wizard.
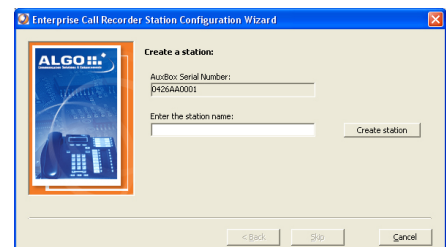
3.6 Repeat Steps 3.3-3.5 for each Client PC

Repeat the tasks detailed in Steps 3.3 through 3.5 for each PC with a connected AuxBox.

3.7   User Account Creation

1. This section can be skipped completely if the ECR System only requires the 'admin' login to operate the ECR.

    User accounts are required for Operators and Supervisors who will access the ECR. Each user account can be granted specific privileges (i.e. the ability to playback call records, but not delete them) unique to that account. Access can also be restricted to specific Stations (e.g. Operators can be granted access only to their own specific telephones, but not Supervisor telephones).

    User's unique privileges and station access needs to be determined by the end users or the administrator of the ECR system.

2. Launch the **<User Wizard>** in the ECR Configuration Tool interface. Click **<Start>** to begin the Wizard.

3. Enter the username and password of the User to be configured. Both the username and password are case insensitive. Click **<Create user account>** when completed.

4. Select the privileges to be granted to this User. Click **<Select All>** to quickly grant all privileges allowing this User full administrator access.
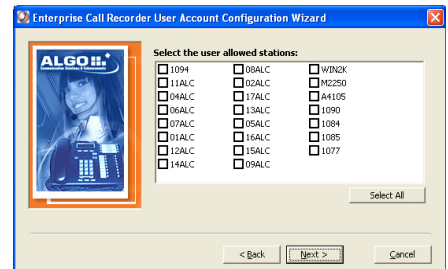
5. Select which Stations this User will be able to access. Click **<Select All>** to quickly access all Stations in the ECR system.

6. Click **<Configure more user accounts>** to continue adding Users to the system. Otherwise click **<Finish>** to complete User configuration.

3.8   Test and Secure ECR System

The ECR System should be tested and secured once configuration is completed. Call records contain sensitive information that need to be secured properly to ensure privacy and limit liability. Please follow the following instructions to verify the ECR System is fully functional and secured.

1. **Change the admin password.** Via the ECR Configuration Tool, right click on the User 'admin' in the Users list in the main window. Select **<Change Password>** and enter the new password.

   The 'admin' user has full access to all ECR features. Changing this password is essential to restrict unauthorized access to ECR. Ensure that the new password is not lost otherwise software reinstall and configuration will be required.

2. **Confirm all recorders are operational.** Test each AuxBox or AuxCard by going off-hook on each connected telephone. Verify the telephone status (Ring, or Call in Progress), is reported in the ECR Supervisor Viewer. Listen to a sample recorded call to confirm audio is clear and of high quality.

3. **Verify Client access to the ECR System.** Access the ECR System by viewing a Station via the Supervisor or Station Viewer from the Client PC. Next, listen to a test call on the Client PC to confirm audio is clear and of high quality.

4. **Important Security Notice.**   The ECR cannot restrict access to the call storage directories directly via Window® interfaces. Specific security policies should be enforced on the ECR Server PC to ensure no unauthorized access to call storage directories.

4 Upgrade Installation Instructions

Upgrading is made easy with version 2.1 of the ECR; the system configuration and call database are automatically imported from the previous installation of the software. Follow the instructions below to upgrade the ECR.

1. Run the ECR Installation from CD-ROM (or from upgrade downloaded from the Algo website) on the ECR Server PC. The upgrade process must be done first on with the Server PC, followed by the Client PCs.

    The installation program will run automatically from the CD when it is placed in the CD-ROM Drive.

2. The installation program will first ask to shutdown the ECR, select **Yes**.

3. The 2.1 Installation program will first prompt to uninstall the previous version of the ECR. Select **Yes** to process. Note **no** call records will be deleted in this process.

4. Once the un-installation is complete, rerun the 2.1 Installation program. Proceed with installation of new version as prompted.

5. Select **Yes** when prompted to import old configuration.
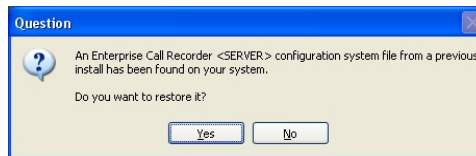
6. Re-start the Server PC when prompted.

7. Recorder firmware must be upgraded to take advantage of all ECR features. Note version 2.1.0 of the ECR offers a mass upgrade function to program all attached recorders. See Section 2 in the ECR User Guide for firmware upgrade instructions using the AuxBox Maintenance function.

8. Repeat Steps 2-7 for each Client installation if present.

9. Test the ECR system as specified in Section 3.8.

5   M2250 Console Configuration

The M2250 Attendant Console connects to the phone system via a pair of TN links. As a result, two Algo recording devices (4102 Digital AuxBox or 4102R Digital AuxCard) are required to capture both call audio and CallerID information from a M2250 console.   Please consult the Algo Application notes for wiring details.

Configuration of the recorder serial numbers is required for the ECR to recognize the dual recorder M2250 configuration. Note, only one Station License Key is required for a single M2250 station.

Run the **ECR Configuration Tool** on the PC with the AuxBox recorders attached. Run the AuxBox Maintenance utility from **Tools -> AuxBox Maintenance.**

Select the recorder connected to TN1 on the M2250 and append 'M2250A' to the serial number. Next select the recorder connected to TN2. Program this recorder with the same serial number as the TN1 recorder but appended 'M2250B'. The graphic above illustrates how the serial numbers should be formatted.

To create the station, select only the M2250A AuxBox in the Station Wizard. The second AuxBox is automatically paired to this Station. No further configuration of the second recorder is required.
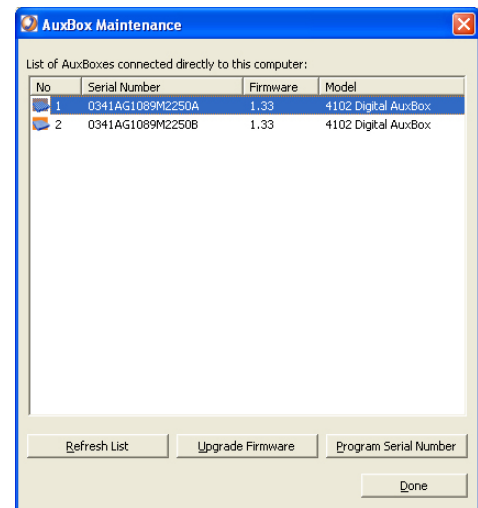
6   Contact Information

Algo Communication Products Ltd.
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Canada, V5J 5L2
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Sales:
Tel: 1.604.454.3790
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Email: sales@algosolutions.com

Canada / USA Support
Toll Free: 1.877.884.2546
Email: support@algosolutions.com

EMEA, CALA, APAC Support
Tel: 1.604.454.3792
Email: support@algosolutions.com

ECR Compatible Recording Devices from Algo

4102 Digital AuxBox

The 4102 Digital AuxBox connects to any Nortel M7000, T7000, M2000, or M3900 series digital telephone. The 4102 provides digital call recording via USB and two dry contact outputs for activation of Algo visual or audible alerting accessories.

4105 Analog AuxBox

The 4105 Analog AuxBox is ideal for home offices and small businesses requiring desktop call recording on an analog telephone. The 4105 provides digital call recording via USB. One output is available for activation of Algo visual or audible alerting accessories.

5006 Centrex AuxBox

The Centrex AuxBox connects to M5000 or M6000 series telephones. The 5006 provides digital call recording via USB and two dry contact outputs for activation of Algo visual or audible alerting accessories.

Enterprise Call Recorder (ECR) Shelf System

The 4210 Shelf and 4102R Digital AuxCard are designed for equipment or server room installations of the multi-user Enterprise Call Recorder software. Ideal for small call centers, the ECR Shelf System provides a robust and easy to integrate call recording solution for up to 32 telephones.