

SIGINT Systems

HARVESTER COMINT Suite

Version 2.0

Administrator's Manual

SIGINT Systems

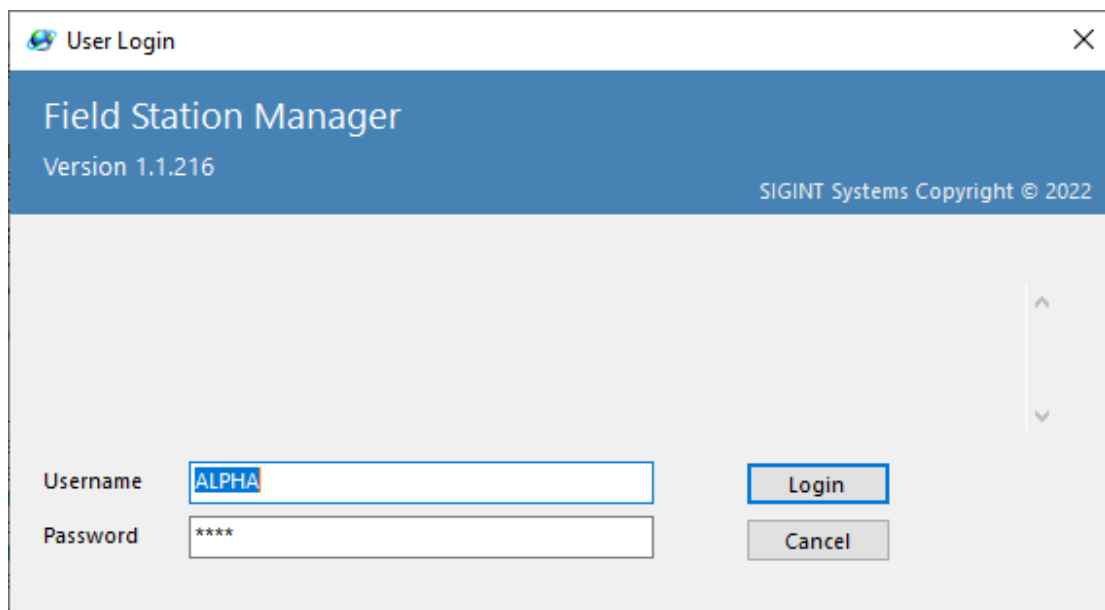
Signals Intelligence Collection Software



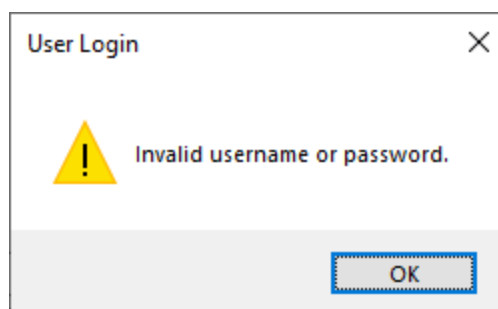
1. LOGGING INTO FIELD STATION MANAGER

When you run any of the HARVESTER COMINT Suite applications, you will first be presented with the standard login screen. The screen will display the name and version of the application being run. It may also display user security warnings and caveats. These notifications are maintained by your system administrator.

The screen will ask you to enter your username and password and once entered, you should click the Login button to proceed with the login process.



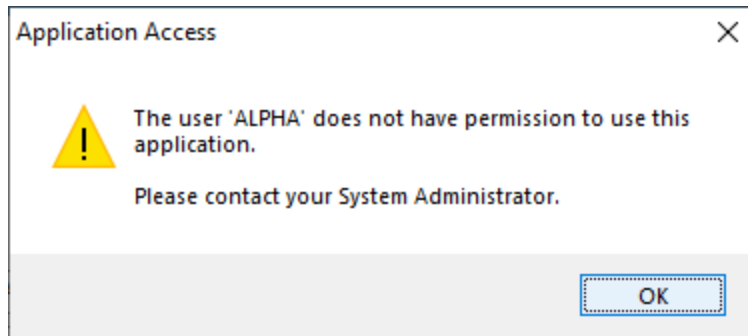
If both username and password are correct, the application will open as normal. However if either or both credentials cannot be authenticated, the following warning message will be displayed:



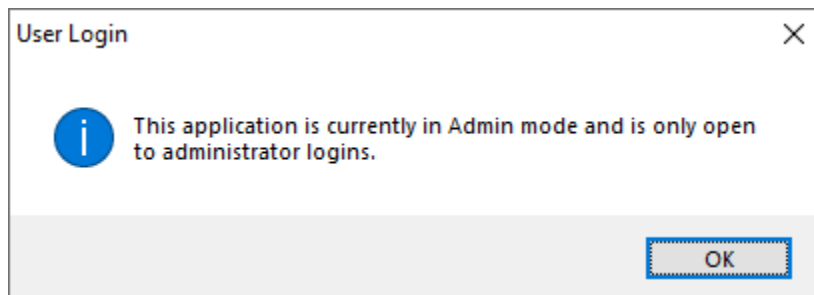
Ensure that both your username and password have been entered correctly and try logging in again. If you are still denied access, contact your system administrator.

If your credentials are correct and authenticated by the system but you do not have

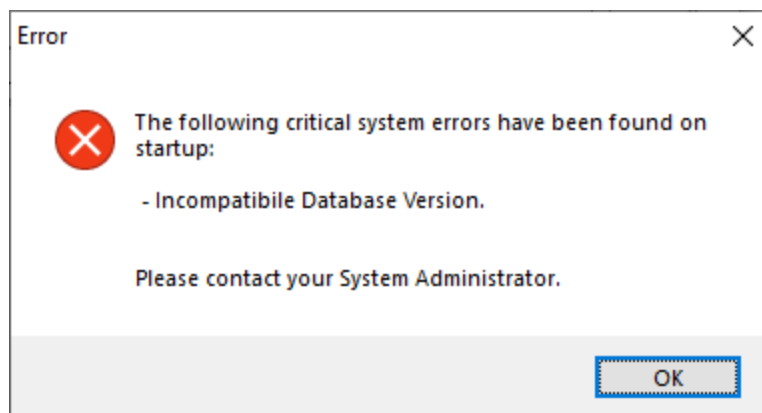
user permissions to run the application, then the login process will be halted and you will be presented with the following warning:



Applications may also be disabled by system administrators for maintenance or other operational reasons. If the application you are trying to log into has been disabled, you will see the following warning:

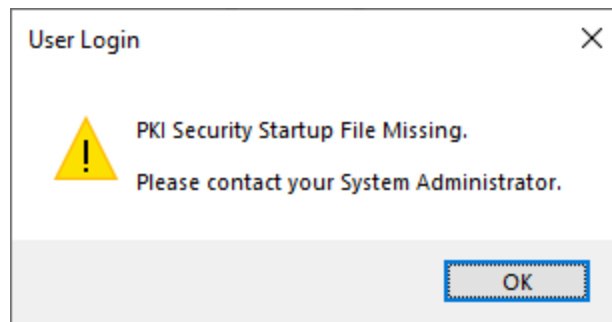


If the HARVESTER COMINT Suite database has recently been upgraded by a System Update and you have not yet deployed updated applications, logging into an application may result in the following warning being displayed:



Not all System Updates will require new versions of HARVESTER COMINT Suite applications to be deployed. Please refer to any System Update release notes to coordinate application deployment and avoid any impact on user access.

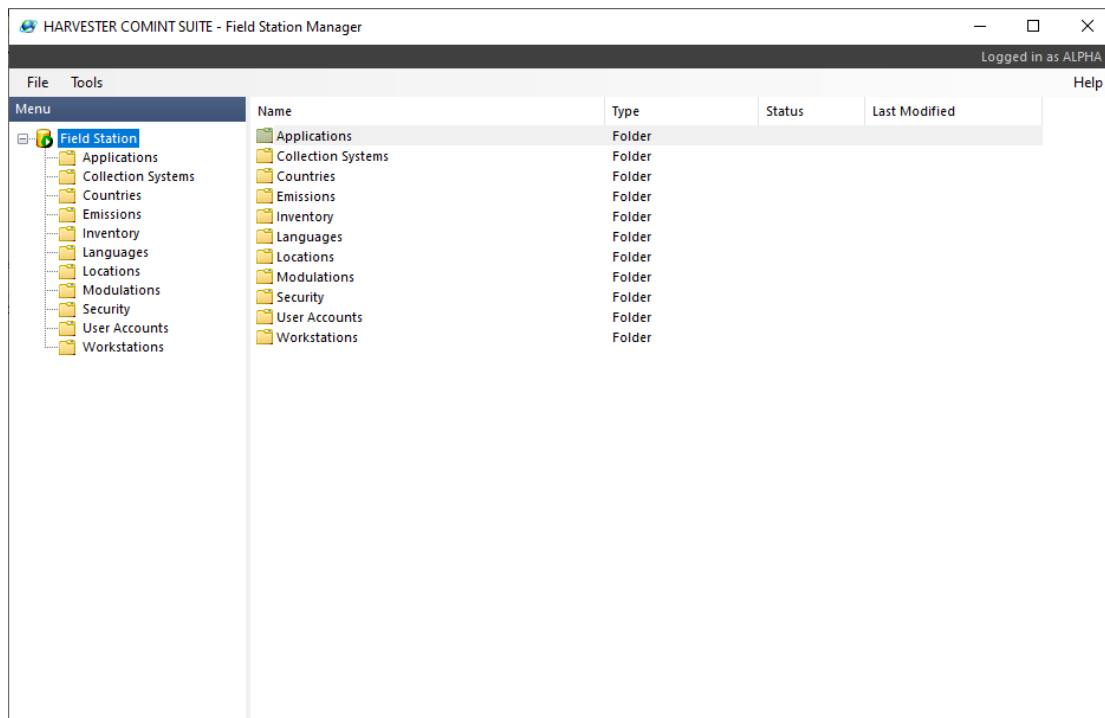
If the application is started and no PKI security file is present, then following warning message will be displayed. Contact your system administrator and request the *harvester.pki* file to be added to your local installation.



2. FIELD STATION MANAGER

Field Station Manager is a tool of managing and maintaining the inner workings of HARVESTER COMINT Suite. The application main window consists of ten individual sections covering all the operational areas of HARVESTER COMINT Suite. These include an inventory of equipment (antennas, receivers and other intercept equipment), user access and security, application security, maintenance of emissions and modulation systems, intercept locations and positions, frequency ranges and tools of the importing and exporting of system data, as well as the registering of workstations and loading of licence keys.

The main window is shown below and is split into a left hand navigation menu and a right hand information panel.



2.1 Setting up Field Station Manager

Once HARVESTER COMINT Suite has been installed, the database has been setup and the initial system data load has been completed, the next step is to set up a point of contact within Field Station Manager. This is essential for registering workstations but also provides a contact for notifying software and data updates.

From the File menu, click the Contact Details option to open the Contact Details window:

Contact Details [X]

General

Field Station Number: 381635

Installation ID: 0137f91e-a081-47ee-a1ec-783a659e47e5

Contact Name: [Empty]

Email Address: [Empty]

Organisation Name: [Empty]

Country: [Dropdown]

[OK] [Cancel]

NOTE: The mandatory fields on this window are Contact Name, Email Address and Country. These fields are required to create a fully functioning workstation registration file. We have dramatically reduced the requirements on customer data to an absolute minimum and only require this very limited set data to ensure good communications with our customers (we will only communicate with the contact name and email address specified here) and correctly generate your SIGAD. We are committed to the privacy and security of our customers and treat all customer data with extreme care. We never have, and never will share or sell customer data to advertisers, third parties or any private or commercial entity or organs of state.

2.2 Changing User Password

You can change your password at any time but selecting the Set New Password option from the Tools menu.

Set Password [X]

Current password: [Input Field]

New password: [Input Field]

Confirm password: [Input Field]

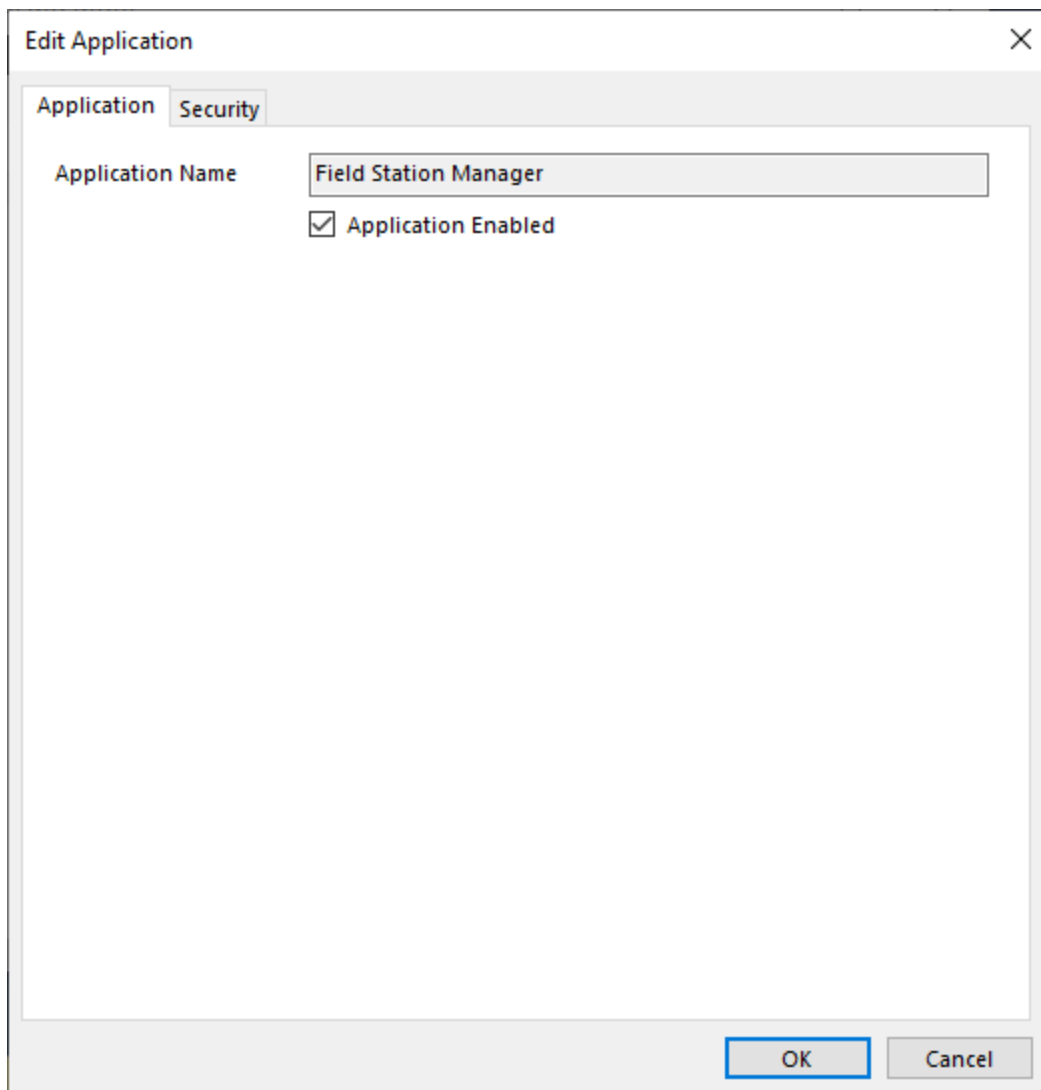
[OK] [Cancel]

Confirm your current password then enter and confirm your new password and click OK to set your new password.

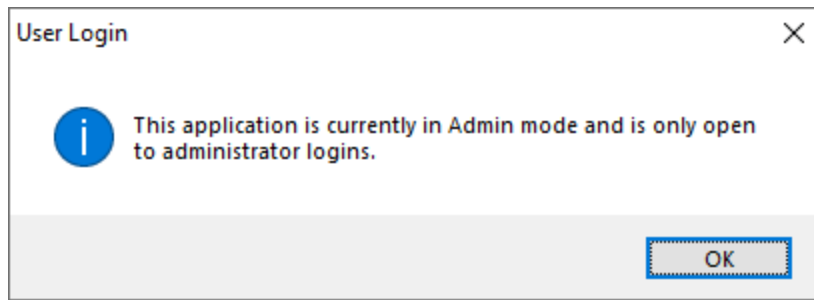
NOTE: Passwords must be a minimum length of 8 characters. Password history is enforced by default on user accounts therefore you will not be able to reuse a password.

2.3 Applications

Applications provides a list of all current applications that have connected to the HARVESTER COMINT Suite database. Entries are automatically added as each application connects. Double-click on the application name in the right panel to open the application properties window:



The application name field is defined by individual applications logging into the system and cannot be amended. The Application Enabled check box allows administrators to disable all user access to a particular application. Users attempting to login while an application is disabled will be presented with the following warning:



NOTE: Disabling an application only applies to future logins. Users already logged into the application can continue to work as normal but once they logout, they will not be able to login again unless the user account has administrator privileges.

2.3.1 Security

The Security tab provides administrators with the option to enabling the application security feature and adding on-screen operator security warnings to applications as well as defining application specific security warning messages that appears on the application's login screen.

2.3.1.1 Application Security (Professional Version Only)

Application Security provides the ability for administrators to define the minimum and maximum classification that any application is allowed to process. This feature integrates directly with operator security profiles to control access to both applications and the data held within each application. Application Security follows the model providing four security related settings:

- **Minimum Classification.** This is the minimum classification that any piece of information or data will have within the application. Generally, this is considered to be Unclassified.
- **Maximum Classification.** This is the maximum classification that any piece of information or data will hold within the application.
- **Compartment.** In collection environments where access to information from different collection systems and projects is required to be formally controlled, compartmentalization can be used to assign a specific compartment to an application.
- **Dissemination.** Dissemination allows the distribution of data and information to be defined at the application level.

Application Security is displayed as a security banner appearing at the top and bottom of the screen. By default, this option is disabled.

2.3.1.2 User Security Warning

In the User Security Warning box, you can defined the security message that appears in the application's login screen.

The image shows a screenshot of the 'Edit Application' dialog box, specifically the 'Security' tab. The dialog has a title bar with 'Edit Application' and a close button (X). Below the title bar are two tabs: 'Application' and 'Security'. The 'Security' tab is active. Inside the dialog, there is a checkbox labeled 'Enable Application Security'. Below this checkbox are four dropdown menus: 'Minimum Classification', 'Highest Classification', 'Compartment', and 'Dissemination'. Below these dropdowns is a section titled 'User Security Warning'. This section contains two text input fields: 'Title' and 'Caveat'. At the bottom right of the dialog are two buttons: 'OK' and 'Cancel'.

2.4 Collection Systems

Collection Systems provides a list of all collection systems currently attached to the system. The default collection system is HARVESTER which is a generic system that allows collection over the broadest spectrum.

2.5 Emissions

Emissions provides a list of all currently available Emission systems in the database. This list is composed of the default list of emissions provided with HARVESTER COMINT Suite and any new emissions that may have been created by users to meet local intercept requirements.

NOTE: New emission systems can only be added by registered workstations.

To create a new emission, right-click Emissions in the left hand menu and select Add New from the menu or right-click any emission in the right-hand panel and select New from the menu. This will open the Add Emission window.

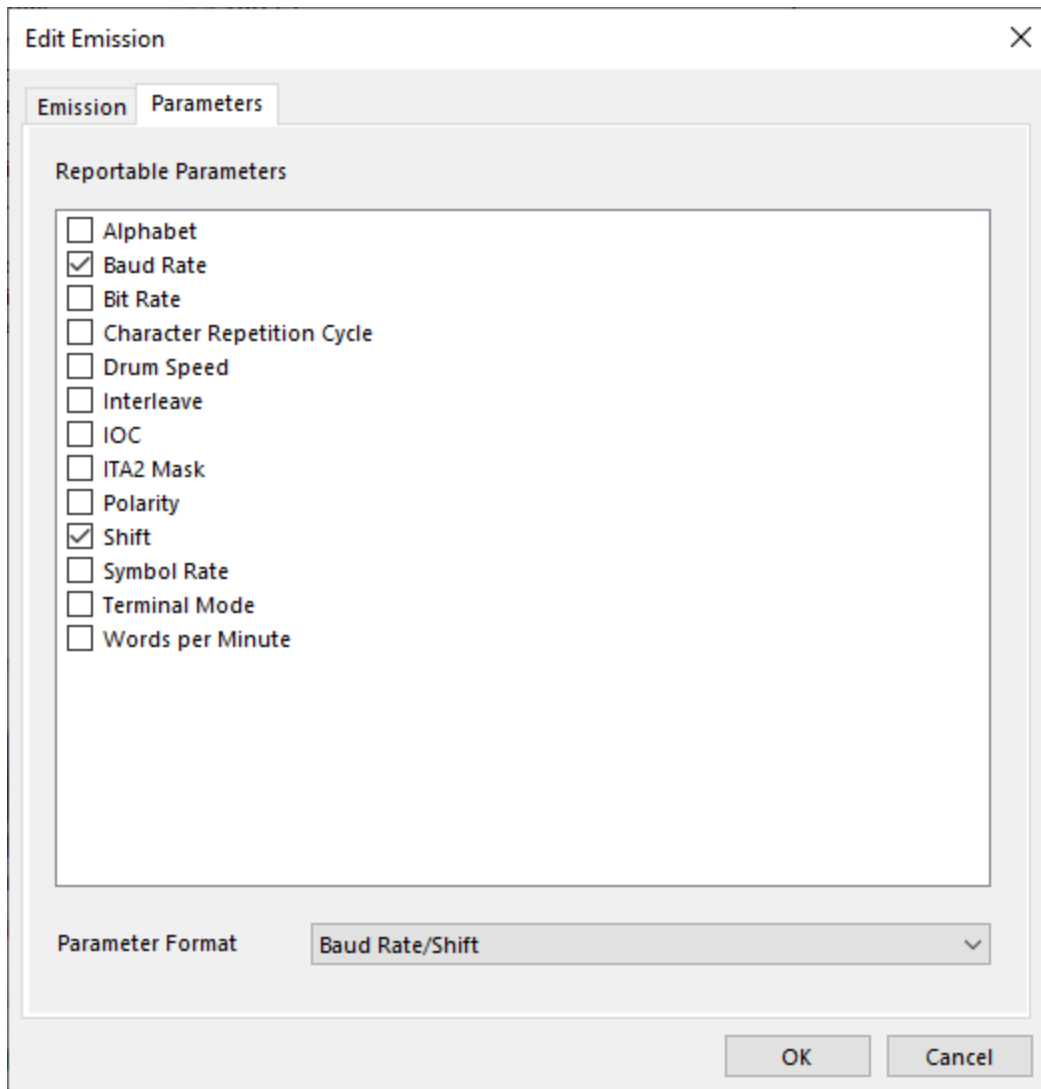
The screenshot shows a 'Create New Emission' dialog box with the following fields and controls:

- Emission Name:** A text input field.
- Aliases:** A text input field.
- Enabled:** A checked checkbox.
- Modulation System:** A dropdown menu currently set to 'Undefined'.
- Supported Channels:** A text input field containing the value '0'.
- Description:** A large text area for entering details.
- Buttons:** 'OK' and 'Cancel' buttons at the bottom right.

Enter the name of the new system and any known aliases. Check the Enabled checkbox to ensure that the emission appears in the emission dropdown list on the Add Emitter window. Select the modulation system used by the system – this is used by the system to set the receiver mode when automatic receiver tuning is enabled. If the new emission is a multiplexed system, enter the number of channels supported by the emission.

NOTE: The Emission Name of default emission systems supplied with HARVESTER COMINT Suite cannot be changed.

The Parameters tab provides a selectable list of reporting parameters that can be gathered by the parametric reports module in the Collection Operator Terminal.



The selected parametrics are displayed in Collection Operator Terminal frequency lists as depending on the Parameter Format. The available parametrics format options are:

- Baud Rate/Shift
- Bit Rate/Interleave
- RPM/IOC
- Words Per Minute
- Bit Rate/Interleave

2.6 Inventory

Inventory provides a list of all currently available intercept equipment that is used users to meet local intercept requirements. This list is composed of antennas, receivers and any additional collection, intercept, recording and analysis equipment used by the station. The system Inventory provides a useful repository for the

management, allocation, repairs and maintenance scheduling of all local intercept equipment.

2.6.1 Antennas

To create a new antenna, right-click Antennas in the left hand menu and select Add New from the menu or right-click any antenna in the right-hand panel and select New from the menu. This will open the Add Antenna window.

The 'Add Antenna' dialog box contains the following fields and controls:

- Antenna Number:** [Pending]
- Manufacturer:** [Text Input]
- Model:** [Text Input]
- Antenna Type:** [Undefined (Dropdown)]
- Enabled:**
- AN Nomenclature:** [Text Input]
- Serial Number:** [Text Input]
- Asset Tag:** [Text Input]
- Minimum Frequency:** [Text Input]
- Maximum Frequency:** [Text Input]
- Description:** [Text Area]
- Latitude/Longitude:** 00° 00' 00.0 N 000° 00' 00.0 E
- Ground Elevation (m):** [0]
- Height AGL (m):** [0]
- Length (m):** [0]
- Orientation:** [0]
- Effective Date:** 18 August 2024
- Obsolete Date:** 18 August 2024
- Remarks:** [Text Area]

NOTE: If an antenna is intended to be used in direction finding operations, it is essential that the latitude and longitude of the antenna are entered to enable location analysis to be carried out

2.6.1.1 Service History

The Service History tab provides a useful tool for recording any repairs, servicing and modifications carried out on the antenna.

The screenshot shows a dialog box titled "Add Antenna" with a close button (X) in the top right corner. It has two tabs: "General" and "Service History". The "Service History" tab is active and contains the text "List of any repairs, servicing and modifications made to this antenna." Below this text is a table with the following columns: "Sequence", "Date", "Type", and "Name". The table is currently empty. Below the table are three buttons: "Add", "Edit", and "Delete". The "Add" button is highlighted with a blue border. At the bottom right of the dialog are "OK" and "Cancel" buttons.

To add a new record, click the Add button to open the Add Service Item window:

Add Service Item [X]

Service Number
[Pending]

Date
20 August 2024

Service Type
Unknown

Service Name
[Empty]

Remarks
[Empty]

Modification Number
[Empty]

Service By
[Empty]

OK Cancel

2.6.2 Equipment

To create a new piece of equipment, right-click Equipment s in the left hand menu and select Add New from the menu or right-click any equipment in the right-hand panel and select New from the menu. This will open the Add Equipment window.

Add Equipment [X]

General | **Service History**

Equipment Number: [Pending]

Equipment Type: Undefined

Enabled:

Manufacturer: [Text Box]

Model: [Text Box]

AN Nomenclature: [Text Box]

Serial Number: [Text Box]

Asset Tag: [Text Box]

Description: [Text Area]

Effective Date: 18 August 2024

Obsolete Date: 18 August 2024

Remarks: [Text Area]

OK Cancel

2.6.3 Receivers

To create a new receiver, right-click Receivers in the left hand menu and select Add New from the menu or right-click any receiver in the right-hand panel and select New from the menu. This will open the Add Receiver window.

Add Receiver [X]

General | **Service History** | **Receiver Control**

Receiver Number: [Pending]

Manufacturer: [Text Box]

Model: [Text Box]

Receiver Type: Undefined [v]

Enabled:

AN Nomenclature: [Text Box]

Serial Number: [Text Box]

Asset Tag: [Text Box]

Minimum Frequency: [Text Box]

Maximum Frequency: [Text Box]

Description: [Text Area]

Effective Date: 18 August 2024 [Calendar Icon]

Obsolete Date: 18 August 2024 [Calendar Icon]

Remarks: [Text Area]

OK Cancel

The Receiver Control tab provides options to configure parameters for automatic receiver tuning control from within the Collection Operator Terminal application. Select the matching receiver from the Command Protocol dropdown list then enter the hexadecimal receiver address if required. Command Protocols are currently available for three different receiver manufacturers:

- Icom
- Japan Radio
- Winradio

NOTE If your particular receiver is not included, please contact us.

Standard serial port configuration for the selected receiver can also be entered on this page, with the physical serial being set within the Collection Operator Terminal

application. If you are unsure of the serial port configuration for any receiver, click the Use Defaults button to load the standardised settings for the selected receiver.

The screenshot shows a dialog box titled "Add Receiver" with a close button (X) in the top right corner. The dialog has three tabs: "General", "Service History", and "Receiver Control", with "Receiver Control" being the active tab. Inside the dialog, there is a checkbox labeled "Enabled" which is currently unchecked. Below this, there are two input fields: "Command Protocol" (a dropdown menu) and "Receiver Address" (a text box). A section titled "Serial Port Configuration" contains four more dropdown menus: "Bits per second", "Data bits", "Parity", and "Stop Bits". At the bottom right of the dialog, there is a "Use Defaults" button. At the very bottom of the dialog, there are "OK" and "Cancel" buttons.

2.7 Languages

Languages provides a list of all currently available languages in the database. This list is composed of the default list of languages provided with HARVESTER COMINT Suite and any new languages that may have been created by users to meet local intercept requirements.

NOTE: New languages can only be added by registered workstations.

To create a new languages, right-click Languages in the left hand menu and select Add New from the menu or right-click any emission in the right-hand panel and select New from the menu. This will open the Add Language window.

The image shows a 'Create New Language' dialog box. It features a title bar with the text 'Create New Language' and a close button (X). Below the title bar is a tab labeled 'Language'. The main area of the dialog contains a 'Language Name' label followed by an empty text input field. Below the input field is a checked checkbox labeled 'Enabled'. At the bottom right of the dialog are 'OK' and 'Cancel' buttons.

NOTE: The Language Name of default languages supplied with HARVESTER COMINT Suite cannot be changed.

2.8 Locations

Locations provides a repository for any fixed and temporary intercept locations used for local collection and intercept requirements. These locations can then be selected within the Workstation window to be set against intercept positions.

To create a new location, right-click Locations in the left hand menu and select Add New from the menu or right-click any location in the right-hand panel and select New from the menu. This will open the Add Location window.

The screenshot shows the 'Add Location' dialog box with the following fields and options:

- Location Number:** [Pending]
- Country:** Unknown (dropdown menu)
- Location Name:** (text input field)
- Location Address:** (text input field)
- Enabled:** Enabled
- Classified Location:** Classified Location
- Location Type:** (dropdown menu)
- Latitude/Longitude:** Latitude/Longitude. Fields: 00° 00' 00.0 N, 000° 00' 00.0 E
- Location Notes:** (text input field)
- Ground Elevation (m):** 0
- Effective Date:** Effective Date. 18 August 2024
- Obsolete Date:** Obsolete Date. 18 August 2024
- Remarks:** (text input field)

Buttons: OK, Cancel

2.9 Modulations

Modulations provides a list of all currently available Modulations in the database. This list is composed of the default list of modulations provided with HARVESTER COMINT Suite and any new modulations that may have been created by users to meet local intercept requirements.

NOTE: New modulation systems can only be added by registered workstations.

To create a new modulation, right-click Modulations in the left hand menu and select Add New from the menu or right-click any modulation in the right-hand panel and select New from the menu. This will open the Add Modulation window.

The image shows a 'Create New Modulation' dialog box. It features a title bar with the text 'Create New Modulation' and a close button (X). The main area is titled 'Modulation' and contains the following fields:

- Modulation Name:** A text input field.
- Enabled:** A checked checkbox.
- Description:** A large text area with a vertical scrollbar.

At the bottom of the dialog, there are two buttons: 'OK' and 'Cancel'.

NOTE: The Modulation Name of default modulations supplied with HARVESTER COMINT Suite cannot be changed.

2.10 Security (Professional Version Only)

The Security module provides the tools for the management of system and data access in a professional collection environment through the use of clearances and data compartments.

2.11 User Accounts

User Accounts provides functionality to create, management and disable individual users within the HARVESTER COMINT Suite system.

NOTE: HARVESTER COMINT Suite is installed with the default administrator user account ALPHA. This account can be used to configure and manage the system as well as creating new users.

To create a new user, right-click User Accounts in the left hand menu and select Add New from the menu or right-click any user in the right-hand panel and select New from the menu. This will open the Create New User Account window.

The screenshot shows a 'Create New User Account' dialog box with the following fields and options:

- Username:** A text input field with a blue border.
- Use System Generated Username**
- Forenames:** A text input field.
- Surname:** A text input field.
- Description:** A larger text input area.
- Password:** A text input field.
- Confirm Password:** A text input field.
- Administrator**
- Force password change at next logon**
- User cannot change password**
- Enforce Password History**
- Account is disabled**

Buttons: **OK** and **Cancel**

User accounts can be created by selecting one of two generation methods: username or system generated username.

- **Username.** This method is best suited for specific named accounts, such as admin, administrator or any other production-type account. The username can be a maximum of 64 characters in length.
- **System Generated Username.** This method is best suited for individual user accounts and uses a combination of the user's forenames and surnames to automatically generate a unique username. Usernames are usually no longer than 7 characters.

2.11.1 Passwords

Passwords are case-sensitive and can be up to a maximum of 40 characters in length and must be a minimum of 8 characters. All special characters are permitted in passwords.

2.11.2 Account Options

All users accounts have a number of options that can be applied to them:

- **Administrator.** Enabling this option provides the account with full access to the system however administrator accounts still require implicit privileges to access specific applications.
- **Force password change at next logon.** This option forced a user to change their password when they next log into the system.
- **User cannot change password.** This option disabled the Set New Password option in any application that the user logs into. This setting is not recommended for normal user accounts but may be useful for shared production accounts.
- **Enforce Password History.** This option prevents users from recycling passwords by keeping an encrypted history of the passwords they have used in the past.
- **Account is disabled.** This option completely disabled the user account.

NOTE: In order to maintain an accurate historical record of system usage, User Accounts cannot be deleted. User accounts that are no longer required or no longer in use should be set to **disabled**.

Once all information and options have been entered, click the OK button to create the user account. If successful, the new user account will appear in the list of user accounts in the right-hand panel.

Once created, a user account can then be edited to add additional privileges such as implicit access to different applications within HARVESTER COMINT Suite. Double-click the user account in the right-hand panel to open the Edit User Account window.

The image shows a screenshot of the 'Edit User Account' dialog box. The dialog has three tabs: 'General', 'Clearances', and 'Applications'. The 'General' tab is active. The fields are as follows:

- Username: ALPHA
- Forenames: Administrator
- Surname: (empty)
- Type: (dropdown menu)
- Organisation: (dropdown menu)
- Description: (text area)

At the bottom, there are five checkboxes:

- Administrator
- Force password change at next logon
- User cannot change password
- Enforce Password History
- Account is disabled

At the bottom right, there are two buttons: 'OK' and 'Cancel'.

2.11.3 User Security Clearances (Professional Version Only)

Within a professional collection environment, there is often a need for stricter management of system access, defining access at a far more granular level. In terms of clearances and data compartments.

2.11.4 Application Access

Application Access provides a tool for managing user access to individual applications within HARVESTER COMINT Suite. By default, all user accounts are created with no access to any of the applications. Administrators must therefore explicitly grant access to applications before a user can log in and use them. Click the applications that the selected user requires to use and click the OK button.

2.12 Workstations

The Workstations module provides an automatically updated list of all the workstations that have logged into HARVESTER COMINT Suite using one of its applications. Double-click on any workstation to open the Edit Workstation window.

The screenshot shows the 'Edit Workstation' dialog box with the following configuration:

- Sequence:** 0001
- Workstation Name:** HERITOR64
- Position Type:** Non-Morse
- Position Designator:** SKD-GRP-AT4
- POEI:** (empty)
- DF Enabled Position:**
- Position Enabled:**
- Position Status:** Unregistered
- Location Section:**
 - Location:** (dropdown menu)
 - Room:** (empty)
 - Direct Dial:** (empty)
 - Extension:** (empty)
 - Secure:** (empty)
 - IP Address:** (empty)
- Effective Date:** 05 September 2024
- Obsolete Date:** 05 September 2024
- Remarks:** (empty text area)

The Edit Workstation window provides a number of configuration options for the workstation. Workstation Name is automatically set as the machine hostname as defined within Windows and cannot be changed.

Position Type defines what type of work that the workstation is engaged in. There are currently five workstreams:

- Morse
- Non-Morse
- Search and Development
- Voice
- Workstation

Position Designator, which defaults to the Windows hostname of the machine, can be used to annotate a target or coverage type and appears on intercept logs and reports. In the example above, the designator SKD-GRP-AT4 refers to a collection tasking.

Ensure that the Position Enabled checkbox is ticked to ensure that the workstation can log into the HARVESTER COMINT Suite.

Edit Workstation [Close]

General | **Setup** | Configuration

Installed Equipment

Type	Name	Status	Serial Number
Receiver	NRD535 NRD535	Active	
Receiver	Racal 1792	Active	

< [Progress Bar] >

Add Remove

Available Antennas

Name	Min Frequency	Max Frequency	Status	Serial

Terminal Intercept Scope

Collection System: HARVESTER

Position Description: [Text Field]

Minimum Frequency: [0.000] [0.000]

Maximum Frequency: [1000.000000M1] [30.000000G3]

TEXTA System

TEXTA Block Assignment: [Dropdown]

OK Cancel

The Setup tab allows for more specific configuration of the workstation in terms of the intercept and collection equipments it has been allocated as well as frequency scope and the allocation of a TEXTA block assignment.

2.12.1 Installed Equipment and Available Antennas

If you intend to enable automatic receiver tuning, it is essential that the correct receivers are defined in the Installed Equipment list. Click the Add button to open the list of available receivers, as defined in Section 2.6.3 Receivers above. Select the receivers accessible to the workstation and click OK. The receivers added here will appear in the receiver dropdown list in the Collection Operator Terminal and when connected to the application, can be controlled automatically by the software.

The Available Antennas list provides a listing of all installed antennas. These may be used exclusively by the workstation or shared with other positions and receivers.

2.12.2 Terminal Intercept Scope

By default, all workstations are assigned to the HARVESTER collection system with an initial frequency intercept scope ranging from 0 to 1 GHz. Should a workstation require to operate within a more limited frequency range such as HF only, then the minimum and maximum frequency operating limits can be defined here.

Like the Position Designator on the General tab, Position Description can be used to store targets and/or tasking that the position has been allocated. This is particularly useful in collection environments where individual positions are assigned specific targets to collect.

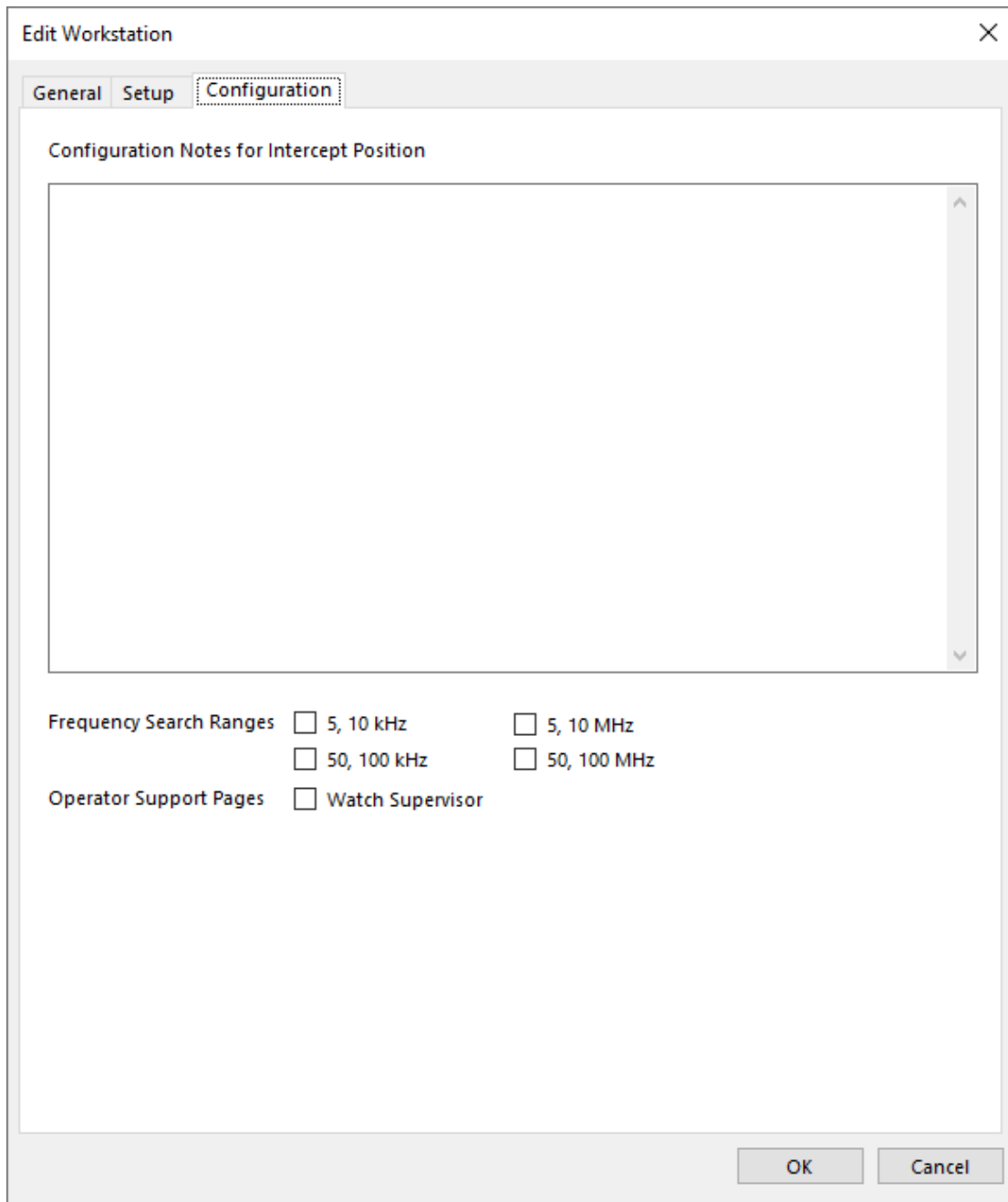
2.12.3 TEXTA System

The TEXTA Block Assignment is used in the generation of temporary TEXTA case notations. It allows a station to assign temporary case notation bases on a specific tasking or project that is a sub-group of the overall intercept and collection effort. Management of block assignments is a T/A function and are maintained within the TEXTA System application.

2.12.4 Configuration

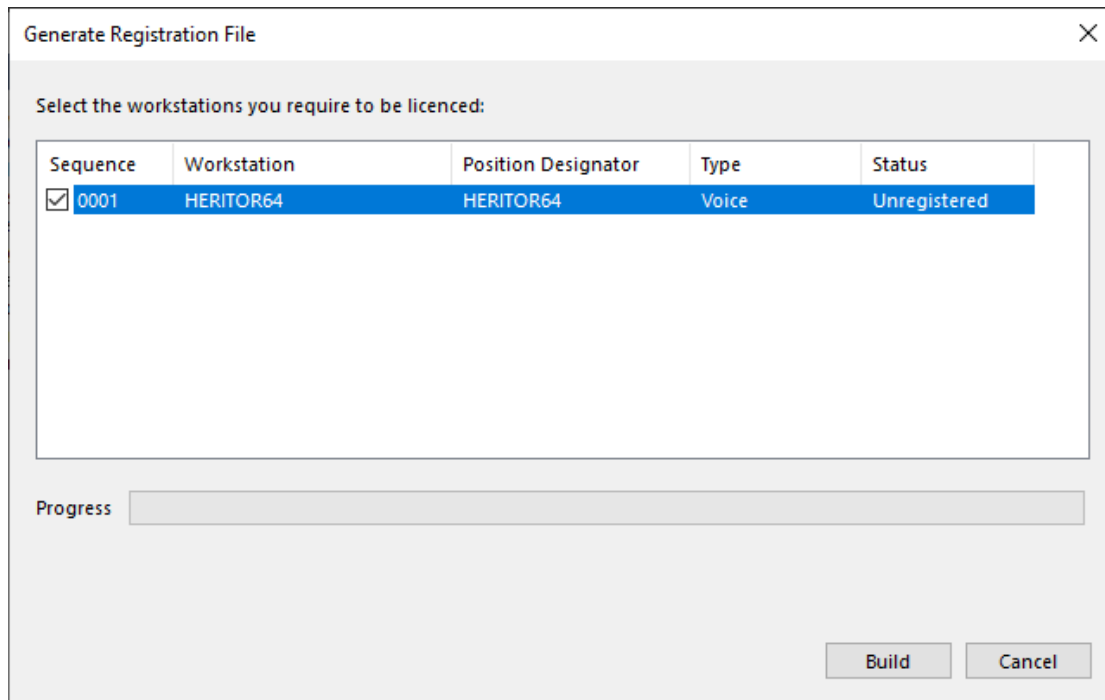
This tab provides a free-text box where notes can be stored about specific installation and setup requirements or settings for the workstation. It also provides two application settings:

- **Frequency Search Ranges.** These check boxes enable and disable the search ranges within the Collection Operator Terminal and define the width of frequency search windows within the application. The options are band specific so for example, a 5 and 10 kHz would suit HF collection but not UHF.
- **Operator Support Pages.** This section enabled and disabled access to additional information modules within the Collection Operator Terminal.



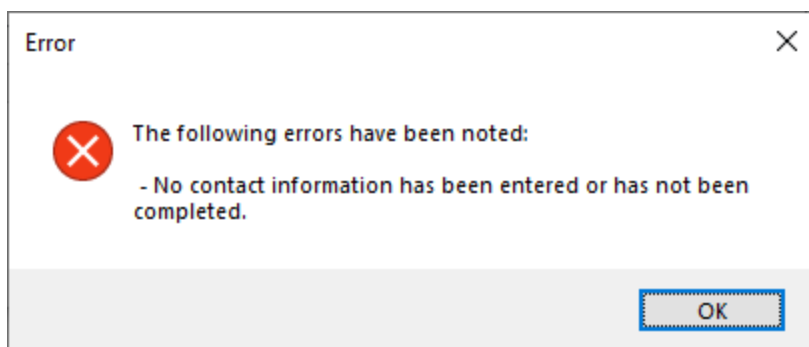
2.13 Registration

Registration of a workstation is an essential step to gain the full benefit of the applications that form the HARVESTER COMINT Suite. Registration is managed on a per-seat basis so that registering a workstation opens up the full functionality of all applications that are installed. To register a workstation, select the Generate Registration File option for the Tools, Registration and Licencing menu. This will open the Generate Registration File window.



Select the workstations that you wish to register and click the Build button. The file generation process will begin and the progress will be reported in the progress bar. Once completed, the location of the registration file will be displayed on screen. This file then needs to be sent to SIGINT Systems for a licence file to be created.

One key part of the registration process is that your contact details have been entered into the Detail Details window. If you have not done this, select Contact Details from the File menu and entered your details before continuing. If this is not done, the file generation process will be halted and the following message will be displayed on screen:

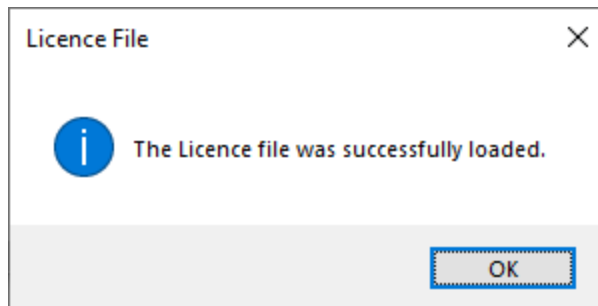


2.13.1 Loading Licencing File

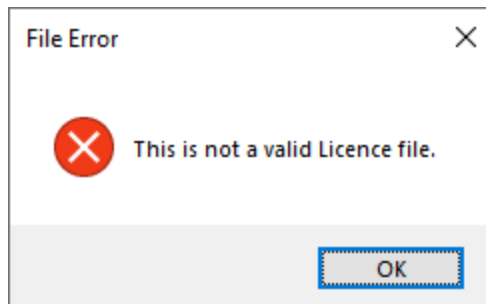
To load a licencing file, select the Load Licence File option for the Tools, Registration and Licencing menu. This opens the Load Licence File window. Navigate to the licencing file for your installation supplied to you by SIGINT Systems. Filenames are

normally of the form *yyyymmddhhmmss.lic*. Select the file then click the Open button.

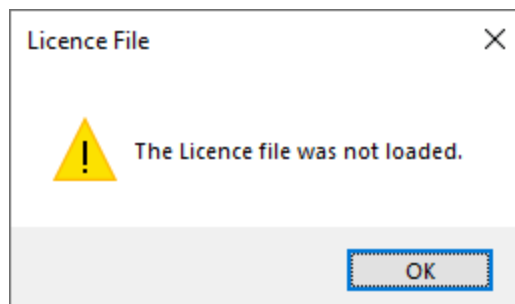
Once the licence file has been successfully validated and loaded, the following message will be displayed on screen:



If the file you try to load is not a genuine licence file, the licencing process will be halted and the following message will be displayed:



Similarly, if there are any issues loading the licence file, the licencing process will be halted and the following message will be displayed:



If there are any issues loading the licence file, please contact SIGINT Systems.

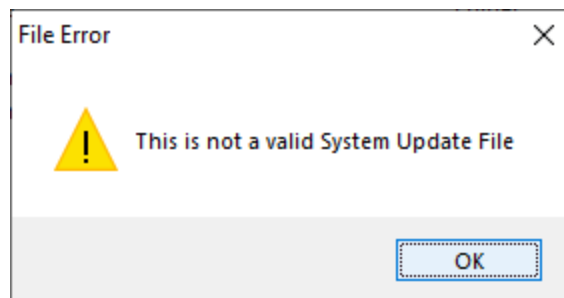
2.14 System Updates

From time to time, SIGINT Systems will issue System Updates. These can contain data updates as well as architectural database updates to enable new functionality added to applications. System Updates will always be released with accompanying release notes so that users are made fully aware of the updates included. As with all enterprise level applications, we strongly advise users to always take a full database update before applying any system update.

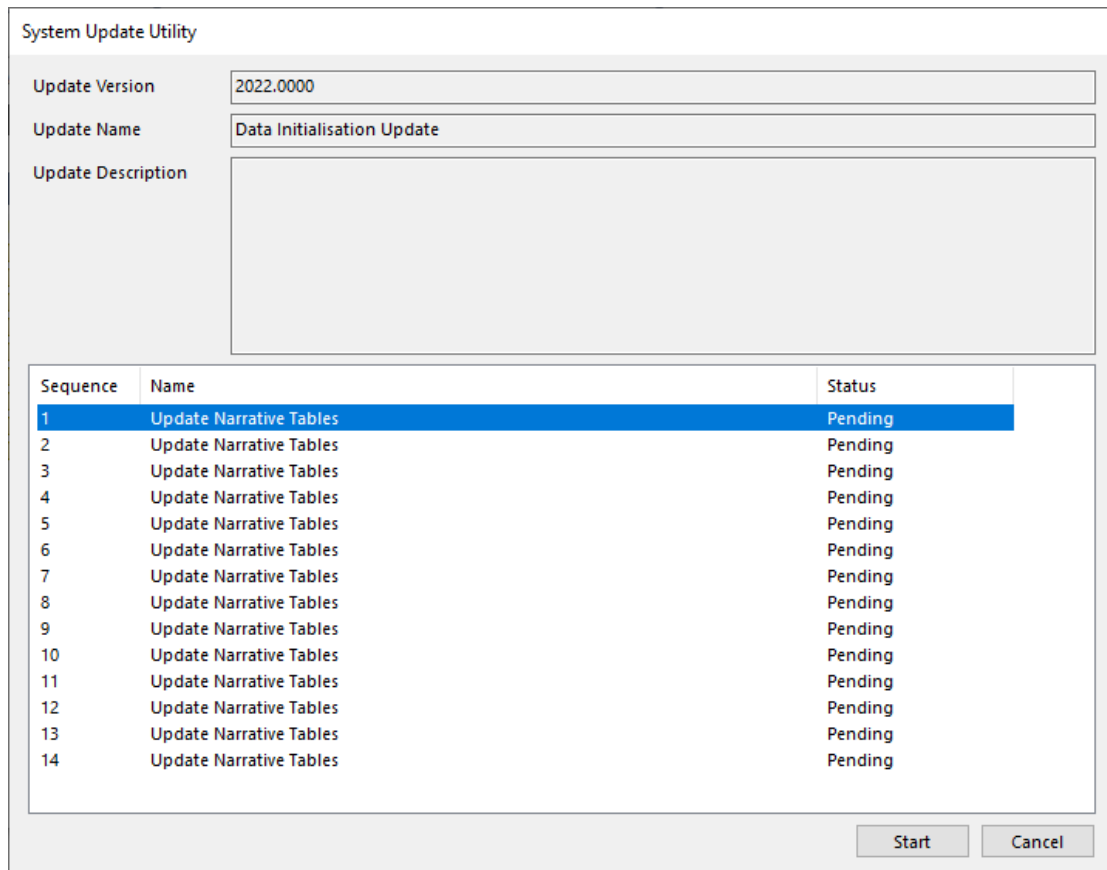
To load a System Update file, select the Load System Update File option for the Tools, System Updates menu. Navigate to and select the System Update file then click the Open button

NOTE: System Updates can only be loaded by licenced instances of Field Station Manager.

If the file selected is not a valid System Update file, the following message will be displayed.



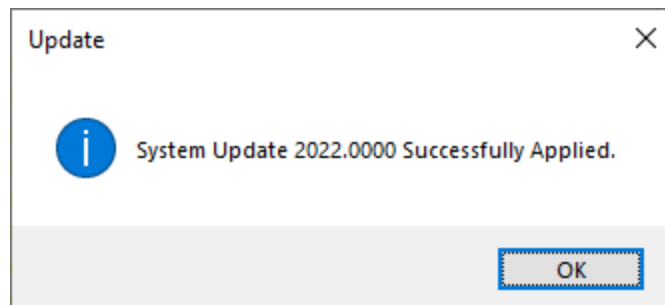
If the selected file is a valid System Update file, the System Update Utility will open and display the version and name of the System Update as well as a description. It will also display a list of the individual update steps included in the update.



NOTE: Before starting the update process, it is critical that you refer to the System Update release notes to confirm the expected number of steps in the update. If the number of steps on screen do not make the expected number of steps in the release notes, **do not** continue with the System Update.

Click the Start button to begin the update process. Update steps will be processed sequentially and the corresponding status will be updated at the end of each step. The update should end with all steps being updated to 'Completed' however in the event that an error is encountered, the status will be updated to 'Error'. Individual error steps can be examined by double-clicking the step. This will open a message box showing the error associated with the failed step.

A successfully applied update will end with the 'Successfully Applied' message:



2.15 Data Systems

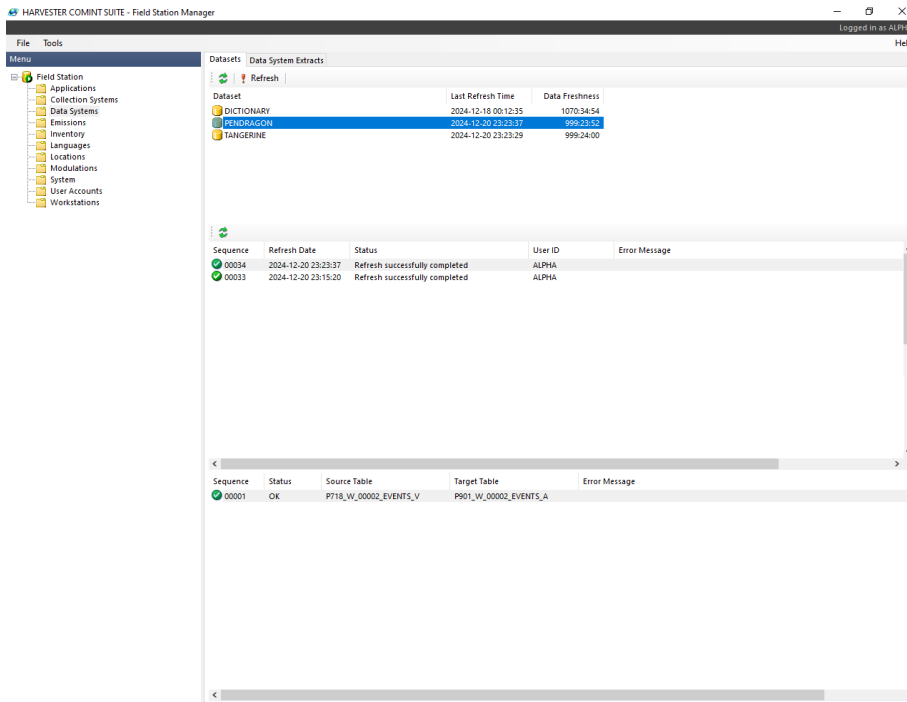
The Data Systems module provides data support functionality for a number of query focussed datasets that run in the background of HARVESTER COMINT Suite which present analysts with searchable coverage, intercept and message digests. It also provides data export and import tools for handling a variety of pre-defined datasets. This module is not available in demo mode.

2.15.1 Datasets

HARVESTER COMINT Suite currently makes use of two query focussed datasets (PENDRAGON and TANGERINE) to supply data to the Traffic Analysis Workbench modules of Order of Battle and Log Analysis. These datasets require to be regularly refreshed so that the latest information is available for analysis. The interval between refreshes can vary according to requirements. As a guide, the freshness, or age, of the data, formatted in hours, minutes and seconds, is displayed alongside each dataset.

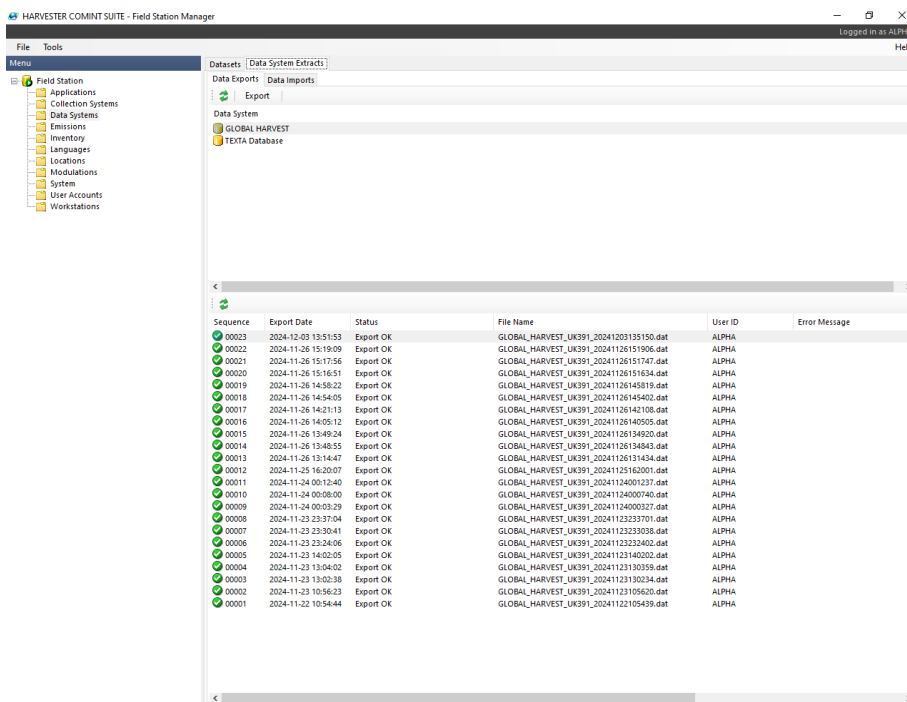
To refresh a dataset, select the Datasets tab in the Data Systems module. Select the dataset that you wish to refresh and either right-click the dataset and select the Refresh Dataset option from the menu or click the Refresh Dataset button on the toolbar. The dataset refresh process will begin immediately and the results will be

written to the refresh log with a “Refresh successfully completed” message. If there are any issues during the refresh process, the errors will appear in the Error Message column of the refresh log.

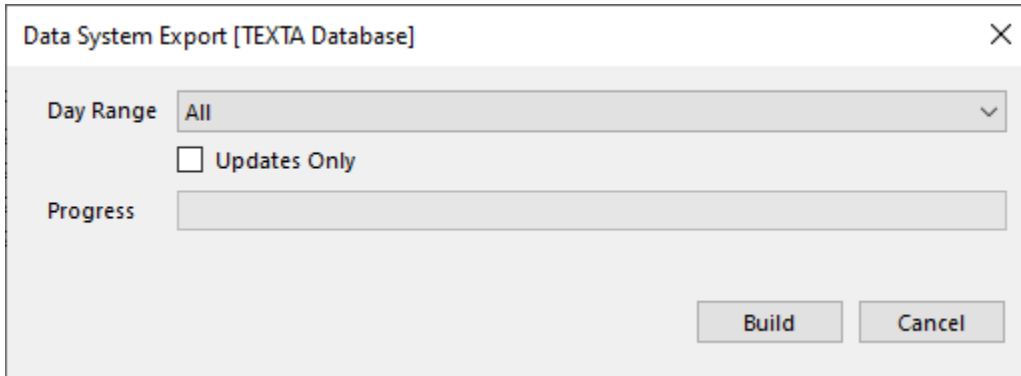


2.15.2 Data Exports and Imports

HARVESTER COMINT Suite currently supports two shared query focused datasets (GLOBAL HARVEST and TEXTA Database) which can be used to exchange data. To export a dataset, select the Data System Extracts tab in the Data Systems module then select the Data Exports tab.



Select the dataset that you wish to export and either right-click the dataset and select the Export option from the menu or click the Export button on the toolbar to open the Data Export window.



Select the day range you wish to export and click the Build button to begin the export. The dataset export process will begin immediately and the results will be written to the export log with an "Export OK" status message. If there are any issues during the export process, the errors will appear in the Error Message column of the export log.

Export files are written to the Output folder inside the Harvester installation folder and a message will be displayed onscreen at the end of the export confirming both the file location and the filename of the export.

