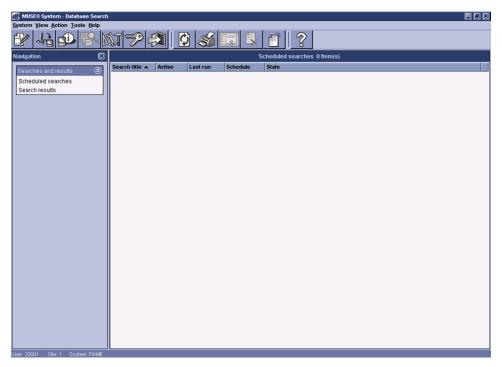
## **Database Search**

## New Search Using Pre-Defined Template

Template searches are pre-defined to allow you to obtain general statistics on a daily, weekly, or monthly basis easily and quickly. These templates can be used repeatedly.

Select System > Database Search.

The **Database Search** window opens.

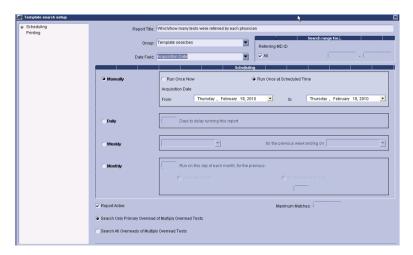


2. Highlight **Scheduled searches** in the **Navigation** pane and select **Action > New Search**.

The **Select search type** window opens with a list of templates.

3. Select a template and click **OK**.

The *Template search setup* window opens.



4. Highlight *Scheduling* and set up the following options.

| Name         | Description  |
|--------------|--|
| Report Title | Displays the default name of the report; you may change this.  |
|              | If you change the name, be sure to name the report as specifically as possible so that there is no confusion on what the report does. If you have multiple hospitals under one MUSE site, you may want to precede the search name with the hospital acronym. |
| Group        | Allows you to assign this report to the <b>Template searches</b> group or the <b>User-defined searches</b> group.  |
| Date Field   | Select which type of date range you want to use for this search. Your choices are:   |
|              | No date Range — Searches records throughout the entire database.   |
|              | Acquisition Date — Based on the date on which the record was taken at the cart.  |
|              | Confirmed Date — The date when the record was confirmed on the MUSE system.  |
|              | Edit Date — The date when the record was last edited on the MUSE system.   |
|              | Fellow Confirmed Date — The date when a fellow confirmed the record.   |
|              | MUSE Acquisition Date — The date when the record arrived at the MUSE system.   |
|              | Order Placement Date — The date the order was placed at the HIS.   |
|              | The field you select displays below the <b>Scheduling</b> portion of the screen.   |

| Name  | Description   |
|---|---|
| Search range for  | Allows you to select a range of MUSE system IDs.  |
|   | To search all MUSE system users, select the <b>All</b> check box.   |
| Manually  | Select this radio button to schedule a manual search to run now or at the scheduled time  |
|   | Select the option buttons to <i>Run Once Now</i> or <i>Run Once</i> at <i>Scheduled Time</i> .  |
|   | Select the date range in the <b>From</b> and <b>To</b> fields as appropriate for your search.   |
|   | NOTE:  The system schedules time to manually run searches at 2:00 a.m. You cannot change this in the <i>Database Search</i> application.  |
| Daily   | Select to schedule a search to run every day.   |
|   | Enter the number of days to delay running the report in the <b>Days to delay running the report</b> field.  |
|   | Delaying a search allows all carts to be downloaded before running the search. It is recommended that you delay the running of a daily search by at least one day.  |
| Weekly  | Select to schedule a weekly search.   |
|   | Select the day of the week you want it to run. The field <b>for the previous week ending on</b> indicates the last day of the seven day period. Therefore, if you select Sunday, the system searches from the previous Saturday to Sunday. If you select <b>for the previous week ending on</b> to the same day, the MUSE system goes back to the previous week to generate the report. |
| Monthly   | Select to schedule a monthly search.  |
|   | Determine the delay of running the report and enter a number in <i>Run on this day of each month for the previous</i> .   |
|   | Determine if you want to use the previous <b>Calendar month</b> or the previous <b>Month Ending on Day</b> . If you select <b>Month Ending on Day</b> , the MUSE system goes back one complete month from the day you select.   |
| Report Active   | Select to activate the report.  |
| Search Only Primary<br>Overread of Multiply<br>Overread Tests | Select to search for primary overread of multiple overread tests.   |
| Search All Overreads of<br>Multiply Overread Tests            | Select to search all overreads of multiple overread tests.  |
| Maximum Matches   | Maximum number of matches to show for the search. This option is disabled for pre-defined templates.  |



5. Highlight *Printing* as shown in the following figure and set up the following.

| Name                         | Description  |
|------------------------------|--|
| Save Results                 | Select this check box to save the results of the search to the MUSE system. This allows you to reprint results if the original printout is misplaced or lost.  |
| Delete Results after [] days | Type the number of days the saved results remain on the system before they are automatically purged.   |
| Print Results to:            | Select the check box next to each device where you want the results printed (for example, Overreading, M.D. or Temporary Email). You may select more than one device.  |
| Number of Copies:            | After you select your device, use the arrow keys to select the number of copies you want to print.   |
| Print Format                 | <ul> <li>Specifies the printing results format. Select from following:</li> <li>Header Only— prints the header information only, including the search title and search count.</li> <li>List— this is a patient list.</li> <li>Tabular Summary— this is a tally of search results.</li> </ul>   |
| Page Layout                  | Select the orientation of the page printout. Select between <i>Portrait</i> or <i>Landscape</i> format. Select <i>Font</i> type, <i>Fixed Width</i> , <i>Serif</i> , and <i>Sans Serif Handling of long lines</i> allows you to select how the system handles the text when text line is too long. Select <i>Truncate long lines</i> , <i>Wrap Long Lines</i> , and <i>Split across multiple pages</i> . |
| Font Size                    | Sets the text font size.   |

6. To run the search, select **OK**.

The **Template search setup** window closes.

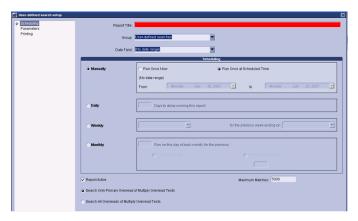
To view the results, see "Viewing Search Results" on page 118.

## **User-Defined Searches**

To schedule a user-defined search:

- Select Action > New Search.
   The Select search type window opens.
- 2. Click **User-defined search**.
- 3. Click **OK**.

The *User-defined search setup* window opens.



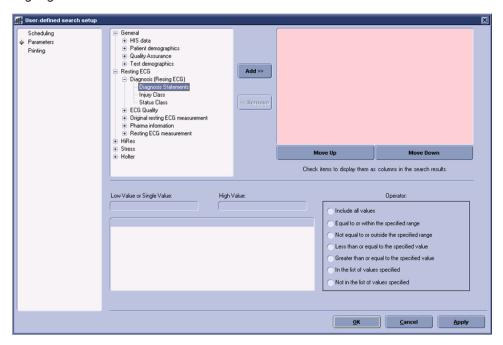
4. Set up the following.

| Name         | Description  |
|--------------|--|
| Report Title | Displays the default name of the report. You may change this title. In a new user defined search, the report title is blank.   |
|              | If you change the name, be sure to name the report as specifically as possible so that there is no confusion on what the report does. If you have multiple hospitals under one MUSE site, you may want to precede the search name with the hospital acronym. |

| Name       | Description   |
|------------|---|
| Group      | Allows you to assign this report to the <b>Template searches</b> group or the <b>User-defined searches</b> group.   |
| Date Field | Select which type of date range you want to use for this search. Your choices are:  |
|            | • <b>No date Range</b> — Searches records throughout the entire database.   |
|            | • Acquisition Date — Based on the date on which the record was taken at the cart.   |
|            | • Confirmed Date — The date when the record was confirmed on the MUSE system.   |
|            | Edit Date — The date when the record was last edited<br>on the MUSE system.   |
|            | • Fellow Confirmed Date — The date when a fellow confirmed the record.  |
|            | • MUSE Acquisition Date — The date when the record arrived at the MUSE system.  |
|            | • Order Placement Date — The date when the order was placed at the HIS.   |
|            | The field you select displays below the <b>Scheduling</b> portion of the screen.  |
|            |   |
| Manually   | Select this radio button to schedule a manual search to run now or at the scheduled time  |
|            | Select the option buttons to <i>Run Once Now</i> or <i>Run Once</i> at <i>Scheduled Time</i> .  |
|            | Select the date range in the <b>From</b> and <b>To</b> fields as appropriate to your search.  |
|            | NOTE: The system schedules time to manually run searches at 2:00 a.m. You cannot change this in the <i>Database Search</i> application.   |
| Daily      | Select to schedule a search to run every day.   |
|            | Enter the number of days to delay running the report in the <i>Days to delay running the report</i> field.  |
|            | Delaying a search allows all carts to be downloaded<br>before running the search. It is recommended that you<br>delay the running of a daily search by at least one day.  |
| Weekly     | Select to schedule a weekly search.   |
|            | Select the day of the week you want it to run. The field <b>for the previous week ending on</b> indicates the last day of the seven day period. Therefore, if you select Sunday, the system searches from the previous Saturday to Sunday. If you select <b>for the previous week ending on</b> to the same day, the MUSE system goes back to the previous week to generate the report. |
|            | 1 9   |

| Name  | Description   |
|---|---|
| Monthly   | Select to schedule a monthly search.  |
|   | Determine the delay of running the report, and enter a number in <i>Run on this day of each month for the previous</i> .  |
|   | Determine if you want to use the previous <i>Calendar month</i> or the previous <i>Month Ending on Day</i> . If you select <i>Month Ending on Day</i> , the MUSE system goes back one complete month from the day you select. |
| Report Active   | Select to activate the report.  |
| Search Only Primary<br>Overread of Multiply<br>Overread Tests | Select to search for primary overread of multiple overread tests.   |
| Search All Overreads of<br>Multiply Overread Tests            | Select to search all overreads of multiple overread tests.  |
| Maximum Matches   | Maximum number of matches to show for the search.   |

5. Highlight *Parameters*.



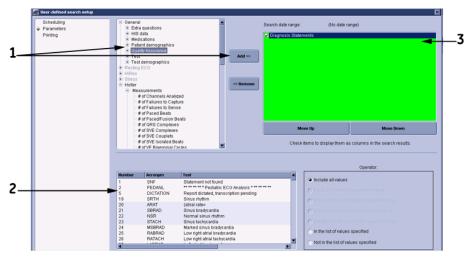
- 6. Select a search field category from the list.
  - General
  - Resting ECG
  - HiRes

- Stress
- Holter
- a. Click on the + sign to expand the category.
- b. Highlight the parameter and click **Add** to add it to the search list. A check mark displays next to the item in the criteria box on the right. To have the field appear as a column in the search results page, leave the box checked Some common categories are as follows:

| Name                 | Description   |
|----------------------|---|
| Patient Demographics | Allows you to select fields related to the patient, such as patient full name, patient ID, gender, age, height, weight, and so on. Double-click on the item to add it to the criteria box to the right. |
| Test Demographics    | Test Demographics allows you to select a criterion related specifically to the test itself. These include: Acquisition Date and Time, the Referring, Ordering, and Overreading Physicians, and so on.   |
| Resting ECG          | Select <b>Resting ECG</b> to search on a specific criteria, such as diagnosis statement.  |

Another window may open for you to select one or more values to search.

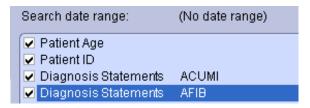
For example, if you select *Diagnosis Statements* as the search field, an acronym list is displayed where you may select *Sinus rhythm* as a value. To select multiple values, double-click the statement while holding down the **Ctrl** key. The values selected are visible in the criteria list with an "or" between them, indicating that if the diagnosis of any of these ECGs being searched has any of these values, the record satisfies the criteria.



(1) Select Search Field and click Add. (2) Select one or more values to search by double-clicking the value while holding down the Ctrl key. (3) The value is displayed.

c. To search for ECGs with a combination of multiple acronyms in the diagnosis, add the *Diagnosis Statement* criteria to the criteria list twice with the statement you want included within the diagnosis. For example,

if you want to find patients with both Acute MIs and Atrial Fibrillation, you add one Diagnosis statement line equal to Acute MI and another Diagnosis statement equal to Atrial Fibrillation. Both lines are visible in the statement criteria list.

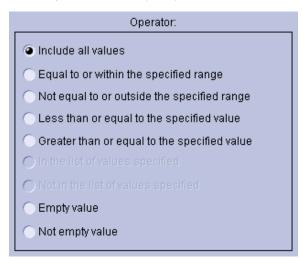


Once you select your search parameters, you may move them up or down in the column.

d. Highlight the search field and click *Move up* or *Move down* to rearrange the order of the search criteria.

The order in which they display is the order in which they are displayed in the results table. The results table is sorted by the first checked parameter on the list.

7. In the *Operator* field, specify a chosen value for the parameter selected in Step 6.



| Name                                   | Description   |
|--|---|
| Include all values                     | The MUSE system displays any value entered into the data field for each patient record.   |
| Equal to or within the specified range | The MUSE system searches for patients that have values within the specified range or with the single value entered in the field labeled <i>Low Value or Single Value</i> For example, if you select the patient age parameter and you are searching for patients between the age of 50 to 60, you enter 50 in the <i>Low Value or Single Value</i> field and 60 in the <i>High Value</i> field. |

| Name   | Description  |
|--|--|
| Not equal to or outside the specified range  | Allows you to set a range or specific value that you do not want the criteria to equal. For example, setting a value of 50 to 60 results in a search of all values outside this range. |
| Less than or equal to the specified value    | The MUSE system searches for all values that are less than or equal to a specified value.  |
| Greater than or equal to the specified value | The MUSE system searches for all values that are greater than or equal to a specified value.   |
| In the list of values specified              | The MUSE system searches only among the list of values specified for the field.  |
| Not in the list of values specified          | The MUSE system searches for all values not among the list of values specified for the field.  |
| Empty value                                  | The MUSE system searches for all the empty values for the field.   |
| Not empty value                              | The MUSE system searches for all non-empty values for the field.   |

#### 8. Highlight *Printing*.

The **Printing** window opens.

9. Set the following.

| 5. Get the lengthing.        |  |
|------------------------------|--|
| Name                         | Description  |
| Save Results                 | Select this check box to save the results of the search to the MUSE system. This allows you to reprint results if the original printout is misplaced or lost.  |
| Delete Results after [] days | Type the number of days the saved results remain on the system before they are automatically purged.   |
| Print Results to:            | Select the check box next to each device where you want the results printed (for example, Overreading, M.D. or Temporary Email). You may select more than one device.  |
| Number of Copies:            | After you select your device, use the arrow keys to select the number of copies you want to print.   |
| Print Format                 | <ul> <li>Specifies the printing results format. Select from following:</li> <li>Header Only— prints the header information only, including the search title and search count.</li> <li>List— this is a patient list.</li> <li>Tabular Summary— this is a tally of search results.</li> </ul> |

| Name        | Description   |
|-------------|---|
| Page Layout | Select the orientation of the page printout.  |
|             | Select between <i>Portrait</i> or <i>Landscape</i> format.  |
|             | Select <b>Font</b> type, <b>Fixed Width</b> , <b>Serif</b> , and <b>Sans Serif</b>  |
|             | Handling of long lines allows you to select how the system handles the text when text line is too long. Select Truncate long lines, Wrap Long Lines, and Split across multiple pages. |
| Font Size   | Sets the text font size.  |

10. To run the search, select **OK**.

The *User-defined search setup* window closes.

11. To view the results, see "Viewing Search Results" on page 118. Make sure the **Save Results** check box is enabled so that the search results are saved.

## **Editing an Existing Search**

- 1. Highlight **Scheduled searches** in the **Navigation** pane.
- 2. On the **Scheduled searches** window, double-click on the specific search to edit the scheduled search.

The **Template search setup** window opens.

3. Repeat Steps 4-6 at "New Search Using Pre-Defined Template" on page 107 to modify the search parameters.

## **Copying User-Defined Search**

#### NOTF.

You can only copy user-defined searches. You cannot copy pre-defined templates.

- 1. Highlight **Scheduled searches** at the **Navigation** pane.
- 2. At the **Scheduled searches** window, highlight the search name.
- 3. Right-click and select **Copy**.

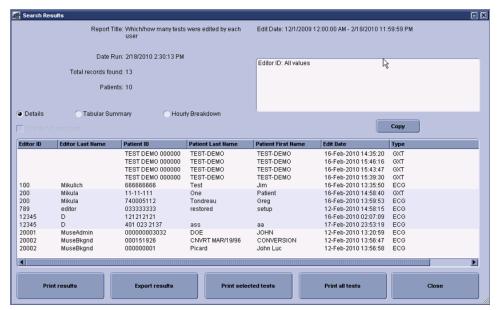
The *User-defined search setup* window opens.

4. Repeat Steps 4-6 at "User-Defined Searches" on page 111 to modify the search parameters.

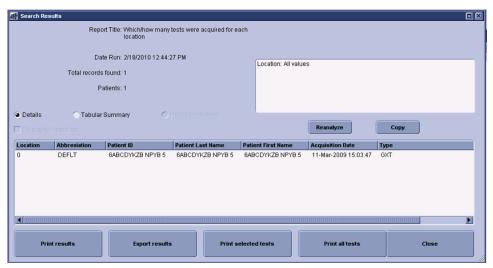
## **Viewing Search Results**

- 1. In the **Navigation** pane, select **Search Results**.
- 2. On the **Search Results** window, highlight and double-click the search you want to view.

The **Search Results** window opens.



Search Results window for Clinical Site



Search Results window for Research Site

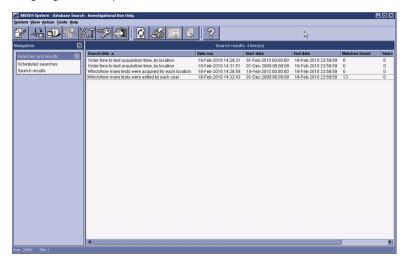
#### 3. You may select from the following:

| Option                                | Description   |
|---------------------------------------|---|
| Details                               | Click to view a list of all patient records that matched the search criteria.   |
|                                       | To view a patient test, double-click on it in the search results window. A <b>Report Viewer</b> window opens allowing you to view or print the report or ECG. |
| Tabular Summary                       | Click to view the breakdown of every record count for the main search criteria.   |
| Hourly Breakdown                      | Click to view the breakdown of tests done per<br>hour for the last 24 hours. This report is helpful in<br>reviewing staffing needs.                           |
| Display full result set               | Click to display the full results of the search.  |
|                                       | NOTE:  This check box will only be enabled only if there are more than 5,000 rows returned in the search results set.   |
| Сору                                  | Click to copy a selected test to a different site.  |
|                                       | The <b>Select Site</b> window opens.  |
|                                       | Select the site and click <b>OK</b> .   |
| <b>Reanalyze</b> (Research Site only) | Select a test in the search results.  |
|                                       | Click <b>Reanalyze</b> to manually reanalyze it using any algorithm on the system.  |
|                                       | This feature is available only at Research Sites.   |
| Print Results                         | Click to print the search results displayed on the screen in a report format.   |
|                                       | The <b>Select Printer and Formatting Options</b> window opens.  |
|                                       | Set up the appropriate printing and formatting options and click <b>OK</b> .  |
| Export results                        | Click to export the search results in a spreadsheet format  |
|                                       | The <b>Save As</b> window opens.  |
|                                       | Save the results to the appropriate location.   |
| Print selected tests                  | To print selected tests, highlight the tests you want to print and click <b>Print Selected Tests</b> .  |
|                                       | The <b>Select Printer and Formatting Options</b> window opens.  |
|                                       | Set up the appropriate printing and formatting options and click <b>OK</b> .  |
| Print all tests                       | Click to print all the tests in the search result window.   |
|                                       |   |

4. Click *Close* to exit the *Search Results* window.

## **Printing Report from Search Results Directory**

1. Highlight the report on the **Search Results** window.



Select Actions > Print Results.

The **Select Device and Formatting Options** window opens.

Select the appropriate settings and click OK.
 The report prints at the specified device.

## Locking/Unlocking a Search

You may lock a search to prevent accidental deletion or editing of a search.

- 1. At the **Scheduled searches** window, highlight the appropriate scheduled search.
- 2. Select Action > Lock/Unlock.

If the search was unlocked, this locks it.

If the search was locked, this unlocks it.

### **Deleting a Search**

1. On the **Scheduled searches** window, highlight the appropriate search and select **Action > Delete**.

A message is displayed.

2. Select **Yes** to delete the search or **No** to cancel.

#### **Toolbar**

The toolbar provides access to many of the same commands in the menu bar. To identify a toolbar icon, hold the pointer over it. A tooltip describing the command becomes visible. See Appendix A "Toolbar Icons & Keyboard Shortcuts" on page 193for a description of the *Database Search* toolbar icons.

# **Setup Options**

Select *Tools > Options* to define the *Scheduled search* and *Search results* options.