

Chapter 10

Configuring Task Scheduling

This chapter describes how to schedule update and backup tasks through the NMC-RX application.

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Overview

Task scheduling lets you automate E-series update and configuration file backup operations. Access to these functions is available to users based on their designated user privileges.

Update—A user has the privilege to schedule E-series update tasks if the user has access to the configure privilege.

Backup—A user has the privilege to schedule E-series backup tasks if the user has access to the backup privilege. When a user has backup privilege, the user can access the Save Running Config File.

Depending on your privilege level, you can schedule as many update or backup tasks as needed.

For more information about user privileges, see *Chapter 8, NMC-RX Security* .

Scheduling Tasks

This section describes how to schedule update and backup tasks through the NMC-RX application. Although the procedure in this section begins from the Network Workshop, you can schedule tasks from several starting points:

Network Workshop—Right-click on the device for which you want to schedule the update or backup task.

Device Workshop—Right-click on the system folder from either the Interface Explorer or Device-wide Explorer.



NOTE: Before you schedule tasks, you must start the Config Sync Services.

To schedule a task:

1. In the Network Workshop, select a device, right-click, and select Schedule Tasks.

The Schedule Tasks tab appears in the work area.

The screenshot shows the 'Scheduled Tasks' dialog box. At the top, there is a 'Save' button. Below it, the 'Location' section contains 'Node Name: E-7xx' and 'IP Address: 10.6.129.203'. A table lists tasks with columns for 'Active', 'Task Type', 'Start Time', and 'Recurrence'. Two tasks are listed: 'Backup' and 'Update', both with 'Weekly' recurrence. To the right of the table are buttons for 'Add Backup', 'Add Update', and 'Remove'. Below the table is the 'Schedule Properties' section, which includes 'Task Name', 'Task Type: Backup', 'Estimated Execution Time', and 'Start Time' (with a 'Recurrence...' button). There are tabs for 'Description' and 'History'. At the bottom is the 'Backup FTP Destination' section with fields for 'IP Address', 'Sub Directory', 'Login', 'Config File Name' (with a '.cnf' suffix), 'Password', and 'Timeout (ms)'.

Active	Task Type	Start Time	Recurrence
<input checked="" type="checkbox"/>	Backup	July 10, 2003 2:15 PM	Weekly
<input checked="" type="checkbox"/>	Update	July 11, 2003 2:15 PM	Weekly
<input type="checkbox"/>			
<input type="checkbox"/>			

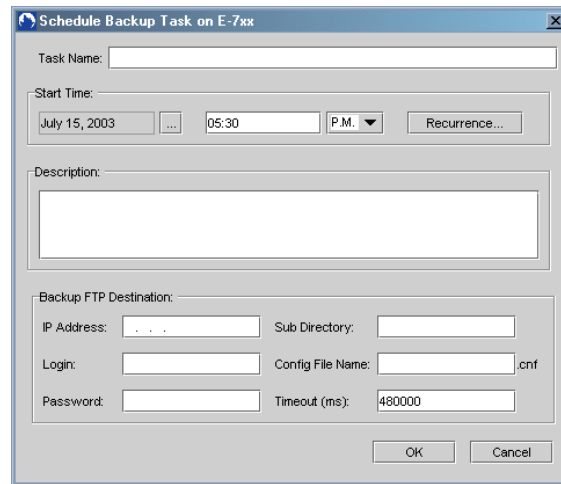
2. Depending on the type of scheduled task you want to create, click Add Backup or Add Update.
3. Go to either *Add Back up Task* on page 139 or to *Add Update Task* on page 140.

Add Backup Task

To add a backup task:

1. From the Scheduled Task tab, click Add Backup.

The Schedule Backup Task dialog box appears. Note that the name of the device associated with this task is listed in the title bar.



2. Set the parameters (Table 29).

Table 29: Backup Task Parameters


Parameter	Description
Task Name	Name of the scheduled tasks; 1–64 characters
Start Time	Current time and date appear when the dialog box opens. Change the date by clicking  . See <i>Related Dialog Boxes</i> on page 143.
Recurrence	Set recurring task patterns by clicking the Recurrence button. See <i>Related Dialog Boxes</i> on page 143.
Description	Description of the task; can be up to 1024 characters
Backup FTP Destination	
IP Address	IP address of the device from which the running configuration is saved
Sub Directory	Directory path from the point of the FTP site (FTP root directory). Combined with the filename, the subdirectory can be a maximum of 247 characters.
Login	User login ID for the FTP site; can be up to 32 characters
Config File Name	<p>Filename for the saved configuration. This user interface appends the .cnf file extension to the filename.</p> <p>Filename has a date/timestamp appended to it in the format MMDDHHmm to represent the date and time the file was created.</p> <p>Can be up to 36 ASCII characters; spaces are allowed if the filename is in quotes.</p> <p>Combined with the subdirectory, the Config File Name can be a maximum of 247 characters.</p>

Table 29: Backup Task Parameters (continued)

Parameter	Description
Password	User login password for the FTP site. The password entry is masked with “*” characters. The password cannot be empty and can be up to 1024 characters.
Timeout (ms)	Number of milliseconds to wait for the FTP process to complete; range 300–2147483647; default 480000

3. Click OK.

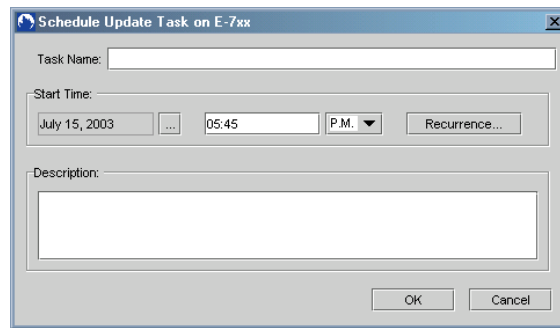
The backup task is added to your list of tasks and appears in the table on the Scheduled Tasks tab.

Add Update Task

To add an update task:


1. From the Scheduled Tasks tab, click Add Update.

The Schedule Update Task dialog box appears. Note that the name of the device associated with this task is listed in the title bar.



2. Set the parameters (Table 30).

Table 30: Schedule Update Task Parameters

Parameter	Description
Task Name	Name of the scheduled tasks; 1–64 characters
Start Time	Current time and date appear when the dialog box opens. Change the date by clicking the  . See <i>Related Dialog Boxes</i> on page 143.
Recurrence	Set recurring task patterns by clicking the Recurrence button. See <i>Related Dialog Boxes</i> on page 143.
Description	Description of the task; 0–1024 characters

3. Click OK.

The update task is added to your list of tasks and appears in the table on the Scheduled Tasks tab.

Modifying and Removing Tasks

This section describes how you view, configure, delete, and deactivate update and backup tasks using the NMC-RX application. You can perform these actions and list active schedules from several starting points:

From the Configuration menu in either the Device Workshop or Network Workshop, right-click, and select List All and Active Schedules. The list of active schedules appears in the list area.

In the Device Workshop, right-click on the system folder from either the Interface Explorer or Device-wide Explorer and select List All and Active Schedules. The list of active schedules appears in the list area.

From the Schedule Tasks tab, you can configure the parameters of existing update and backup tasks or permanently remove a scheduled task. You have the option of deactivating a task without deleting it. You can make the task active again whenever you decide.

Viewing Active Schedules

You can view active schedules for either a device or for all network devices.

Viewing Active Schedules for a Device

To view active schedules for a device:

1. In the Network Workshop, select a device.
2. Right-click, and select List All and Active Schedules.

A list of active schedules associated with that device appears in the list area.

3. From the list, click an active schedule, right-click, and select View.

The Scheduled Tasks tab appears.

Viewing Active Schedules for All Network Devices

To view active schedules for all network devices:

1. From the Configuration menu in either the Network Workshop or Device Workshop, right-click and select Active Schedules.

A list of all active schedules on the network appears in the list area.

2. From the list, select an active schedule, right-click, and select View.

The Scheduled Tasks tab appears.

Deactivating an Active Schedule

To deactivate an active schedule:

1. List tasks in the work area. (See *Viewing Active Schedules* on page 141.)
2. Perform either of the following steps:
 - a. From the list, select an active schedule, right-click, and select Deactivate.

The task is removed from the list of active tasks in the list area.
 - b. On the Schedule Tasks tab, clear (uncheck) the Active box next to the task you want to deactivate, and click Save.

The task is deactivated.

To reactivate an inactive schedule:

1. Select the device for which you want to reactivate a task, right-click, and select Schedule Tasks.

The Schedule Tasks tab appears.

2. Click the Active box next to the task that you want to reactivate.
3. Click Save.

The update or backup task becomes active.

Removing an Active Schedule

To remove an active task:

1. From the Schedule Tasks tab, click the task that you want to remove.
2. Click Remove.
3. Click Save.



NOTE: You can also remove a task by clicking on a task in the list area, right-click, and select Delete. When the Confirm Delete dialog box appears, click OK.

Related Dialog Boxes

Schedule Recurrence The Schedule Recurrence dialog box appears when you click the Recurrence button on the Schedule Backup Task or Schedule Update Task dialog boxes. Use the Schedule Recurrence dialog box when you want to set a recurring pattern for an update or backup task.

1. Select the Start Time. (See *Select Date* on page 145.)
2. Select the Recurrence Pattern (None, Daily, Weekly, Monthly) by clicking the appropriate radial button. See Table 31 on page 144.

The Schedule Recurrence dialog box changes depending on your selection. See the following examples.

The screenshot shows the 'Schedule Recurrence' dialog box. The 'Start Time' is set to July 17, 2003, at 02:45 P.M. The 'Recurrence Pattern' section has the following options:

- None
- Every 1 day(s)
- Daily
- Weekly
- Monthly
- Every Weekday

 The 'Range of Recurrence' section has:

- No end date
- End after: [] occurrences
- End by: July 31, 2003

 Buttons for 'OK' and 'Cancel' are at the bottom right.

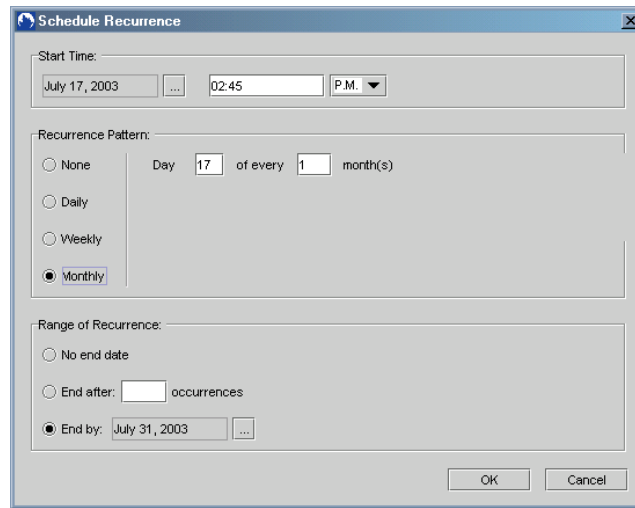
The screenshot shows the 'Schedule Recurrence' dialog box. The 'Start Time' is set to July 17, 2003, at 02:45 P.M. The 'Recurrence Pattern' section has the following options:

- None
- Recur every 1 week(s)
- Sunday
- Monday
- Tuesday
- Wednesday
- Weekly
- Thursday
- Friday
- Saturday
- Monthly

 The 'Range of Recurrence' section has:


- No end date
- End after: [] occurrences
- End by: July 31, 2003

 Buttons for 'OK' and 'Cancel' are at the bottom right.




3. Set the parameters (Table 31).

Table 31: Schedule Recurrence Parameters


Parameters	Description
Start Time	Start date and time of the first occurrence of this recurring task. The default start date and start time are the start date and time when the dialog box is activated.
Recurrence Pattern	
None	Default. The task does not recur.
Daily	Number of days that may pass before repeating this task in a daily recurring schedule.
Weekly	Number of weeks that may pass before repeating this task in a weekly recurring schedule.
Monthly	Number of months that may pass before repeating this task in a monthly recurring schedule, and the day of the month on which the task will recur.
Range of Recurrence	
No end date	The task will continue to be done indefinitely.
End after: xxx occurrences	Number of times this scheduled event should occur before the series ends.
End by	Set a specific end date by clicking  . In this section, see <i>Select Date</i> dialog box.

4. Click OK.

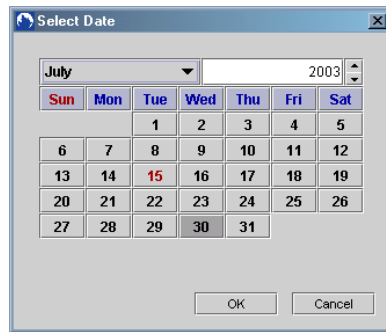
The recurrence pattern is selected for the backup or update task. To begin the recurring pattern that you chose, click Save located above the Schedule Tasks tab.

Select Date The Select Date dialog box appears when you click  on the Schedule Recurrence dialog box. Use the Select Date dialog box when you want to set a start or end date for an update or backup task. The start or end date includes a month/day/year combination.

The text of the current day is always displayed in red. The current selected date is displayed with a gray background. To set the year, toggle the year by typing the text in to the year text box, or use the toggle arrows.

1. From the Schedule Tasks tab or the Schedule Recurrence dialog box, click .

The Select Date dialog box appears.



2. Select the month, day, and year.
3. Click OK.

The start or end date is set. To begin the recurring pattern that you chose, click Save located above the Schedule Tasks tab.

