



# Motion Detection Configuration:

## Motion Only Recording + Continuous loop via schedules

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# What exactly IS Motion Detection?

- Motion Detection is the ability to detect motion by the camera. A Camera indentifies motion based on pixel and luminosity changes within an image. A camera must support motion detection for you to be able to set up and use the motion detection functionality in VSM.
- The goal in setting up motion detection events is to detect and record everything of interest while excluding everything that is not of interest.

# Why configure Motion Detection AND full time recording? What is required?

- Typically this is configured to save archive space on the server.  
During the day/business hours, you want to record everything,  
At night/off hours, you just want to record motion events.

Example: A school has almost constant activity during school hours, full time recording is suitable for that time, but the hallways are all but empty at night, therefore motion based recording would be sufficient.

- This configuration will require TWO archives.  
One for the Recurring Schedule (typically “day” or business hours)  
One for the Motion Events (typically “night” or non-business hours)

# Motion Detection Events, how do they work?

- A 5 minute long loop is created for the motion detection event archive (1-hour pre 6.3.x)
- If an event (ie, motion trigger) occurs, the time is noted in the VSOM database
- The video frames around the time of the event are "flagged" on the media server.
- When the 5-minute loop moves beyond the time of the event, the groomer would normally delete the old video to make room for the new. But because those frames are flagged, they remain on the disk.
- These flagged/saved files are in 5 minute increments. If the event lasts 10 seconds, we save the whole 5 minute clip etc.
- Please note, the length of each event saved to the media server includes the amount of time that you set for your seconds before and after the event.

# Caveats with regards to scheduling

- Due to defect **CSCtg53607**: cannot **schedule** recording from 11:59 - 00:00
- You cannot configure a schedule to pass midnight. For example, if you will schedule motion only recording from 5pm to 8am, your schedule will need to look like this:

The screenshot shows the 'Add a New Schedule' window with the 'Recurring' tab selected. The 'Recurring Schedule' section is active, with the radio button 'This is a Recurring Schedule' selected. The 'Action' is set to 'Enable'. The 'Start on' date is '1/27/2010'. Under 'Assign time range to these week days:', Monday, Tuesday, Wednesday, Thursday, and Friday are checked. Two time ranges are defined: one from 00:00 to 07:59, and another from 17:01 to 23:59. The 'Range End' section has 'No End Date' selected.

**Add a New Schedule**

Details | Simple | **Recurring** | Rights

**Recurring Schedule**

This is a Recurring Schedule

Action: **Enable** ▼

Start on: 1/27/2010

**Assign time range to these week days:**

Sunday  Monday  Tuesday  Wednesday  
 Thursday  Friday  Saturday

Start At: 00 : 00 Stop At: 07 : 59  
Start At: 17 : 01 Stop At: 23 : 59 Remove

Add Time Range Next Weekdays

**Range End:**  End After 1 Occurrences  
 End By: 1/27/2010  
 No End Date

# Caveats with regards to scheduling (cont)

- Due to defect **CSCtg53626**: Scheduled archives for the same start time take minutes to start

There are a limited amount of archives that can be started at one time. (approx 23, this is based on the speed of your server)

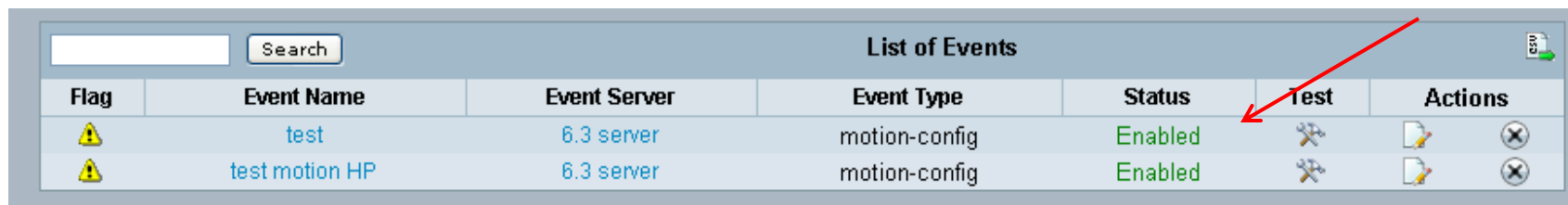
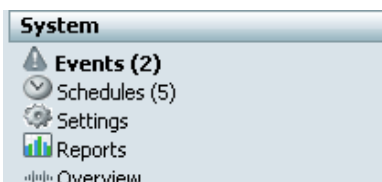
You can stagger the start and stop times of your scheduled archives so that you can avoid this issue with the one exception being overnight scheduling, as they all need to stop at 23:59, and start at 00:00 due to the previous defect

Therefore:









Combine the above with the defect on the previous slide, and you can only have **23** cameras configured with the split motion + full time schedule that passes midnight

# Events ARE recording when they are “Enabled” in the events page

- When you configure an event if the status is “Enabled” that event is recording on motion. (regardless of the times in your schedule)
- Therefore, you will need to set the default status of the event to “Disabled”, then, during the scheduled times, it will automatically change status to “Enabled”
- Under Admin -> System -> Events you see the Status of the event

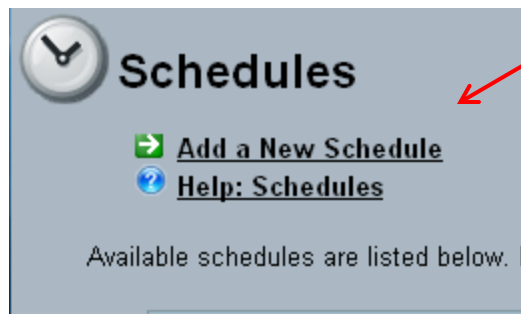
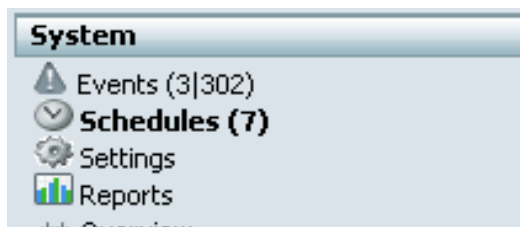


A screenshot of a "List of Events" table. The table has a search bar at the top left and a "List of Events" title at the top right. The table columns are: Flag, Event Name, Event Server, Event Type, Status, Test, and Actions. There are two rows of data, both with a yellow warning flag icon. A red arrow points to the "Status" column of the first row.

Flag	Event Name	Event Server	Event Type	Status	Test	Actions
	test	6.3 server	motion-config	Enabled		 
	test motion HP	6.3 server	motion-config	Enabled		 

# Step by Step Configuration, Part 1: Configuring the Motion Recording (page 1)

- **Motion only recording:** motion events are recorded and saved when they occur during the scheduled time. This is the “motion only recording” portion of your day.  
Please see Part 2 for the hours that are **not** in the schedule you create here which you will record “full-time”.
- Log into VSOM Admin
- Under System, click on Schedules
- Click on Add a New Schedule





# Step by Step Configuration, Part 1 : Motion Only Recording (page 2)

- Name your schedule and create a description
- Set the status to **Enabled**, this status is for whether the schedule itself is enabled/disabled, NOT for the event.

**Edit Schedule: AfterHours**

Details | Schedule | Entity | PTZ Actions | Rights

**Schedule Details**

\*Name:

Description:

\*Status:  ▼

# Step by Step Configuration, Part 1 : Motion Only Recording (page 3)

- Select the radio button for recurring schedule
- Change the days/times to match the times you want to the schedule to record motion. **(see caveats)**

### Add a New Schedule

Details Simple **Recurring** Rights

#### Recurring Schedule

This is a Recurring Schedule

Action:

Start on:

**Assign time range to these week days:**

Sunday  Monday  Tuesday  Wednesday  
 Thursday  Friday  Saturday

Start At:  :  Stop At:  :   
Start At:  :  Stop At:  :  [Remove](#)

**Range End:**  End After  Occurrences  
 End By:   
 No End Date

# Step by Step Configuration, Part 1: Motion Only Recording (page 4)

- Change your roles as necessary
- Submit Changes

**Add a New Schedule**

Details Simple Recurring **Rights**

**Role Rights**

Select access rights for this role.

Name	Rights		
	None [All]	View [All]	Manage [All]
Administrator	<input type="radio"/>	<input type="radio"/>	<input checked="" type="radio"/>
Operator	<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>
test	<input type="radio"/>	<input checked="" type="radio"/>	<input type="radio"/>

Submit

# Step by Step Configuration, Part 1: Motion Only Recording (page 5)

- The Entities page will automatically appear next
- You can choose which entities to apply this schedule to now, or you can choose the schedule from the event setup when you configure the event
- Click Submit

**Add a New Schedule: Schedule Entities**

**Entities**

**Entity**

Please select entities below :

**[-] Events**

- hollytest
- motion event page
- soft-fortyfivehundred\_23

**[-] Roles**

- Administrator
- Operator
- test



**[-] Users**

- holly
- test
- test1

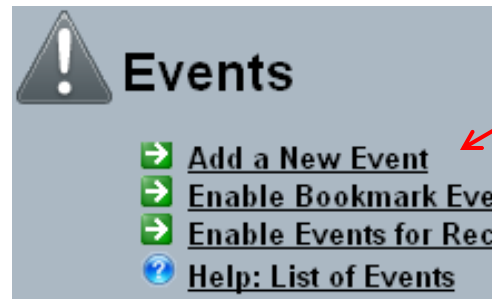
**Submit**

# Step by Step Configuration, Part 1: Motion Only Recording (page 6)

- You should now see the schedule listed and **Enabled**

Schedules				
Name	Type	Description	Status	Actions
AfterHours	Simple	schedule for motion recording after hours regular hours are 8-5 after hours will be 00:01-07:59 and 17:01-23:59	Enabled	 

- Next Steps, add an Event, and associate schedule to event
- Under System, click on Events
- Click on Add a New Event



# Step by Step Configuration, Part 1: Motion Only Recording (page 7)

- Configure your settings for your Event

- Set the Status to **Disabled**

- Enable Motion configuration

- Choose your camera feed from the dropdown

(if you don't see your feed in the dropdown, you didn't enable motion detection on the feed itself)

- Click Submit

The screenshot shows a web interface for configuring an event. At the top, there are three tabs: 'Details', 'Setup Rights', and 'History Rights'. The 'Details' tab is active. Below the tabs is the 'Event Information' section, which contains the following fields:

- \*Event Name: 2421-Motion
- Description: (empty text area)
- \*Server: VSM-BXB (dropdown menu)
- Status: Disabled (dropdown menu, highlighted in red)
- Default Flag: Flags (dropdown menu) with a warning icon

Below the 'Event Information' section are three radio button options for triggering the event:

- Device Trigger: An external device connected to this server can trigger an event.
- Enable Soft Trigger: An external program can request a URL to trigger an event.
- Enable Motion configuration: Allows actions to be configured on an motion detection event.

At the bottom of the form, there is a field for \*Feed: 2421 (dropdown menu).

# Step by Step Configuration, Part 1: Motion Only Recording (page 8)

- In the Details tab, set the default status to **Disabled**

**Edit an Event: 2421-Motion**

Details | Motion Config | Motion start | Motion stop | Schedules | Setup Rights | History Rights

**Event Information**

Event Name: 2421-Motion

Description:

Server: VSM-BXB

Status: **Disabled** ▼

Default Flag:  ⚠

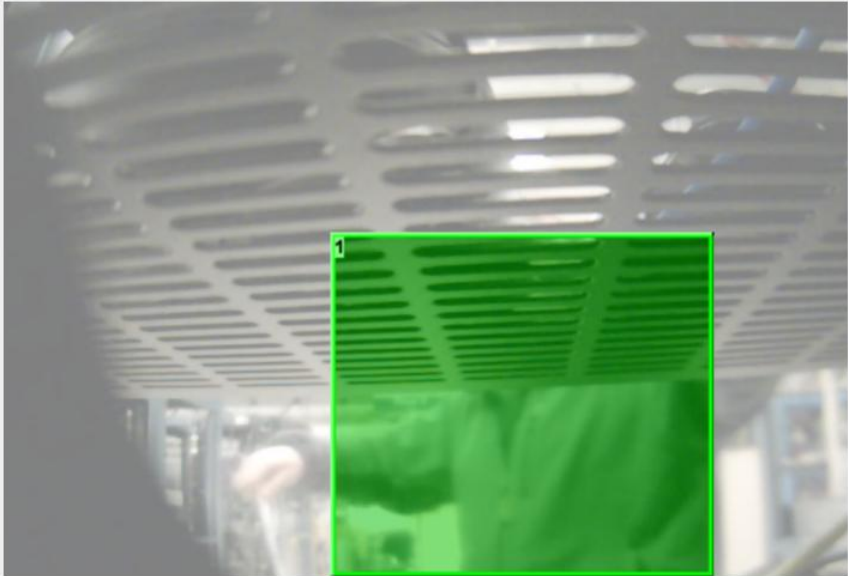
# Step by Step Configuration, Part 1: Motion Only Recording (page 9)

- Configure your motion detection regions in the Motion Config tab
- Ensure that you set the sensitivity to a point where if there is motion within your motion window, the status changes from Inactive to Active, and the window shows a green overlay
- Best Practices:

Small windows focused on a limited area of interest (doors, hallway intersections, etc) work best to ensure that your field of interest will go “active” when you need it to.

You will want to have someone who can walk “through” your window for you while you are configuring the settings.

You may need to adjust the sensitivity multiple times until you find the setting that works best for this specific event.



The screenshot shows a video feed of a hallway with a green rectangular motion detection window overlaid on the ceiling. Below the video is a configuration panel with the following sections:

- Window Properties:**
  - Window ID: 1
  - Buttons: New, Delete, Mask Window (checkbox)
  - Sensitivity: A slider ranging from Less to More.
  - Status: Active
  - Object Size: min and max sliders.
  - Persistence: 0 s
- Global Properties:**
  - Show Grid button



# Step by Step Configuration, Part 1: Motion Only Recording (page 10)

- In the Motion Start Tab, go to the Archives tab
- Check the box for Start Archives
- If you select the feed name in the **top box**, a 5-minute loop will **automatically** be **created** for this event.  
(if you had previously configured an archive for use for the motion detection event you would find that in the bottom box. **DO NOT** choose from both boxes)
- Choose the seconds you wish to be included as part of the motion detection recording before and after the event
- Choose how long you want to store the archived events on the media server for

Details Motion Config **Motion start** Motion stop

Operator View **Archives** Alerts PTZ Presets

**Start Archives**

Below is the list of feeds available on the server: VSM-BXB.  
Up to 10 feeds can be archived per event. Select any existing medi

- 2421 (MPEG-4 @ 1024 )
- aabosch (MPEG-4 @ 1024 )
- abosch (MPEG-4 @ 3000 )
- bbosch (MPEG-4 @ 768 )
- cbosch (MPEG-4 @ 1024 )

Below is a list of all running archives.  
Upto 10 archives can be clipped per event.  
Note: Event clipping for already triggered events on this setup will b

- 2141 test archive
- 120-day Loop

**Data Options**

Duration in seconds before the event occurs :

Duration in seconds after the event occurs :

**Storage Options**

Store each archive for:  Days.

# Step by Step Configuration, Part 1: Motion Only Recording (page 11)

- In the Schedules tab, set the Default State to **Disabled**, this will turn the recording of the events OFF when the schedule is not running, the schedule will automatically Enable the event at the schedules start times
- Select the Recurring Schedule that you created earlier. You will see the details of the schedule displayed below.
- Click Submit

Edit an Event: 2421-M

Details   Motion Config   Motion start   Motion stop   **Schedules**

Pre-defined schedules can be modified or removed in the "[Schedules](#)" page.

\*Default State: **Disabled** ▼ State to return entities to when the schedule is not running.

**Simple Schedule**

Assign To Schedule: --No Schedule-- ▼

**Recurring Schedule**

Assign To Schedule: **AfterHours** ▼

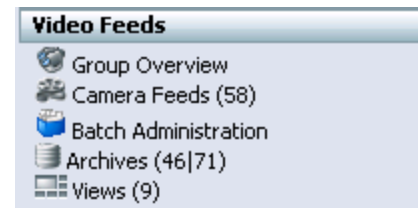
Starting Wednesday 27 January, 2010 00:00:00  
Enabled: Monday 00:00 - 07:59, 17:01 - 23:59  
Enabled: Tuesday 00:00 - 07:59, 17:01 - 23:59  
Enabled: Wednesday 00:00 - 07:59, 17:01 - 23:59  
Enabled: Thursday 00:00 - 07:59, 17:01 - 23:59  
Enabled: Friday 00:00 - 07:59, 17:01 - 23:59  
No End Date

**Submit**

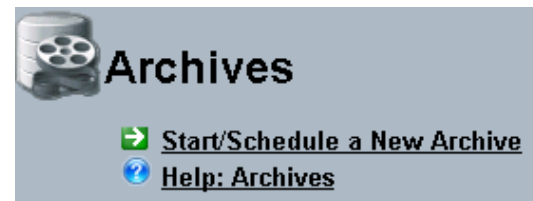
# Step by Step Configuration, Part 2: Scheduled Recurring Archive (page 1)

- **Scheduled Recurring Archive:** System generates recurring archives of the specified duration at the specified times. This is what you use for the “full time recording” portion of your day.

- Under Video Feeds click on Archives



- Click on Start/Schedule a New Archive



# Step by Step Configuration, Part 2: Scheduled Recurring Archive (page 2)

- Choose your feed you wish to record from the list



# Step by Step Configuration, Part 2: Scheduled Recurring Archive (page 3)

- Enter your specific info. It's good to have a detailed description for quick reference (do NOT click submit yet)

### Start/Schedule a New Archive

Details | Archive Type | Backup | Rights

**Archive Information**

\*Archive Name:

Description:

\*Status:

\*Force Start:  (Media Server version > 6 only)

\*Keep on Server:  after the recording has finished.

**Archive Source**

Camera Feed:

# Step by Step Configuration, Part 2: Scheduled Recurring Archive (page 4)

- Click on the Archive Type tab and enter the time information opposite of what you entered in the motion schedule in Part 1. Remember, this is for the portion of the day that will be a full-time continuous recording.
  - \*\*\* note: do not overlap minutes! If the previous schedule for motion detection ends at 07:59 this schedule needs to start at 08:00 \*\*\*
- Click Submit

**Start/Schedule a New Archive**

Details | **Archive Type** | Backup | Rights

**Archive Type**

Simple Schedule  Recurring Schedule  Continuous Loop

Start on: 2/2/2011

**Assign time range to these week days:**

Sunday  Monday  Tuesday  Wednesday  Thursday  Friday  Saturday

Start At: 08 : 00 Stop At: 17 : 00

**Range End:**  End After 1 Occurrences  
 End By: 2/2/2011  
 No End Date

# Congratulations!

- You have now successfully configured your VSM for full time recording during one portion of your day, and to record only motion events during another portion of your day!

