# United VMS 7.0
# Release Notes

## Latitude/Horizon/Meridian

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Ver. 2.0          20 October 2015

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# 1 Introduction

United VMS 7.0 is the latest software release for DVTEL's VMS platform, covering Latitude NVMS and the Horizon and Meridian NVRs. In United VMS 7.0, DVTEL strives for the simplicity and consistency of reinforcing DVTEL's position as an industry leader in the IP surveillance market. Some of the highlights are:

- Completely upgraded "EZ Client" Web Client with a sleek and efficient interface, providing a simple user experience and allowing for effortless deployment, the EZ Client supported on multiple operating systems and browsers.
    - Providing optimal viewing experience by allowing for fluid resizing and positioning of content based on the device type and screen resolution using responsive web design.
    - Optimized for touch functionality to support users accessing the content from the widest range of devices, including PC touchscreens and tablets.
    - Camera Catalog with scene thumbnails replaces the traditional camera tree and provides a quick glance at your cameras.
- Powerful Thumbnail search option in Control Center and Web Client for quick and easy playback investigation.
- Digital zoom indication in Control Center for PTZ zoom functionality.

# 2 New Features

## 2.1 Simplicity and Consistency

Version 7.0 continues to utilize the United VMS platform, including Latitude, Horizon and Meridian. While maintaining scalability and expandability, United VMS 7.0 introduces a new feature level of simplicity. With the addition of the new EZ Client interface, United VMS 7.0 cuts down deployment and upgrade time, training efforts and cost.

## 2.2 EZ Client Web Interface

The enhanced and modern EZ Client web interface was developed to foster simplicity and efficiency. Users will be able to utilize this application with any of the DVTEL NVMS or NVR systems.

Major features include:

- Informative Camera Catalog
- Dynamic Live Camera Layout
- Playback and thumbnail search

Optimized for touch functionality, the United VMS 7.0 EZ Client is a lightweight, browser-based application that is supported by multiple browsers and operating systems. This allows users to experience full functionality, including additional features such as video and snapshot export, notification center and user-specific settings on their choice of browser. It will also allow for reducing costs of OS licenses by being able to deploy on any operating system and device, including touch screen PCs.

## 2.2.1  Major Features

### 2.2.1.1  Informative Camera Catalog

EZ Client comes equipped with an informative and convenient Camera Catalog that provides a quick glance at your cameras. Using the Camera Catalog, the user sees a thumbnail picture of all the available scenes in order to choose which cameras to view.

The scene thumbnail is updated periodically to reflect the most updated camera scene, allowing users to accurately select the right camera as needed.

Each thumbnail in the Camera Catalog displays additional data on the camera that allows users to quickly capture the important information of the scene:

- Camera name
- Recording status icon
- Icon indicating PTZ camera
- Snapshot of camera view
- Disconnect status
- Number of cameras being viewed
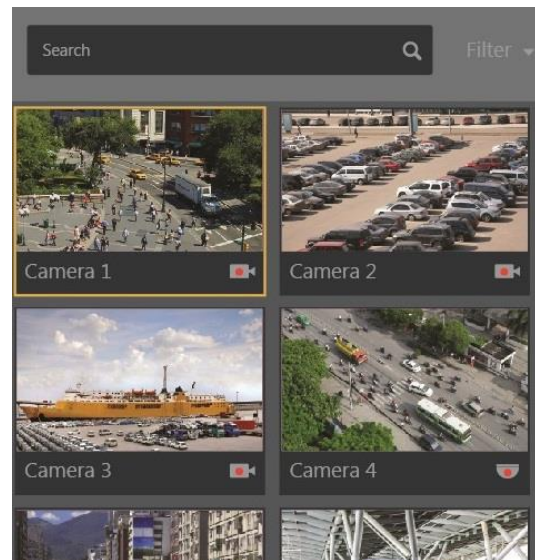


**Figure 1: Camera Catalog**

### 2.2.1.2  Camera/Site Filter

The camera Catalog includes a powerful search and filter field for promptly locating and displaying desired cameras. The user is given the ability to search large catalogs via camera name and to filter searches by specific sites *(Fig. 2)*. This allows the user to locate the desired scene in a quick and efficient manner, without spending valuable time searching.
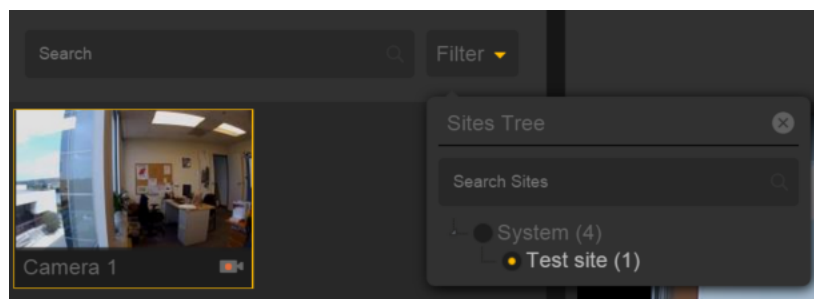


**Figure 2: Camera/Site Filter**

### 2.2.1.3    Dynamic Live Camera Layout

Cameras are selected by simply clicking on the desired scene from the Camera Catalog. Selected cameras are automatically fitted into the viewing section of the webpage *(Fig. 3)*. As additional cameras are selected, the layout will dynamically readjust, fitting the cameras into an easy-to-navigate view.
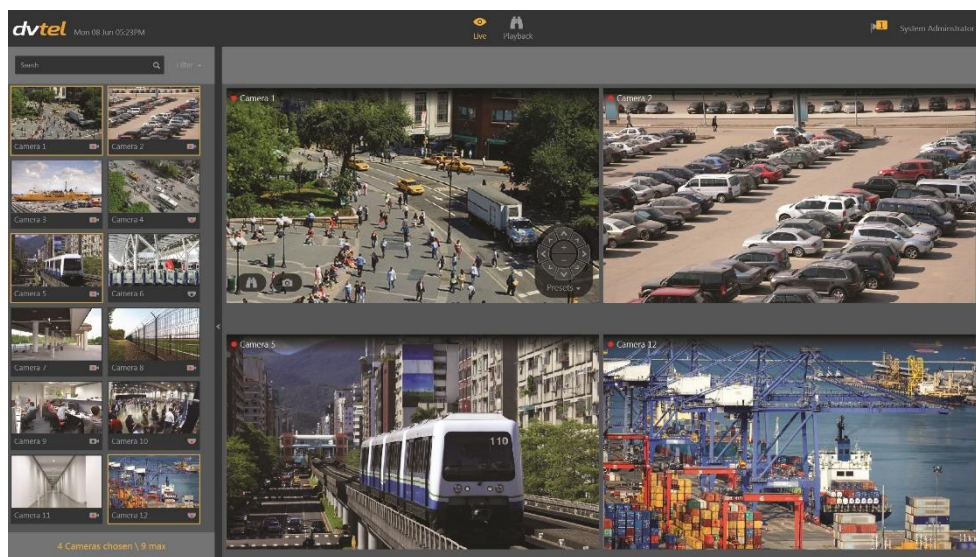


**Figure 3: Live Camera Layout**

Each scene has the option to be maximized. In this mode, EZ Client displays the remaining selected cameras as Camera Preview Icons below the maximized view. This allows the user to flip through the live scenes with the use of arrow keys or by simply swiping with one finger on a touch screen monitor or table *(Fig. 4)*.
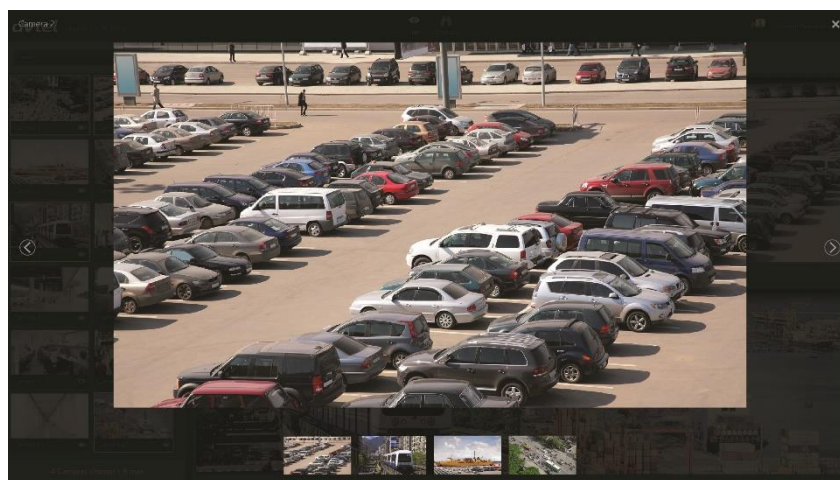


**Figure 4: Maximized Live View**

### 2.2.1.4    Playback and Video Export

The United VMS 7.0 EZ Client is not only a live video monitoring tool. It comes equipped with a fully functional and intuitive playback and export function.

Choosing the Playback icon either from the top of the web page or the lower left corner *(Fig. 5)* of a live video tile, takes you to Playback View.

Figure 5: Playback Icon

Playback View gives the user the ability to:

- Efficiently select a desired search time frame.
- Seamlessly choose the desired scene.
- Easily jump through the timeline.
- Quickly adjust the searched time interval through the timeline
- Simply navigate the thumbnail search.
- Effortlessly export and download video.
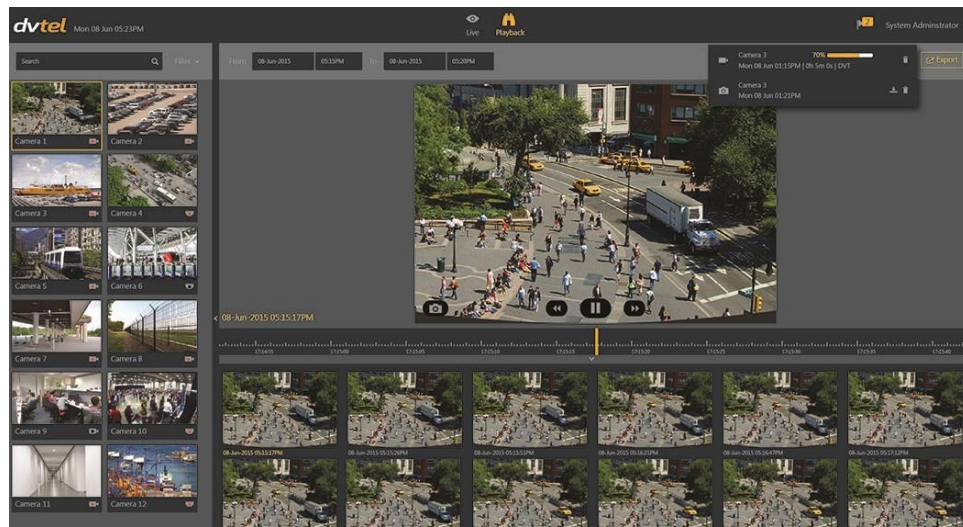

Figure 6: Playback Mode

Playback mode transforms EZ Client from a basic monitoring tool into a simple, yet fully functional monitoring and investigative application. This allows for:

- Easy access to recorded material, in addition to live footage, from any authorized device without requiring deployment of 'thick clients'.
- Quicker clip retrieval from any connected device with a modern browser.
- Easy view, identify and export functionality for quick and simple investigative actions.

#### 2.2.1.4.1 Thumbnail Search

Playback mode has the option to search through footage using the thumbnail search capability. This allows a user to conveniently browse through thumbnails search results from a desired time frame *(fig. 7)*, to quickly and accurately identify the desired footage, and immediately export a clip.
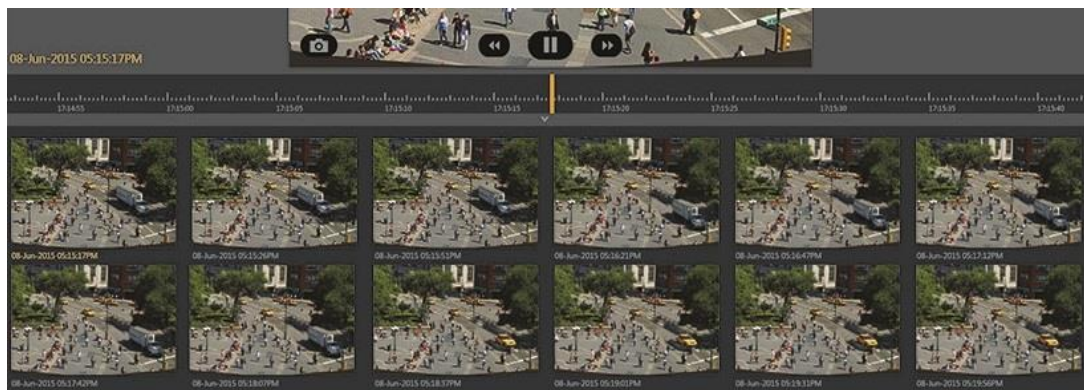

**Figure 7: Thumbnail Search**

#### 2.2.1.4.2 Video Export

Once the desired footage is located in Playback View, the user can select their desired format and then is able to conveniently export a clip for later use. Once the export is initiated by clicking on the Export icon, the notification section displays the export status and allows to download once export is completed *(Fig. 8)*.
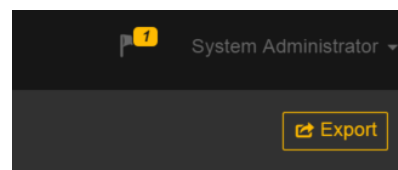

**Figure 8: Video Export**

Note: Export to AVI is not supported for resolutions above 720P. Export to DVT is recommended for optimal video quality, export time and file size. Maximum export time for either format is 4 hours.

## 2.2.2 Additional Features

### 2.2.2.1 Notification Center

The United VMS 7.0 EZ Client includes an easily accessible notification center, which allows the user to review statuses, download and delete exported video and snapshots.

When a user initiates an export or snapshot, the system places the files in the notification center, which then displays a number, indicating how many jobs are present *(fig. 9)*. The user can expand this section to view the status of the individual jobs and download or delete when they are completed. This give the user the ability easily access information pertaining to their export jobs. It also provides a simple way to download jobs when needed.
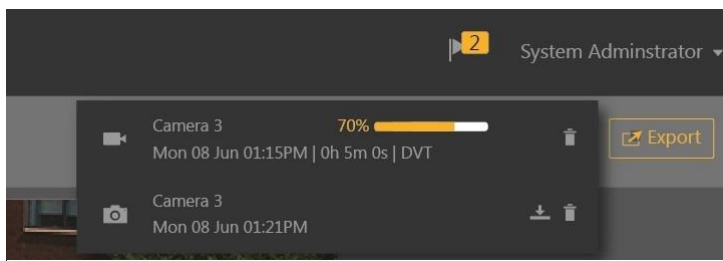

**Figure 9: Notification Center**

### 2.2.2.2 Snapshots

Users can take and export snapshots from the camera scene during both live and playback modes. This is accomplished by simply hovering over a live or playback scene, the tile shows a small camera icon in the bottom left corner *(Fig. 10)*. Clicking this icon sends a request to the export queue, which can then be accessed by clicking the notification section on the upper right corner of the webpage.

**Figure 10: Snapshot Icon**

### 2.2.2.3 PTZ Control

Users can take full advantage of PTZ camera capabilities. When a camera is recognized to have PTZ functions, it can be identified by the PTZ icon in the camera catalog. Bringing this camera into live view and placing the cursor over the scene will expose the PTZ controls *(Fig. 11)*, as well as the ability to select predefined PTZ presets.

**Figure 11: PTZ Controls**

## 2.2.3  Transcoder

### 2.2.3.1  Transcoder Specification

The EZ Client depends on the Transcoder, and its physical CPU resources for streaming performance. Please use the guideline below as a resource for evaluating Transcoder specifications:

| Processor Specifications: Latest Intel V3 and up, with 3.0 GHz minimum | Number of streams supported for Live viewing with Adaptive Streaming (camera sending D1 stream) | Number of streams supported for Playback or Live w/o Adaptive Streaming (camera sending 1080p 15 FPS) |
|---|---|---|
| Per physical CPU core | 6 streams | 3 streams |

**Examples:**

The tables below describe the number of streams that the Transcoder will support for the EZ Client in the following scenarios:

*Example 1:*

| Meridian 2TB<br>*Intel Core i3*<br>*3.6 GHz, 4GB*<br>*Intel HD Graphics 4400* | Number of streams supported for Live viewing with Adaptive Streaming (camera sending D1 stream) | Number of streams supported for Playback or Live w/o Adaptive Streaming (camera sending 1080p 15 FPS) |
|---|---|---|
| EZ Client on a dedicated Workstation connecting to Meridian 2TB | 12 streams | 6 streams |
| Meridian 2TB w/ EZ Client on the same machine | 7 streams | 3 streams |

*Example 2:*

| Horizon Workstation:<br>Intel Xeon E3-1220 V2<br>3.10 GHz, 8GB<br>NVIDIA NVS 310 | Number of streams supported for Live viewing with Adaptive Streaming (camera sending D1 stream) | Number of streams supported for Playback or Live w/o Adaptive Streaming (camera sending 1080p 15 FPS) |
|---|---|---|
| EZ Client on a dedicated Workstation connecting to Horizon Workstation | 24 streams | 12 streams |
| Horizon Workstation w/ EZ Client on the same machine | 14 streams | 6 Streams |

The above reference assumes default DVTEL video settings for Adaptive Streaming cameras.

Adaptive Streaming allows the Transcoder to utilize a lower resolution stream. This optimizes the process and puts a reduced load on Transcoder resources, allowing for more streams to be supported. For more information on Adaptive Streaming, see **Section 2.4: Adaptive Streaming**

For a list of supported Adaptive Streaming devices, see **Section 2.4.1: Supported Adaptive Streaming Devices**

Note: In case of a multiple Transcoder setup or a Transcoder that is not on the same machine as the Web Server, the external IP of the Transcoder must be configured in order for it to serve the EZ Client. If the Transcoder is on a local network, the external IP field should be set to be the same as the local Transcoder IP address.

## 2.3 Improved ControlCenter User Experience

### 2.3.1 Thumbnail Search

United VMS 7.0 Unified ControlCenter been enhanced with a new thumbnail search functionality. A user can choose a scene and set a time period and interval for the clips. The user can then view screen clipped thumbnails to easily identify the specific section of the timeline that is desired (*Fig. 12*).
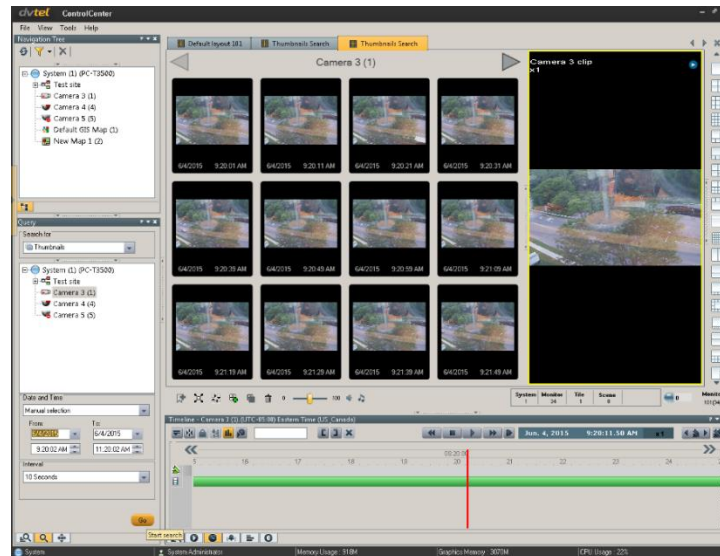


**Figure 12: Thumbnail Search - Control Center**

When the area of interest has been selected, the user can use the zoom functionality to select that area, dynamically adjusting all thumbnails to zoom into the selected time period *(Fig. 13)*. This allows the user to focus solely on that area without having the rest of the scene being a distraction in the                                      thumbnail search.
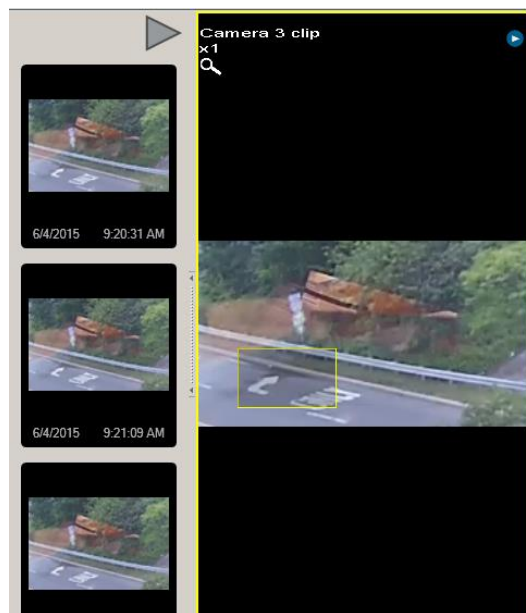


**Figure 13: Thumbnail Search Zoom - Control Center**

### 2.3.2 Digital Zoom Indication

ControlCenter has been improved to include a digital zoom indication frame within the camera *(Fig. 14).* This allows the user to visually locate exactly where the digital zoom is cropped in relation to the entire scene. This functionality also allows the user to pan to another desired area of the scene with the PTZ controls to which the cropped section will move accordingly.
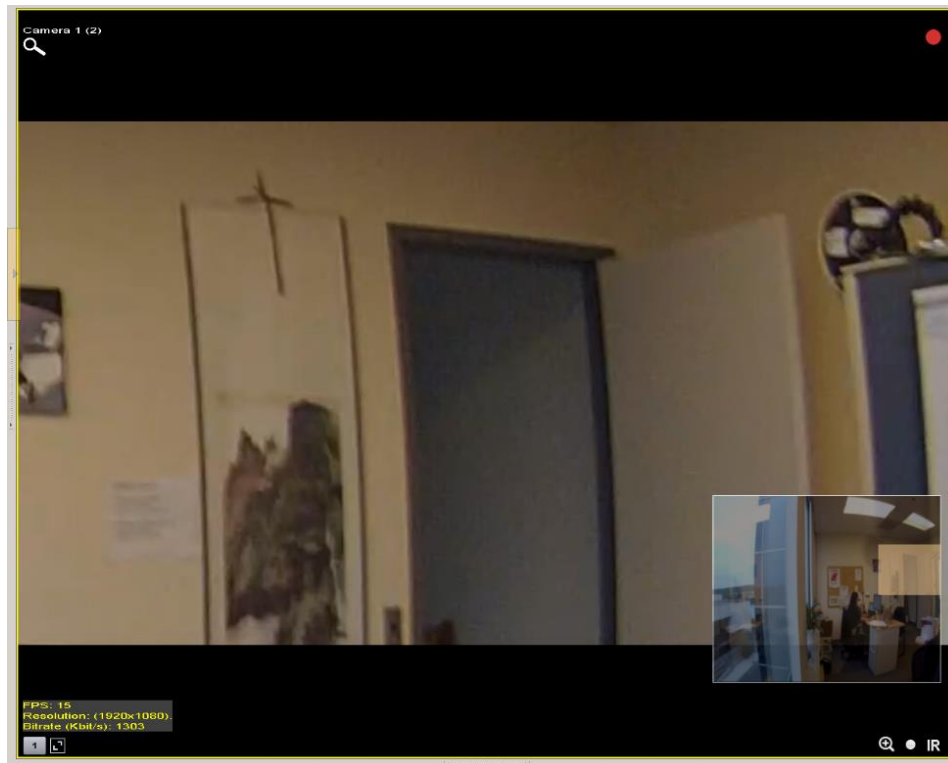


**Figure 14: Digital Zoom Indication**

This new feature allows the user to:

- Have a visual representation of the zoomed section in relation to the entire scene.
- Easily and quickly locate the region of interest and allows for swift reaction time.
- Pan to a different section of the scene using PTZ controls, tracking where the camera is zoomed, while still being able to view the entire scene.

### 2.3.3 System/Site Filter in Control Center

ControlCenter includes a filter for Systems and Sites. This feature is useful for deployments with multiple systems and sites. It makes for easy operation when monitoring many cameras across these systems, being able to search for cameras in a specific location.

### 2.3.4 Enhanced Connection to Multiple Systems by ControlCenter.

Support for monitoring more systems from a single Control Center. This addition will not only benefit large enterprise users, who can put this to use immediately, but also gives all sites the ability to grow and expand, and for DVTEL to expand along with them.

With this enhancement, ControlCenter is able to connect to up to 45 sites with a maximum of 10,000 cameras in total.

## 2.4 Adaptive Streaming

Adaptive Streaming utilizes system information to serve and display the optimal resolution and bit-rate for each viewing tile.

The benefits of Adaptive Streaming include:

- Optimizes bandwidth automatically and dynamically for each tile
- Enables you to display more streams simultaneously without burdening system resources
- Reduces the CPU load on the Transcoder, thus serving more Web Client and mobile users
- Improves functionality of ControlCenter, Mobile Client, Web Client, Archiver and overall system performance

### 2.4.1 Supported Adaptive Streaming Devices

The following DVTEL cameras are supported for Adaptive Streaming:

- Quasar Gen II cameras (Ultra HD and Quad HD cameras)
- Quasar cameras
- Ariel cameras (encoders are not supported)

For a list of supported firmware and models, see section A.1 DVTEL Edge Devices Certified Firmware

### 2.4.2 Adaptive Streaming Component

The Adaptive Streaming component chooses the most suitable stream for the current viewing tile according to the tile size. This provides the user with the best resolution available while optimizing system performance.

Adaptive Streaming reacts to the following user actions:
- Dragging the video to a different sized tile or changing the layout
- Maximizing the tile size
- Using digital zoom

For more information about Adaptive streaming, see the *United VMS 6 4 Adaptive Streaming Update - Release Notes* which can be found at: **http://www.dvtel.com/latitude-6-4-6-4-0-6800-release-notes-history/**

## 2.5 New Supported Features in Quasar Gen II

**Note**: This feature requires updating the firmware of the camera to version dt20150426NSZ or later. Refer to the firmware release notes for more information, found on the DVTEL website: **http://www.dvtel.com/services-support/firmware-software/**

1. Dual stream support for 4K/25fps and D1/25fps streams.
2. PAL/NTSC configuration support.
3. 90°/270° Rotate - the image can now be rotated 90° and 270° (16:9 portrait view, sometimes referred to as Corridor/Hallway Mode/Format), providing better coverage for long narrow scenes.

**Note:** On 4K models, the frame rate maximum is 15FPS when in corridor mode rotation.
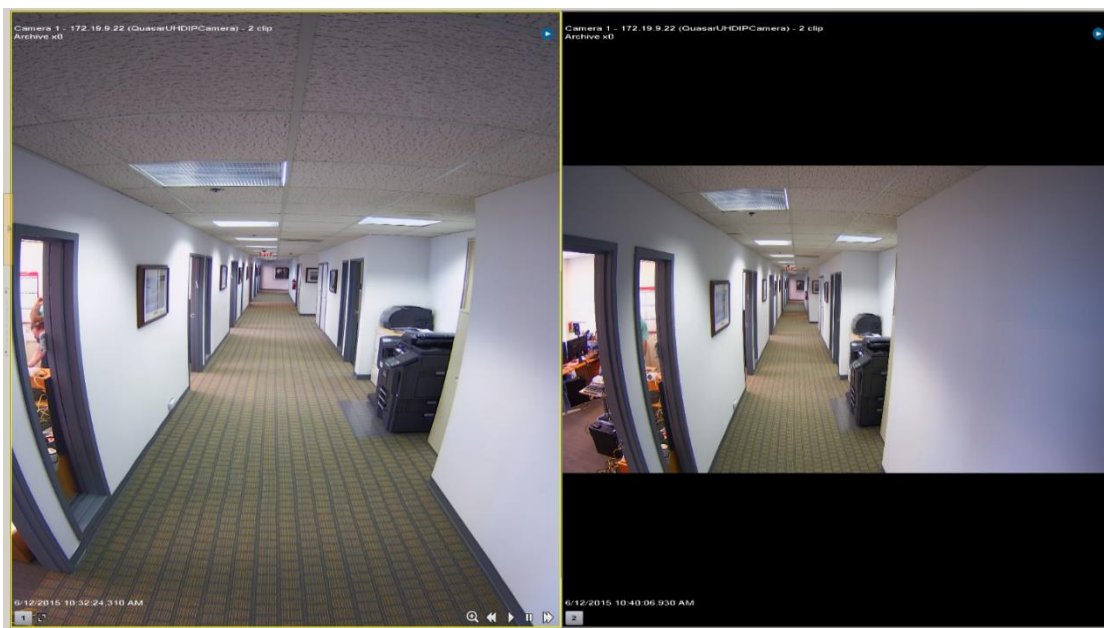


Figure 15: Corridor Mode

270° Rotate                                    0° Rotate

4. Adaptive Streaming Enhancement

   Using 4K UHD (Cx-6208) and QUAD HD (Cx-6204) models, Adaptive Streaming has been enhanced so that deployments requiring higher than 12/15FPS can also benefit from this technology.

   Using normal system Discovery, the frame rate is set to 15FPS, which allows all available encoders to be used. When setting higher frame rates, not all encoders can be active. The following table below shows the available resolutions at the indicated frame rates.

| Model Series | Configured Frame Rate | Available Resolutions | | | |
|---|---|---|---|---|---|
| 4K UHD | 26-30 | 4K | | | |
| | 16-25 | 4K | D1 | | |
| | 1-15 | 4K | 1080p | 720p | D1 |
| Quad HD | 26-30 | Quad HD (1440) | | | |
| | 16-25 | Quad HD(1440) | D1 | | |
| | 1-15 | Quad HD(1440) | 720p | D1 | |

## 2.6 ioi Thermal Fixed IP Analytic Cameras

Added support for the ioi Thermal CT-5322F/CT-5642F Fixed IP Analytic Cameras. This is applicable to the following products:

| Product Name | Description |
|---|---|
| CT-5322F | ioi Thermal QVGA fixed IP camera, 320 x 240 pixel array, with embedded video analytics |
| CT-5642F | ioi Thermal VGA fixed IP camera, 640 x 480 pixel array, with embedded video analytics |

For more information, see *ioi Thermal Fixed Analytic Release Notes.*

## 2.7 New supported features in ioi – Latitude Only

This feature adds support in Latitude for the ioi TRK-101 IP binding feature to include the Quasar QHD and 4K cameras and certain Axis, Bosch, and Sony cameras.

**Note: This feature will be supported in Latitude from firmware version 2.1.2.206 or later for the TRK-101. For further information please refer to release notes of firmware version 2.1.2.206 (2 1 2 206 Release Notes_v3).**

## 2.8 Support Audio via Multicast for Axis

VMS 7.0 has added support for audio via Multicast for Axis cameras when using the Axis proprietary plugin.

## 2.9 Mobotix Support

VMS 7.0 adds support for Mobotix Secure Series (by design) for the following functionality:

- MJPEG
- MxPEG
- Input/Output pins
- Motion Detection Configuration from Admin Center
- Automatic discovery (in addition to the already supported manual and IP range discovery).
- Dual streaming

Note: This support is added for Latitude, Horizon and Meridian. Please see *Mobotix 7.0 Support Release Notes.pdf* for more information

# 3 ONVIF Improvements

## 3.1 ONVIF Encoder Sorting

The VMS automatically assigns the streams based on the order they are reported from the camera. The first reported stream is used for Live and the second for recording.

**Note**: For advanced stream configuration, please contact your local support.

## 3.2 Faster Response of ONVIF Events

ONVIF event delays have been reduced, giving quicker response time when sending ONVIF events from the camera to the VMS. This allows for more accurate alarm triggering, motion detection, PTZ control and other event-related features.

## 3.3 PTZ Absolute Positioning

Absolute positioning allows the user to define a coordinate and control the PTZ by inputting positioning coordinates to send the PTZ to a specific location and zoom.

Supports 'Go to Location' and 'Get Location' operations via ONVIF.

## 3.4 Added ONVIF Edge Device Support

Supports input pin and motion detection events via ONVIF for Sony SNCHM662 360° camera.

## 3.5 Manual Iris PTZ

Adds the ability to manually manipulate a PTZ cameras iris when connected through ONVIF protocol from AdminCenter, ControlCenter and via SDK.

## 3.6 Manual Focus PTZ

Adds the ability to manually manipulate a PTZ cameras focus when connected through ONVIF protocol from AdminCenter, ControlCenter and via SDK.

## 3.7 Increased PTZ Presets

Adds support for up to 256 PTZ presets in the VMS for PTZ cameras connected though ONVIF protocol. For a camera that supports less than 256 presets, when it is assigned more presets than it supports, the camera will only respond up until the supported amount.

## 4 Installation/Upgrade instructions

The installation files of the VMS 7.0 software are provided by DVTEL in various forms, such as USB sticks or FTP links. Installing VMS 7.0 for the first time (fresh installation) and upgrading from previous versions is done using the same installation file.

## 4.1 Supported Upgrade Paths

The supported direct upgrade paths for VMS 7.0 are:

### 4.1.1 Latitude

- Latitude 6.3 (6.3.0.25)
- Latitude 6.3 Camera Pack 1 (6.3.0.41)
- Latitude 6.4.0.6800 and up

**Note**: Please refer to the *7.0 Installation instructions and clarifications* document for further information.

## 4.1.2 Horizon and Meridian

### 4.1.2.1 Horizon

- Horizon 6.3 (6.3.5.3800)
- Horizon 6.3 Service Pack 1 (SP1) (6.3.5.5200)
- Horizon 6.3 Service Pack 1 + HU for Ariel (6.3.5.5208)
  Horizon 6.4.0.68 and up

### 4.1.2.2 Meridian

- Meridian 6.3 (6.3.5.5200)
- Meridian 6.3 + MU for Ariel (6.3.5.5208)
- Meridian 6.4.0.68 and up

**Note:** All Horizon/Meridian Updates on top of 6.3 and 6.4 support the upgrade to 7.0

### 4.1.2.3 Upgrade Steps for Horizon/Meridian

1. A new license should be requested from operations before the upgrade.
2. Close the client applications before running the installation package.
3. Stop DVTEL services and install Windows updates.
4. Obtain the most recently released software file from the DVTEL Partner Portal (**http://partner.dvtel.com/software-firmware/software-downloads-upgrades/**).
5. Start by upgrading the server side of the system.
6. Open the containing folder and find *Horizon_7.0.0.exe* or *Meridian_7.0.0.exe*
7. Double click the .exe and allow the software to extract the DVTEL Installer.
   **Please keep in mind that DVTEL services will stop during this upgrade. Therefore, all cameras will be temporarily offline and will not continue recording until the completion of the upgrade.**
8. If not already installed, once the package is extracted, the Microsoft .NET 4.5.2 installer will begin. Follow the steps on the screen.
   Please be patient, as this process can take 15-20 minutes
9. If prompted by the Installer, please allow the server to reboot. The Installer will launch upon login.
10. Continue to follow the prompts on the screen as they appear. Additional reboots may be required.
11. When the Installer completes, open ControlCenter to re-license your server.
12. Once server upgrade has concluded, open ControlCenter over a remote client workstation and connect to the server. You will be prompted to upgrade to the new version. After accepting, the new version will be downloaded over the network and installed automatically without requiring any further input.

# 5   Requirements

## 5.1  Supported Operating Systems

The following operating systems are supported and can be used for running Latitude:

### 5.1.1  Supported Microsoft Windows® Operating System

| Operating system | Client | Server |
|---|---|---|
| Windows 7 SP1 - 64 bit* | X | X |
| Windows 8 -  64 bit | X | X |
| Windows 8.1 - 64 bit | X | X |
| Server 2008 R2 SP1 - 64 bit | | X |
| Server 2012 - 64 bit] (Standard and DataCenter editions) | | X |
| Server 2012 R2 - 64 bit (Standard and DataCenter editions) | | X |

*Window 7 SP1 – 32 bit supported only for upgrades on client machines.

Note: In case upgrade is required from non-supported OS, please refer to *7.0 Installation instructions and clarifications document*.

## 5.2  ControlCenter Requirements

It is recommended that Control Center client machine have minimum 8GB RAM and a Quad Core Processor with 3.0 GHz or better.

**Hotfix (KB number 2588507)** from Microsoft should be installed on Windows 7 clients.

Note: Remote Desktop Connection is not recommended for viewing live and recorded video.

## 5.3  EZ Client Requirements

### 5.3.1  Supported Browsers

The following Browser versions are fully supported:

- Chrome – 29 and up
- Opera – 16 and up
- IE – 11 and up

Note: Chrome browser is recommended for best user experience.
For optimized touch functionality use Windows based tablet

### 5.3.2  Minimum supported resolution

Minimum resolution: 1280 x 800

# 6   Fixed Issues

| CR ID | Description | Support Ticket |
|-------|-------------|----------------|
| 30111 | Archiver containers management improvements upon storage disconnection. | 48197 |
| 31135 | Applications>> When scene name is in Hebrew the logical ID parentheses causes a mess in the text | NA |
| 31377 | When trying to add unit with new IP address while the same unit is still in the system (same MAC address), the new unit is ignored. | 51344 |
| 31628 | Canon cameras' clock goes out of sync after a few days, causing PTZ commands to stop functioning. | 51241 |
| 32042 | Failed to discover Pelco IMS0C10-1V. | 51897 |
| 32331 | Config file are sometimes corrupted after power cut off. | 62003 |
| 32331 | Config file are sometimes corrupted after brutal shutdown of Horizon/Meridian. | 62003 |
| 34256 | ioi HD video may jitter. | 56783 |
| 36168 | Axis unit HTTP port can't be modified with a value of 100 and up. | 59678 |
| 36171 | Add print of system Activation Key in the logs. | 59740 |
| 36320 | Hebrew Tool Tip appears as gibberish. | 60346 |
| 37321 | When an Ariel camera is covered, tampering events are received every 1 second and do not stop until the camera lens in uncovered. | 61251 |
| 37332 | ControlCenter not responding for a few seconds when dragging a map to the tile. | 59718 |
| 37384 | Delete storage may take hours until storage is deleted. | 61317 |
| 37803 | When locking a clip retrieved from a query, the entire clip is locked instead of only a part of it | 61715 |
| 37897 | Sony 360 – Support input pin and motion detection events via ONVIF. | 59613 |
| 37971 | Query results failed for clips created before upgrade to V6.4 when 'start recording action' on I/O event is defined. | 61396 |
| 37999 | Alarms from ioi HD or ONVIF devices appear after 5-9 seconds delay. | 61138 |

| CR ID | Description | Support Ticket |
|---|---|---|
| 38047 | Moog camera cannot be discovered properly when the recording profile has a higher resolution. | 59718 |
| 38054 | Slow PTZ response when connected via Ariel encoder. | 61182 |
| 38055 | Unable to control PTZ via Pelco protocol. | 60655 |
| 38089 | Axis cameras may appear inaccessible every few second. | 62057 |
| 38092 | Add signal lost events support for Axis encoders. | 61467 |
| 38345 | Installation>> Error messages of the installer should be more user-friendly and indicate a problem. | 62316 |
| 38495 | Threads, handles and memory leaks in export process due to multiple export sessions over time. | 62386 |
| 38631 | Latitude 6.4.0.6809 > Control Center > Remote Monitor > Switching between layouts result in camera scene leak and dropping FPS. | 62191 |
| 39038 | Resolved issue where scene failed to display on Client ControlCenter while using Transcoder. | 62840 |
| 39078 | SafRun default behavior changed so that it will not kill processes when keep alive has elapsed. | 62924 |
| 39481 | Resolved issue with Quasar cameras where cameras and scene are inaccessible in AdminCenter even though there is a stream and camera is recording. | 62622 |
| 39520 | Resolved issues where Archiver, ControlCenter and AdminCenter all throw exceptions when using the Direct Show RDC implementation. | 61829 |
| 39535 | Resolved issue where alarms might not clear in integrations. | 62995 |
| 39541 | Resolved issue where video does not cover the entire tile. | 63280 |

# 7 Known Issues and Limitations

| ID | Description |
|---|---|
| 38108 | Internet Explorer is limited to maximum 6 live tiles. |
| 38247 | QCC does not support thumbnails search |
| 39026 | Web Client -'Playback' page is distorted in 4:3 aspect ratio. |
| 39030 | Control Center- Digital zoom indication does not work during instant replay full screen for PTZ camera. |
| 39033 | Web Client - Playback –update of the start time (from 'Last' drop down) does not affect the playback. Example: If user is watching a clip from the last 5 minutes and then switches the 'Last' drop down to an hour, it will continue playing where it had left of in the "5 |

| ID | Description |
|---|---|
| | minute" clip and will not jump back to the beginning of that hour. User must manually set the playback to the intended time of interest. |
| 39037 | Web Client - Export to AVI fails if there are multiple clips within the selected time range.<br>If the timeframe being exported consists of multiple clips (due to gap in recording, recording on motion, etc), when selecting AVI export in Web Client, export will fail. If AVI is necessary, user may choose to select shorter export times to ensure only one clip is being exported at a given time. Other options include using DVT format. If DVT format is used, user can then choose to convert to AVI format with in the ControlCenter or Quick ControlCenter client applications. |
| 39042 | ControlCenter - Privacy mask is not displayed in the thumbnail of the digital zoom. |
| 39052 | "Analytics" privileges change from "Allow" to "Deny" for user groups when upgrading to version 7.0. Administrator must manually reconfigure user groups to "allow" for analytics privileges where required. |
| 39053 | Web Client - IE crashes when user right clicks on a video tile inside the web client and chooses "Save picture as..." |
| 39105 | Web Client - Web Server must use the default virtual directory. Custom Virtual directories are not supported. |
| 30987 | Sony Gen5 and Gen6  units are discovered as H264 instead of MJPEG |
| 39247 | Axis M3007 cannot de discovered after FW upgrade. |
| 39727 | Transcoder should be configured by ip and not by hostname, otherwise video from IE may not work. Video using Chrome will work fine. |

# 8   Windows Updates

**Note: The Latitude services must be stopped prior to applying Windows updates**

Latitude is certified with all the Microsoft Updates available up until June 1, 2015.

Check for the latest Microsoft updates.

# 9   Disclaimer

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# Appendix A

## A.1 DVTEL Edge Devices Certified Firmware

Note: For up to date information about camera firmware that is not stated on this document, please refer to the DVTEL website at: **http://www.dvtel.com/services-support/firmware-software/** for the latest released firmware. Please review the release notes of specific firmware to ensure they are compatible with you current software version.

## A.1.1 Supported for All VMS 7.0 Platforms (Latitude, Horizon & Meridian)

| Vendor | Model | Latest Approved Firmware | Oldest Firmware Supported |
|--------|-------|--------------------------|----------------------------|
| DVTEL | CB-3011-01-I | v5.0.0_b140731 | v5.0.0_b140513 |
| DVTEL | CB-6204-11-I | dt20150426NSZ | Same as approved |
| DVTEL | CB-6204-21-I | dt20150426NSZ | Same as approved |
| DVTEL | CB-6208-11-I | dt20150426NSZ | dt20150116NSZ |
| DVTEL | CB-6208-21-I | dt20150426NSZ | dt20150116NSZ |
| DVTEL | CF-3211-00 | dt20141119NSA | dt20120914NSA |
| DVTEL | CF-4221-00 | dt20141119NSA | dt20120914NSA |
| DVTEL | CF-4251-00 | dt20141119NSA | Same as approved |
| DVTEL | CF-5212-00 | dt20141126NSX + 2.1.1.245 [Camera/Analytic] | Same as approved |
| DVTEL | CF-5222-00 | dt20141126NSX + 2.1.1.245 [Camera/Analytic] | Same as approved |
| DVTEL | CM-3011-01-I | v5.0.0_b140731 | v5.0.0_b140513 |
| DVTEL | CM-3211-00 | dt20141119NSA | dt20120914NSA |
| DVTEL | CM-3211-01 | dt20141119NSA | dt20120914NSA |
| DVTEL | CM-3211-10 | dt20141119NSA | dt20120914NSA |
| DVTEL | CM-3211-10-I | dt20141119NSA | dt20120914NSA |
| DVTEL | CM-3211-11 | dt20141119NSA | dt20120914NSA |
| DVTEL | CM-3211-11-I | dt20141119NSA | dt20120914NSA |

| Vendor | Model | Latest Approved Firmware | Oldest Firmware Supported |
|--------|-------|--------------------------|---------------------------|
| DVTEL | CM-4211-10-I | dt20141119NSA | dt20120914NSA |
| DVTEL | CM-4211-11-I | dt20141119NSA | dt20120914NSA |
| DVTEL | CM-4221-00 | dt20141119NSA | dt20120914NSA |
| DVTEL | CM-4221-01 | dt20141119NSA | dt20120914NSA |
| DVTEL | CM-4221-10 | dt20141119NSA | dt20120914NSA |
| DVTEL | CM-4221-11 | dt20141119NSA | dt20120914NSA |
| DVTEL | CM-4251-10-I | dt20141119NSA | Same as approved |
| DVTEL | CM-4251-11-I | dt20141119NSA | Same as approved |
| DVTEL | CM-4321-00 | dt20141119NSA | dt20121005NSA |
| DVTEL | CM-4321-30 | dt20141119NSA | Same as approved |
| DVTEL | CM-6204-11-I | dt20150426NSZ | Same as approved |
| DVTEL | CM-6204-21-I | dt20150426NSZ | Same as approved |
| DVTEL | CM-6208-11-I | dt20150426NSZ | dt20150116NSZ |
| DVTEL | CM-6208-21-I | dt20150426NSZ | dt20150116NSZ |
| DVTEL | CP-3211-180 | dt20141119NSA | dt20120914NSA |
| DVTEL | CP-3211-181 | dt20141119NSA | dt20120914NSA |
| DVTEL | CP-4221-200 | dt20141119NSA | dt20120914NSA |
| DVTEL | CP-4221-201 | dt20141119NSA | dt20120914NSA |
| DVTEL | CP-4221-301 | dt20141119NSA | Same as approved |
| DVTEL | CT-5320-XX-YYF | 2.2.6692 | Same as approved |
| DVTEL | CT-5320-XX-YYPT | 2.2.6692 | Same as approved |
| DVTEL | CT-5322 | 3.0.2.231 | Same as approved |
| DVTEL | CT-5640-XX-YYF | 2.2.6692 | Same as approved |
| DVTEL | CT-5640-XX-YYPT | 2.2.6692 | Same as approved |
| DVTEL | CT-5642 | 3.0.2.231 | Same as approved |
| DVTEL | EA-201-0 | 2.1.8.3080 | 2.1.8.2857 |

| Vendor | Model | Latest Approved Firmware | Oldest Firmware Supported |
|--------|-------|--------------------------|---------------------------|
| DVTEL | EA-201-XT | 2.1.8.3080 | 2.1.8.2857 |
| DVTEL | EN-204 | v1.1.0_b141127 | Same as approved |
| DVTEL | EN-216 | v1.1.0_b141127 | Same as approved |
| DVTEL | EV-101-D | 2.2.1.261.91791 | Same as approved |
| DVTEL | EV-116 | 2.4.17.128.178473 | 2.2.1.255.91791 |
| DVTEL | EV-201 | 2.2.11.309.115017 | Same as approved |
| DVTEL | EV208 | 2.4.17.128.178473 | Same as approved |
| DVTEL | EV208-A | 2.4.17.128.178473 | Same as approved |
| DVTEL | EV216 | 2.4.17.128.178473 | Same as approved |
| DVTEL | EV216-A | 2.4.17.128.178473 | Same as approved |
| DVTEL | EV-401-D | 2.2.1.261.91791 | Same as approved |
| DVTEL | MMP camera | 1.5.7.334 | 1.5.7.328 |
| DVTEL | SC1 | 2.0.1.294 | 2.01.188 |
| DVTEL | SC1dn-A | 2.1.2.132 | 2.1.1.112 |
| DVTEL | SC1dn-S | 2.1.2.132 | 2.1.1.141 |
| DVTEL | TRK 100 | 1.5.7.334 | 1.5.7.328 |
| DVTEL | TRK 100d | 1.5.7.334 | 1.5.7.328 |
| DVTEL | TRK 101 | 2.1.2.132 | 2.1.1.112 |
| DVTEL | TRK 101 P | 2.1.2.132 | 2.1.2.132 |
| DVTEL | TRK 10d | 1.5.7.334 | 1.5.7.328 |
| DVTEL | TRK 4000d | 1.5.7.334 | 1.5.7.328 |
| DVTEL | TRK1 | 1.5.7.334 | 1.5.7.328 |
| DVTEL | TRK10 | 1.5.7.334 | 1.5.7.328 |
| DVTEL | TRK200 | 1.5.7.334 | 1.5.7.328 |
| DVTEL | TRK4000 | 1.5.7.334 | 1.5.7.328 |
| DVTEL | TRK8000 | 1.5.7.334 | 1.5.7.328 |

| Vendor | Model | Latest Approved Firmware | Oldest Firmware Supported |
|--------|-------|--------------------------|---------------------------|
| DVTEL | Wdc100dn | 1.5.7.334 | 1.5.7.328 |
| DVTEL | WDC-100dn | 1.5.7.334 | Same as approved |
| DVTEL | xptz100dn | 1.5.7.334 | 1.5.7.328 |
| DVTEL | XPVA-100d-N | 1.5.7.334 | Same as approved |
| DVTEL | XPVA-100d-P | 1.5.7.334 | Same as approved |
| DVTEL | XPVA-10d-N | 1.5.7.334 | Same as approved |
| DVTEL | XPVA-10d-P | 1.5.7.334 | Same as approved |

## A.1.2 Supported for Latitude NVMS 7.0 Only

| Vendor | Model | Latest Approved Firmware | Oldest Firmware Supported |
|--------|-------|--------------------------|---------------------------|
| DVTEL | CF-1101-0N | 2.1.8.3080 | 2.1.7.48 |
| DVTEL | CF-1101-0N/P | 2.1.8.3080 | 2.1.8.2857 |
| DVTEL | CF-1101-0P | 2.1.8.3080 | 2.1.7.48 |
| DVTEL | CF-2101-0N/P | 2.1.8.3080 | 2.1.8.2857 |
| DVTEL | CF-2101-1N/P (Analog) | 2.1.8.3080 | 2.1.8.2857 |
| DVTEL | CF-3111-00 | Cam FW: 100205P<br><br>SW Ver: f20120316NS | Cam FW: 100205P<br><br>SW Ver: f20100415NS |
| DVTEL | CF-4121 | f20110107 | f20101116NS |
| DVTEL | CM-1101-01N | 2.1.8.3080 | 2.1.7.48 |
| DVTEL | CM-1101-01N/P | 2.1.8.3080 | 2.1.8.2857 |
| DVTEL | CM-1101-01P | 2.1.8.3080 | 2.1.7.48 |
| DVTEL | CM-2101-01N/P | 2.1.8.3080 | 2.1.8.2857 |
| DVTEL | CM-2101-11N/P | 2.1.8.3080 | 2.1.8.2857 |
| DVTEL | CM-2101-21N/P (Analog) | 2.1.8.3080 | 2.1.8.2857 |
| DVTEL | CM-2101-31N/P (Analog) | 2.1.8.3080 | 2.1.8.2857 |

| Vendor | Model | Latest Approved Firmware | Oldest Firmware Supported |
|--------|-------|--------------------------|---------------------------|
| DVTEL | CM-3111-01 Motorized | Cam FW: 100205P<br><br>SW Ver: f20120316NS | Cam FW: 100205P<br><br>SW Ver: f20100423NS |
| DVTEL | CM-3111-01 Non-Motorized | Cam FW: 100205P<br><br>SW Ver: f20120316NS | Cam FW: 100205P<br><br>SW Ver: f20100415NS |
| DVTEL | CM-4021 | f20110107 | f20101116NS |
| DVTEL | CP-1101-120N | 2.1.8.3080 | 2.1.7.48 |
| DVTEL | CP-1101-120N/P | 2.1.8.3080 | 2.1.8.2857 |
| DVTEL | CP-1101-120P | 2.1.8.3080 | 2.1.7.48 |
| DVTEL | CP-1101-121N | 2.1.8.3080 | 2.1.7.48 |
| DVTEL | CP-1101-121N/P | 2.1.8.3080 | 2.1.8.2857 |
| DVTEL | CP-1101-121P | 2.1.8.3080 | 2.1.7.48 |
| DVTEL | CP-2101-180N/P | 2.1.8.3080 | 2.1.8.2857 |
| DVTEL | CP-2101-181N/P | 2.1.8.3080 | 2.1.8.2857 |
| DVTEL | CP-2101-300N/P | 2.1.8.3080 | 2.1.8.2857 |
| DVTEL | CP-2101-301N/P | 2.1.8.3080 | 2.1.8.2857 |
| DVTEL | CP-2101-360N/P | 2.1.8.3080 | 2.1.8.2857 |
| DVTEL | CP-2101-361N/P | 2.1.8.3080 | 2.1.8.2857 |
| DVTEL | DVT 9501 | 210 | Same as approved |
| DVTEL | DVT 9701 | 210 | Same as approved |
| DVTEL | DVT-7101E | 4.80s-770 | 4.80l Build 770 |
| DVTEL | DVT-7401DA | 5.00b build 17 | 4.80f Build 770 |
| DVTEL | DVT-7401E | 4.80s Build 770 | Same as approved |
| DVTEL | DVT-7501D | 3.60o Build 498 | Same as approved |
| DVTEL | DVT-7501DA | 3.60o Build 498 | Same as approved |
| DVTEL | DVT-7501E | 3.60n Build 498 | Same as approved |
| DVTEL | DVT-7501EA | 3.60n Build 498 | Same as approved |

| Vendor | Model | Latest Approved Firmware | Oldest Firmware Supported |
|--------|-------|--------------------------|---------------------------|
| DVTEL | DVT-7502M | 3.60o Build 498 | Same as approved |
| DVTEL | DVT-7504D | 4.22e Build 27 | 4.22c Build 27 |
| DVTEL | DVT-7504E | 3.60e Build 256 | 3.60e Build 256 |
| DVTEL | DVT-7508M | 3.60e Build 256 | 3.60e Build 256 |
| DVTEL | DVT-7601E | 4.80u 770 | 4.20i Build 500 |
| DVTEL | DVT-7601EA | 4.80u 770 | 4.20i Build 500 |
| DVTEL | DVT-7604E | 5.00n build 33 | 4.60v Build 553 |
| DVTEL | DVT-7604EA | 5.00n build 33 | 4.60v Build 553 |
| DVTEL | DVT-7608E | 5.00n build 33 | 4.60v Build 553 |
| DVTEL | DVT-7608EA | 5.00n build 33 | 4.60v Build 553 |
| DVTEL | DVT-7608EU | 5.00n build 33 | 4.60v Build 553 |
| DVTEL | DVT-7612E | 5.00n build 33 | 4.60v Build 553 |
| DVTEL | DVT-7612EA | 5.00n build 33 | 4.60v Build 553 |
| DVTEL | DVT-7612EU | 5.00n build 33 | 4.60v Build 553 |
| DVTEL | DVT-7624E | 5.00n build 33 | 4.60v Build 553 |
| DVTEL | DVT-7624EA | 5.00n build 33 | 4.60v Build 553 |
| DVTEL | DVT-7801E/PEA | 3.2.0.2 | 3.1.30.17 |
| DVTEL | DVT-9420 | 101c | 100c |
| DVTEL | DVT-9440 (DVT-IPB-4V) | 4.80s Build 770 | Same as approved |
| DVTEL | DVT-9460 (DVT-IP-4V) | 4.80s Build 770 | 4.80l Build 770 |
| DVTEL | DVT-9460A | 3.2.0.2 | 3.1.30.17 |
| DVTEL | DVT-9480A | 3.2.0.2 | 3.1.30.17 |
| DVTEL | DVT-9520 | 0103c | 103b |
| DVTEL | DVT-9523 | 103c | 103b |
| DVTEL | DVT-9540/9541 | 4.22n build 32 | Same as approved |

| Vendor | Model | Latest Approved Firmware | Oldest Firmware Supported |
|--------|-------|--------------------------|---------------------------|
| DVTEL | DVT-9540A | 3.2.0.2 | 3.1.30.17 |
| DVTEL | DVT-9540S-N/P | 4.80s Build 770 | 4.80l Build 770 |
| DVTEL | DVT-9540SW/DW | 4.80m-770 | Same as approved |
| DVTEL | DVT-9580A | 3.2.0.2 | 3.1.30.17 |
| DVTEL | DVT-9840 (DVT-IP-4V) | 4.80s Build 770 | Same as approved |
| DVTEL | DVT-9840 (DVT-IPB-4V) | 4.80s Build 770 | Same as approved |
| DVTEL | DVT-9840A | 3.2.0.2 | 3.1.30.17 |
| DVTEL | DVT-IPB-401A | 3.2.0.2 | 3.1.30.17 |
| DVTEL | DVT-IPB-401AM | 3.2.0.2 | 3.1.30.17 |

# Appendix B

## Supported Languages

| Supported use with non-English language | Latitude | Meridian | Horizon |
|---|---|---|---|
| OS | Yes | No | No |
| AdminCenter | Yes | No | No |
| ControlCenter | Yes | Yes | Yes |
| Non-English keyboard input | Yes | Yes | Yes |

**Latitude:**

1. OS
   a. Latitude does support non-English languages, and therefore DVTEL does not support an OS in a non-English language. This has been tested in QA when special requested, for specific languages, but is not tested with every version. There is the possibility for someone to encounter an issue (for example if another language uses "," instead of ".". But in such cases where the non-English OS causes problems in Latitude, R&D will consider this a bug.
2. Admin Center
   a. Latitude Admin Center does support various non-English languages. This can be changed in the config file under the section "<Localization>"
3. ControlCenter
   a. ControlCenter does support non-English languages. This can be changed in the ControlCenter config file at C:/Program Files (x86)/DVTEL/Control Center under the section "<Localization>".

**Horizon/Meridian:**

1. OS
   a. Horizon and Meridian are appliances that are sold as-is. Therefore, DVTEL does not support changing the languages in the OS. There is the potential for it to cause issues. However, you can add a keyboard input for another language and type in that language.
2. Admin Center
   a. Horizon/Meridian Admin Center has no support for non-English languages.
      i. While Admin Center does not support such function, one is able to type in a different language into Admin Center. For example, if one would like to name cameras in a non-English language, this is supported. Please note that right-to-left languages may skew the positioning of certain components (i.e. logical Id).

3. ControlCenter
   a. ControlCenter (being a unified application) does support non-English languages and DVTEL does support this. This can be changed in the ControlCenter config file at C:/Program Files (x86)/DVTEL/Control Center under the section "<Localization>".

## B.1 How to Change the User Interface Language When a System is Already Installed?

Latitude AdminCenter and the DVTEL Unified ControlCenter supports multiple languages. By activating the desired language, these applications are conveniently displayed in the localized user interface of your choice. The selection of the user language can be done during the installation phase or manually if the system is already installed (see procedure below).

The following languages are supported: English, Hebrew, Spanish, Russian, Italian, Japanese, Chinese, French and Portuguese

<u>Procedure to manually change the user interface language:</u>

1. Each of the following files needs to be edited:
    i. C:\Program Files (x86)\DVTel\AdminCenter\AdminCenter.exe.config
    ii. C:\Program Files (x86)\DVTel\ControlCenter\ControlCenter.exe.config
    iii. C:\Program Files\DVTel\Directory\Directory.exe.config
       Note: In the case where only ControlCenter is being changed, only edit the ControlCenter.exe.config.

2. Open the files using a text editor, such as Notepad or WordPad.

3. Search for the following string: add key=" Language" value="en"

4. Replace the value en with the value of the desired language:

| | |
|---|---|
| • For English, type 'en' | • For Japanese, type 'ja' |
| • For Hebrew, type 'he' | • For Chinese, type 'zh-CN' |
| • For Spanish, type 'es' | • For French, type 'fr-FR' |
| • For Russian, type 'ru' | • For Portuguese, type 'pt-BR' |
| • For Italian, type 'it-IT' | |

5. Save the files and launch the DVTEL application displaying the localized user interface.