

Product DIVAR AN 3000/5000	Document type Release notes	Release # V1.4.0	SAP/Doc number	Release date 2014.06.23
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Video Recorder DIVAR AN 3000 and DIVAR AN 5000 families

1 DIVAR AN 3000/5000 firmware version 1.4.0 (date 2014-05-27)

File name: DVR.V1.4.0.R.20140527.bin

If used in combination with BVC, this firmware (v1.4.0) requires BVC v1.4 sr7 (v1.4.493) or higher.

This release includes the following new features:

- Quick start playback icon added in 'Search/Play' screen. When this icon is pressed, a dialog box will appear asking you to select date/time and camera(s) to be played. Press start, and the selected camera(s) will be played in a corresponding multi-screen.
- Automatic jump back to the previous (multi-)screen after an alarm camera was displayed on Mon. A
- Display multiple alarm cameras if they are simultaneously in alarm. For example, one camera in alarm is displayed in a full screen; 2 active alarms will be displayed in a Quad screen. If more than 4 cameras are in alarm, they will be displayed in a 3x3 or 4x4 multi-screen.
- It is possible to download the export player via the DIVAR web client using the new button 'Player Download'.
- HDD disk error message in left top of screen when one of the drives is in error. Recording continues on the working drive(s).
- PTZ in Pelco protocol allows simultaneous Zoom and Tilt/Pan.
- GMT +4:30, GMT +5:45, GMT +6:30, GMT -4:30, and GMT -12:00 are removed from firmware, and common time zone names are added for appropriate time zone settings.

Bug fixes:

- Fixed unexpected time-zone jump to default +1 GMT after upgrade to v1.3
- Fixed the no-data reboot caused by abnormal signal input
- Corrected translations in Italian UI
- Other minor bug fixes and improvements

Bosch strongly recommends upgrading to the latest firmware for the best possible functionality, compatibility and performance.

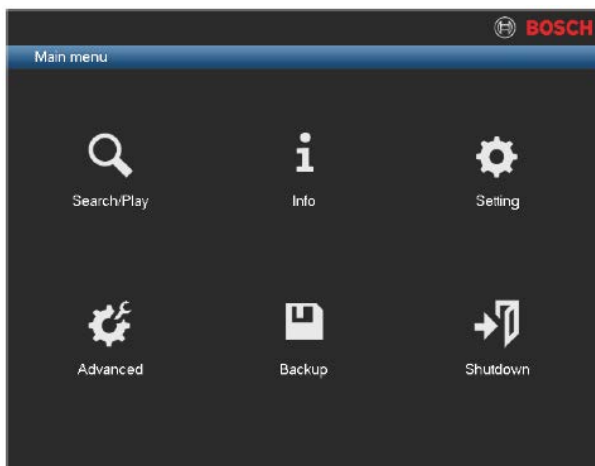
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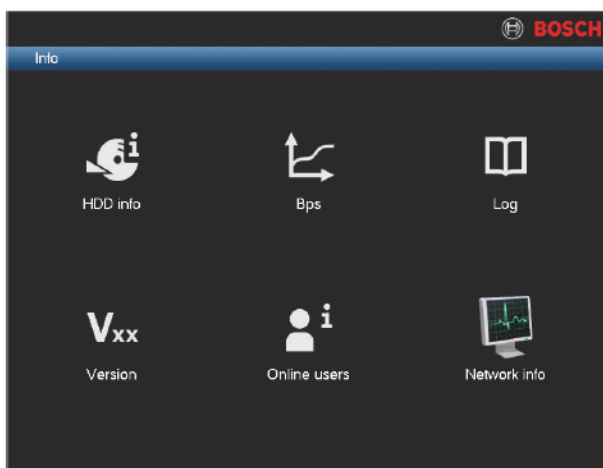
2 Update procedure

To update the DIVAR3000/5000 to the latest firmware, please refer to the Operator manual, section 7.5.4, or follow the instructions below:

1. Load firmware v1.4.0 via a PC onto an USB memory stick (file name: DVR.V1.4.0.R.20140527.bin)
2. Log on as “ADMINISTRATOR” in the local unit
3. Access the Main menu by right-clicking the mouse for the Quick menu, and select ‘Main menu’.



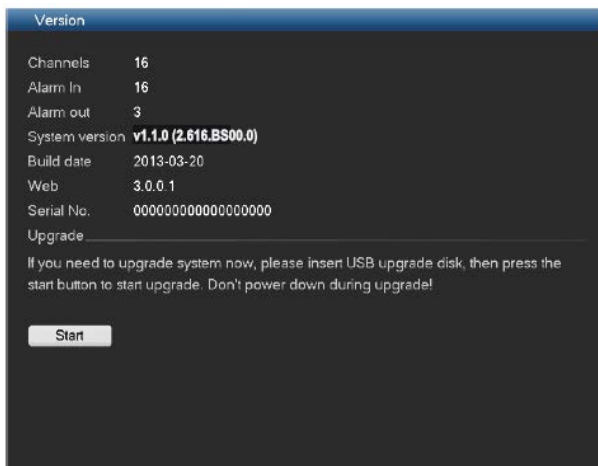
4. Select the ‘Info’ menu (see below).



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5. Select the Version menu (see below).



6. Update the current firmware as follows:
- Insert a USB stick with a preloaded update file into the USB connector on the front of the DVR .
 - Select the update file DVR.V1.4.0.R.20140527.bin.
 - Click <Start>to begin the update.
 - Wait until the update is complete and the system is restarted.

Alternatively, use the Web Client for a firmware upgrade.

3 Divar 3000/5000 firmware version history

3.1 Version 1.0.0

File name: DVR.V1.0.0.R.20130923.bin

Version 1.0.0 is the Initial firmware release

DIVAR3000/5000 supports the following PC software, mobile APPs and Web browsers:

- BVC v1.4 SR4
- iPhone APP 'DIVAR Viewer' v1.0 supports live viewing and is available on Apple Store
- Android APP 'DIVAR Viewer' v1.0 supports live viewing and is available on Play Store
- iPad APP 'DVR Client' v3.01 supports DVR400/600/700/3000/5000
 - o In this version no playback is supported for DIVAR 3000/5000
- Web browser support for Safari, Chrome, Firefox (QuickTime required; no playback supported) and Internet Explorer 9 (including playback)

Important behavior / know issues:

- No Daylight Saving Time (DST) support in first release of DIVAR3000/5000 on local unit and BVC. Our advice is to select 'Display local time of device' in BVC user settings when the PC time is not synchronized with the device time.
- Pre-alarm recordings are not visible on the timeline.

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- There is no alarm/motion icon shown during playback of alarm/motion recordings.
- Exporting video with one or more gaps will result in one solid video track.
- No text search supported on ATM/POS recordings.
- Intukey keyboard 'search', 'freeze' and 'play' functions are not supported.
- The default for the recording schedule is set for regular recording for all inputs. This means that all inputs are recorded, even when no camera is connected, and you may use up extra recording space. You can avoid this by disabling the recording schedule for a camera that is not available or not connected.
- The 'File Association' setting in Archive player is disabled in this release.
- The Archive Player will not be downloaded from the DVR when archiving is performed via Web Client. Use the Archive Player available on the Bosch website (and on the product CD), or download it by performing a local archive.
- The DVR records to different video package files. During continuous recording, you can set the duration for every package ('Pack Duration' setting). This means you can later choose in the 'Search/Playback' screen to search for a video via the time line, or from a list of all recorded files where video packages for Regular (R), Motion (M) or Alarm (A) recordings are indicated. You can simply click on the required file to view this recording, or you select one or more files for archiving.

3.2 Version 1.1.0

File name: DVR.V1.1.0.LB.R.20131112.bin (date 2013-11-12)

This release includes the following new features/improvement:

- Supports a full bandwidth control. This means that, when the bandwidth limitation is active, all DVR network communication will be limited to the selected bandwidth setting.
- Bandwidth limit can be set to off (default), 256 kbps, 512 kbps and higher. For example, when the bandwidth limitation is set to 256 kbps, than the network traffic will not exceed the 256 kbps.
- In this version the bandwidth limitation can be set active via a BVC site.xml connection. Therefore BVC will inform DVR if it should stream with or without bandwidth limit.
- Second encoding stream will be configured automatically to accommodate the selected bandwidth limit. For example if bandwidth limit is set to 256 kbps than encoding settings of all cameras will be set to 64 kbps for the 2nd stream to optimize viewing of four cameras.
- BVC playback, under low bandwidth control, streams I-Frame only to save bandwidth.
- BVC export, under low bandwidth control, streams all I- and P-Frames. Even though this is a slow process, no frames will be dropped.
- BVC software version 1.4 SR5 (v1.4.464) is supporting this firmware v1.1.0

Important behavior:

- Remote playback under bandwidth control:
 - o Recordings with 30IPS – 4CIF resolution could leads to a situation where playback is quite difficult to stream in single speed I-Frames with bandwidth limit set to 256 kbps.

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This because some I-Frames, especially with a lot of motion, are already bigger than the 256 kbps.

In this release this is solved to start BVC playback with half-speed when the recorder is under bandwidth control. This is the default playback speed and can be changed by the user by pressing FWD so that playback goes to single speed.

- Remote live viewing under bandwidth control:
 - o Lowest bandwidth limit can be set to 256 kbps. For live display the 2nd stream is automatically set to 64 kbps per camera. For single view the live picture quality can be improved to select 256 kbps per camera.

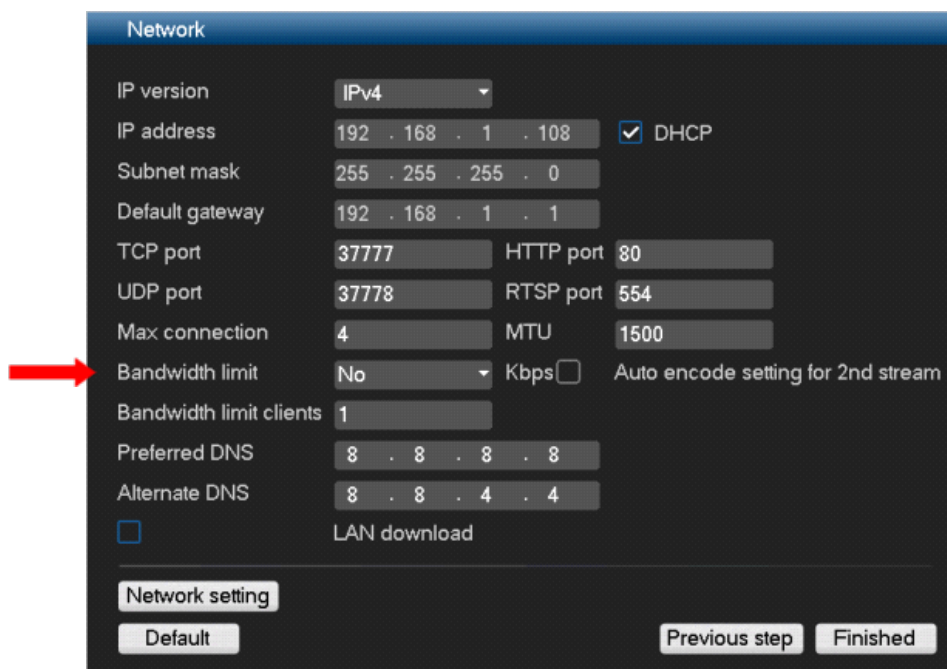
3.3 Version 1.2.0

File name: DVR.V1.2.0.R.20140126.bin

This release includes the following new features:

Bandwidth limit:

- To use this feature, firmware v1.2.0 must be installed in the DVR, and BVC software version 1.4 SR6 (v1.4.487) must be used.
- The bandwidth limit only applies to network connections outside the sub-net of the DVR (WAN). Bandwidth limit does NOT apply to network connection on the same sub-net as the DVR (LAN).
- The DVR will check automatically if a BVC or Web Client network connection request is sent from a PC located in the same sub-net as the DVR (no bandwidth limitation), or from outside its sub-net (bandwidth limitation).
- In the following Network screen, the bandwidth limits can be set to No (default), 256 Kbps, 512 Kbps, 1M, 2M, 5M or 10Mbps.



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- This new feature supports full bandwidth control. This means that, when the bandwidth limitation is active, all DVR network communication outside the sub-net will be limited to the selected bandwidth setting. For example, when the bandwidth limitation is set to 256 Kbps, then network traffic to connections outside the DVR sub-net will not exceed the 256 Kbps.
- When the bandwidth limit is set to a value, the encoding settings for the 2nd stream will be optimized to stream live video for the selected bandwidth value. For example if bandwidth limit is set to 256 Kbps then encoding settings for all cameras will be set to 64 Kbps for the 2nd stream to optimize viewing of four cameras. For 512 Kbps this will be 128 Kbps for all cameras.
- Check the 'Auto encode setting for 2nd stream' box to enable automatic selection (the 2nd stream settings can always be manually changed).

Live display in BVC

- Under low bandwidth control, the BVC or Web Client will request the 2nd stream by default.
- Even when the operator on the BVC or Web client manually selects the main stream, the bandwidth consumption will never be higher than the selected value. This may delay streaming of the higher bit-rate of the main stream.

Playback in BVC

- During BVC playback under low bandwidth control, only I-Frames are streamed to save bandwidth. In full screen, an I-Frame will be streamed every second.
- In 2x2 playback, the system streams one I-Frame every 4 seconds.
- When the recorder is under bandwidth control, BVC playback starts at half-speed by default. Recordings with a high update rate and resolution could cause difficult playback streaming for single speed I-Frames when the bandwidth limit is set low (e.g. 256 Kbps). Some I-Frames, especially those with a lot of motion, are already bigger than the 256 Kbps. The default playback speed can be changed by the user pressing FWD so that playback goes to single speed.

Step-by-step playback in BVC

- When playback is paused, the P-Frames will also be loaded so that it is possible to step forward and backward through all recorded frames.
- Because of the low bandwidth setting, it may take a number of seconds to load all additional P-Frames. If immediate stepping is started after pausing, only I-Frames will be initially started. After a few seconds, the P-Frames will be loaded.

Export in BVC

- BVC export, under low bandwidth control, streams all I- and P-Frames. This is a slow process but no frames will be lost.

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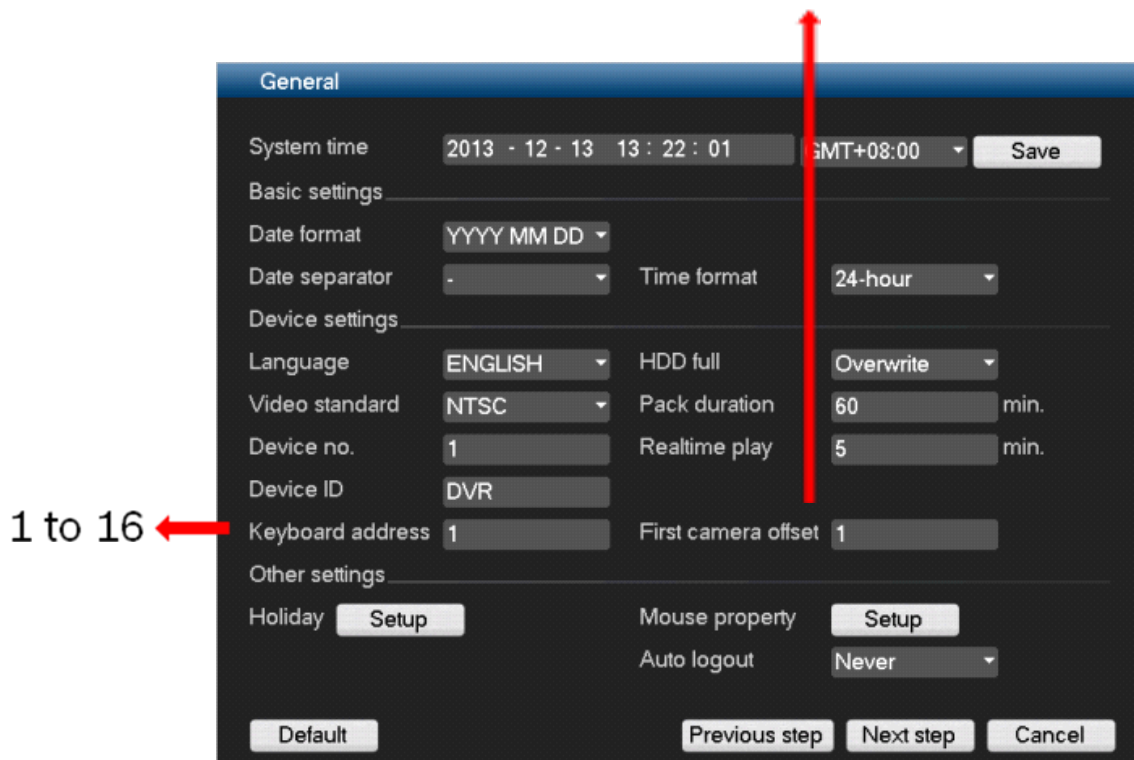
Intuikey keyboard connection

One Intuikey keyboard can communicate with a maximum 16 DIVAR 5000 units (not supported on the DIVAR 3000):

- Keyboard address must be set for every DIVAR 5000
- First camera offset must be set for every DIVAR 5000. Camera 1 of the DIVAR 5000 will be called on the keyboard by selecting the programmed 'First camera offset' number. For example, set the offset to 101 in the DVR so when you select 101, camera 1 is displayed in full screen on monitor A of that selected DVR. Press 112 to display camera 12 in full screen.



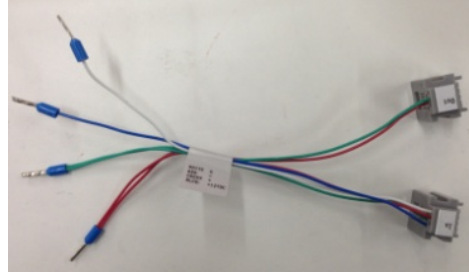
1 to 9999



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New keyboard adapter

New RJ11 adapter with RJ11 adapter IN and OUT to loop-through the keyboard cable to multiple DIVAR 5000 recorders.

**New configuration Tool**

Separate Configuration Tool provided (see <http://IPAddress/?config>) – this makes it possible to use the Web Client to call a web page for configuration only.

This release includes the following new improvements/bug fixes:

- NTP timeserver changes for more than 10 minutes backwards will not be executed. This to prevent deleting of video by on incorrect large time change backwards.
- Certain passwords were not recognized within IE Web client. This is solved in v1.2.0.
- WAN connection issues with BVC 1.4 SR5 in combination with firmware 1.1.0 have been solved in firmware v1.2.0 and BVC 1.4 SR6.
- DVR Client iPad APP was not able to connect with DVRs running on firmware v1.1.0. This is solved in firmware v1.2.0.
- Rebooting of DVR could cause sometimes in switching from NTSC to PAL. This is fixed so that if DVR is set to NTSC it always stays in NTSC after reboot.
- Issue that timeline of BVC 1.4 SR5 was 1 hour ahead compared to time stamp in recorded video by using GMT -5 is solved in BVC 1.4 SR6 and firmware v1.2.0.

3.4 Version 1.3.0

File name: DVR.V1.3.0.R.20140325.bin

If used in combination with BVC, this firmware (v1.3.0) requires BVC v1.4 sr7 (v1.4.493) or higher.

This release includes the following new features:

- Daylight Saving Time (DST) support on local unit
 - o BVC 1.4 sr7 or higher requires firmware v1.3 on every DIVAR AN 3000/5000
 - o Older BVC versions are not supporting firmware v1.3

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- Warning window added in BVC 1.4 sr7 when connected to DIVAR AN 3000/5000 with older firmware than v1.3
- Common time zone names added in time zone setting
- User name is extended to a maximum of 16 characters

Bug fixes:

- Playback at higher speed in previous BVC versions has been improved.

Know issues:

- Downloading export player via web page using new button 'Player Backup' is sometimes causing IE to stop working. This will be corrected in the next release.