

8 Channel Digital Audio Processor - Multi Edition Image

Applicable for D*AP8 FLX, D*AP8 Codec Edition, D*AP8 LM Edition

Version 5.1.6 _____ 2020-03-05 _____

Corresponding minimum software versions:

Remote Panel X*AP RM1	1.10.1	X*AP RM1
J*AM - Jünger Application Manager	2.9.10	J*AM
Dante interface board DT-100	1.1.4.8	O_DAP_DANTE_a
Firmware	8.0.0.0	
Module Software	3.10.0	
Module MB App	1.1.4	
MADI interface board MX-164	9.0.0.0	O_DAP_MB_a
		O_DAP_MO_xx_a
SDI interface board SDI-150	53.0.0.0	O_DAP_SDI_a
AES interface board DD-188A	7.0.0.0	O_DAP_AES_a
Dolby Decoder/Encoder CAT1100	3.1.0.0	
D/D+/E Decoder		O_DAP_Dolby_DEC_b
D/D+ Encoder		O_DAP_Dolby_DENC_b
E Encoder		O_DAP_Dolby_EENC_b
Dolby E Encoder CAT559	1.1.4.0	O_DAP_Dolby_EENC_a
Dolby D/D+ Encoder CAT561	2.4.0.8	O_DAP_Dolby_DENC_a
GfK Watermarking JDSPA		O_DAP8_WM_GFK_a
Firmware	1.3.7.0	
Bootloader	1.2.3.0	
FM Conditioner Coprocessor JDSPA		O_DAP8_FM_a
Firmware	0.9.0.0	
Bootloader	1.2.3.0	

Changes:

- changed (*SDI*) includes SDI firmware version 53

Version 5.1.5 _____ 2020-01-31 _____

Changes:

- changed (*Dolby*) Dolby D/D+/E de/encoder with revision 10 supported
- fixed (*Dolby*) Dolby metadata reversion status in encoder B

Version 5.1.4 _____ 2019-01-25 _____

Changes:

- fixed (*Backend*) problem with inaccessible user interfaces on Ember+ or web UI action
- fixed (*Dolby*) Dolby D/D+ encoder not showing up in routing matrix
- changed (*Audio*) voice over threshold range extended to -60 - 0 dBFS

Version 5.1.3 _____ 2018-07-05 _____

Corresponding minimum software versions:

Remote Panel X*AP RM1	1.10.1	X*AP RM1
J*AM - Jünger Application Manager	2.9.10	J*AM
Dante interface board DT-100	1.1.4.8	O_DAP_DANTE_a
Firmware	8.0.0.0	
Module Software	3.10.0	
Module MB App	1.1.4	
MADI interface board MX-164	9.0.0.0	O_DAP_MB_a
		O_DAP_MO_xx_a
SDI interface board SDI-150	51.0.0.0	O_DAP_SDI_a
AES interface board DD-188A	7.0.0.0	O_DAP_AES_a
Dolby Decoder/Encoder CAT1100	3.1.0.0	
D/D+/E Decoder		O_DAP_Dolby_DEC_b
D/D+ Encoder		O_DAP_Dolby_DENC_b
E Encoder		O_DAP_Dolby_EENC_b
Dolby E Encoder CAT559	1.1.4.0	O_DAP_Dolby_EENC_a
Dolby D/D+ Encoder CAT561	2.4.0.8	O_DAP_Dolby_DENC_a
GfK Watermarking JDSPA		O_DAP8_WM_GFK_a
Firmware	1.3.7.0	
Bootloader	1.2.3.0	
FM Conditioner Coprocessor JDSPA		O_DAP8_FM_a
Firmware	0.9.0.0	
Bootloader	1.2.3.0	

Changes:

- new feature (*Dolby*) Dolby D/D+ Encoder now featured on newer CAT1100 board
- new feature (*Audio*) Voice Over threshold range extended from 0 to -60 dBFS
- fixed (*Web UI*) problem with disappearing checkboxes in some versions of Firefox
- fixed (*Web UI*) Dolby E Encoder now accessible via system overview

Version 5.1.2 _____ 2017-03-17 _____

Changes:

- fixed (*Backup/Restore*) coprocessor, watermarking and measurement were missing in preset restore filter list

Version 5.1.1 _____ 2017-03-15 _____

Corresponding minimum software versions:

Remote Panel X*AP RM1	1.10.1	X*AP RM1
J*AM - Jünger Application Manager	2.9.10	J*AM
Dante interface board DT-100	1.1.4.8	O_DAP_DANTE_a
Firmware	8.0.0.0	
Module Software	3.10.0	
Module MB App	1.1.4	
MADI interface board MX-164	9.0.0.0	O_DAP_MB_a
		O_DAP_MO_xx_a
SDI interface board SDI-150	51.0.0.0	O_DAP_SDI_a
AES interface board DD-188A	7.0.0.0	O_DAP_AES_a
Dolby Decoder CAT1100	3.0.0.0	O_DAP_Dolby_DEC_b
Dolby Encoder CAT559	1.1.4.0	O_DAP_Dolby_EENC_a
Dolby Decoder CAT561	2.4.0.8	O_DAP_Dolby_DENC_a
GfK Watermarking JDSPA		O_DAP8_WM_GFK_a
Firmware	1.3.7.0	
Bootloader	1.2.3.0	
FM Conditioner Coprocessor JDSPA		O_DAP8_FM_a
Firmware	0.9.0.0	
Bootloader	1.2.3.0	

Changes:

- new feature (*Web UI*) added mouse over tool tip to FM Conditioner peak deviation target
- new feature (*Web UI*) maximum true peak output measurement with included pre-emphasis for FM Conditioner

- new feature (*FM Conditioner*) added presets for operation and calibration (see manual)
- improved (*Backup/Restore*) system message for partially restored backup files
- fixed (*FM Conditioner*) problem with FM Conditioner modulation peak handling
- fixed (*Web UI*) creating events works as expected now
- fixed (*Events*) event active status when copying events from existing events
- fixed (*SDI*) local routing mute (no routing crosspoint set) is now working as expected

Known issues:

- When updating to this firmware the SDI local routing may be reset to default
Workaround: Check your SDI local routing page after updating and reload your routing presets if necessary.

Version 5.1.0 _____ 2016-12-16 _____

Corresponding minimum software versions:

Remote Panel X*AP RM1	1.10.0	X*AP RM1
J*AM - Jünger Application Manager	2.9.10	J*AM
Dante interface board DT-100	1.1.4.8	O_DAP_DANTE_a
Firmware	8.0.0.0	
Module Software	3.10.0	
Module MB App	1.1.4	
MADI interface board MX-164	9.0.0.0	O_DAP_MB_a
		O_DAP_MO_xx_a
SDI interface board SDI-150	51.0.0.0	O_DAP_SDI_a
AES interface board DD-188A	7.0.0.0	O_DAP_AES_a
Dolby Decoder CAT1100	3.0.0.0	O_DAP_Dolby_DEC_b
Dolby Encoder CAT559	1.1.4.0	O_DAP_Dolby_EENC_a
Dolby Decoder CAT561	2.4.0.8	O_DAP_Dolby_DENC_a
GfK Watermarking JDSPA		O_DAP8_WM_GFK_a
Firmware	1.3.6.0	
Bootloader	1.2.3.0	
FM Conditioner Coprocessor JDSPA		O_DAP8_FM_a
Firmware	0.7.0.0	
Bootloader	1.2.3.0	

Changes:

- new feature (*Dante*) Dante firmware version updated - device is now prepared for AES67 mode operation
- new feature (*Audio*) Spectral Signature can now be set to manual freeze to stop it from reacting on unwanted audio signals or make use of it as a static equalizer
- new feature (*X*AP*) automatically reconnects after network drop out or power down (X*AP firmware update required!)
- new feature (*X*AP*) automatic IP-conflict detection and warning (X*AP firmware update required!)
- new feature (*Web UI*) Dante locked status and AES67 mode shown on Dante interface status page
- new feature (*DOLBY*) Cat1100 firmware 3.0.0.0 supported
- improved (*Web UI*) routing matrix scaling permanently enabled
- improved (*Web UI*) X*AP enable checkboxes greyed out for Remote Hotkeys greater than eight
- fixed (*X*AP*) problem with stopping and not reconnecting meters
- fixed (*Web UI*) problem with stopping and not reconnecting meters
- fixed (*Web UI*) integrated output loudness was not shown in measurement
- fixed (*Web UI*) time and date are no longer restored from backup file
- fixed (*Web UI*) issue when setting crosspoints in Google Chrome
- fixed (*JDSPA*) system is no longer trying to fetch parameters from JDSPA if only the bootloader and no firmware is present

Version 5.0.3 _____ 2016-09-29 _____

Changes:

- new feature (*Audio*) added Fail Return time to Surround Detector in Upmix
- new feature (*Audio*) Fail Over Wait and Return times increased to a maximum of 120 seconds
- improved (*Firmware*) stability after firmware update process
- fixed (*Audio*) problem with surround detection in Upmix
- fixed (*Audio*) problem with failover feeding the Upmix
- fixed (*Web UI*) minor glitches when minimizing On Air windows
- fixed (*System*) gateway setting is no longer reset on restore factory defaults if IP reset is deselected

Version 5.0.2 _____ 2016-08-23 _____

Changes:

- fixed (*Web UI*) problem when switching between Spectral Signature tab and other browser tabs

Version 5.0.1 _____ 2016-08-15 _____

Corresponding minimum software versions:

Remote Panel X*AP RM1	1.9.5	X*AP RM1
J*AM - Jünger Application Manager	2.9.10	J*AM
Dante interface board DT-100	1.0.3.8	O_DAP_DANTE_a
Firmware	8.0.0.0	
Module Software	3.7.0	
Module MB App	1.0.3	
MADI interface board MX-164	9.0.0.0	O_DAP_MB_a
		O_DAP_MO_xx_a
SDI interface board SDI-150	51.0.0.0	O_DAP_SDI_a
AES interface board DD-188A	7.0.0.0	O_DAP_AES_a
Dolby Decoder CAT1100	2.1.0.4	O_DAP_Dolby_DEC_b
Dolby Encoder CAT559	1.1.4.0	O_DAP_Dolby_EENC_a
Dolby Decoder CAT561	2.4.0.8	O_DAP_Dolby_DENC_a
GfK Watermarking JDSPA		O_DAP8_WM_GFK_a
Firmware	1.3.6.0	
Bootloader	1.2.3.0	
FM Conditioner Coprocessor JDSPA		O_DAP8_FM_a
Firmware	0.7.0.0	
Bootloader	1.2.3.0	

Changes:

- new feature (*Audio*) FM Conditioner with four independent stereo programs is now available for D*AP8 (JDSPA-Coprocessor hardware option board and license required)
- new feature (*Watermarking*) GfK Watermarking encoder is now available (JDSPA-Coprocessor hardware option board and license required)
- new feature (*Audio*) Level Magic is now equipped with a response boost function that temporarily increases its reaction to incoming high level signals - please refer to the manual for details
- new feature (*Audio*) Level Magics initial response to already normalized audio material was significantly improved
- new feature (*Audio*) Level Magic is now equipped with an automatic Clear Processing History function that resets the system on long periods of disrupted audio. Please note, Below Threshold Mode needs to be set to Release
- new feature (*Mobile UI*) configurable button matrix (please see Mobile UI side menu)
- new feature (*System*) the real time clock can now be synchronized to NTP time servers
- improved (*Web UI*) added comment to latency compensation setup
- fixed (*System*) occasionally empty system log
- fixed (*Measurement*) peak hold problem in aux and monitor meter
- fixed (*Web UI*) changed routing matrix naming from Sub to LFE

- fixed (*Web UI*) minor handling issues in remote hotkey list
- fixed (*Web UI*) display issue in bypass events in case of short program names
- fixed (*Web UI*) text in quotation marks are no longer deleted at Trigger Equations page
- fixed (*Backend*) unnecessary device reboot in rare cases when loading web UI in several browsers at the same time

Known issues:

- This firmware release is not yet compatible to Microsofts Edge browser
Workaround: Under Windows 10 use any of the successfully tested browsers (Chrome, Firefox, Opera, Internet Explorer)

Version 4.3.4 _____ 2016-03-22 _____

Changes:

- fixed (*Presets*) problem when deleting presets while being loaded
- fixed (*Presets*) empty preset groups are no longer automatically restored to factory settings on reboot

Version 4.3.3 _____ 2016-03-01 _____

Changes:

- fixed (*Audio*) ARIB TR-B32 has returned to the Loudness Mode list
- fixed (*Mobile UI*) deleting Hotkeys no longer stops Mobile UI from loading

Version 4.3.2 _____ 2016-02-05 _____

Changes:

- fixed (*Audio*) downmix output gain is now working as expected
- fixed (*Audio*) non working Spectral Signature in some channels after factory defaults restore
- fixed (*Backup*) unnecessary reboot after restoring backup file
- fixed (*Web UI*) Microsoft Edge is not supported yet and now showing an unsupported browser message
- improved (*Web UI*) Firefox on Windows 10 is now supported
- improved (*Web UI*) option board detection error message clarified

Known issues:

- ARIB TR-B32 loudness mode accidentally got lost and will return with the next version.
Workaround: Just use ITU BS1770-3 mode instead as it has identical processing! The system will automatically switch to ITU BS1770-3 and work as always.
Please note, this is only a naming issue without any impact on audio quality or processing behaviour. Version 4.3.0 to 4.3.2 are affected.

Version 4.3.1 _____ 2016-01-20 _____

Changes:

- Please see release version 4.3.0 for all major new functions and improvements!
- new feature (*X*AP*) remote feature set 'Metering and Hotkeys
- fixed (*Web UI*) unnecessary second SDI interface entry in metadata routing removed
- fixed (*Web UI*) black favicon in Internet Explorer
- fixed (*Web UI*) problem with reloading login page after a couple of seconds, when authentication is active

Version 4.3.0 _____ 2015-12-18 _____

Corresponding minimum software versions:

Remote Panel X*AP RM1	32377	X*AP RM1
J*AM - Jünger Application Manager	2.9.10	J*AM
Dante interface board DT-100	1.0.3.7	O_DAP_DANTE_a
Firmware	7.0.0.0	
Module Software	3.7.0	
Module MB App	1.0.3	
MADI interface board MX-164	7.0.0.0	O_DAP_MB_a
		O_DAP_MO_xx_a
SDI interface board SDI-150	51.0.0.0	O_DAP_SDI_a
AES interface board DD-188A	7.0.0.0	O_DAP_AES_a
Dolby Decoder CAT1100	2.1.0.2	O_DAP_Dolby_DEC_b
Dolby Encoder CAT559	1.1.4.0	O_DAP_Dolby_EENC_a
Dolby Decoder CAT561	2.4.0.8	O_DAP_Dolby_DENC_a

Changes:

- new feature (*Audio*) manual voice over
- new feature (*X*AP*) remote access via X*AP RM1 can now be restricted to certain function sets
- new feature (*Web UI*) important status messages are now shown on a red info bar
- new feature (*Web UI*) preset cleanup function helps deleting unused presets
- new feature (*Mobile UI*) functions can now be locked or hidden from Mobile UI via Remote Access control page
- new feature (*Dolby*) Dolby firmware version 2.1.0.2 for CAT1100 officially supported
- improved (*Audio*) manual stereo routing is now carried out simultaneously for both channels
- improved (*Audio*) added ITU 1770-4 mode. This mode equals ITU 1770-3
- improved (*System*) status and front panel display turns red on DSP halt
- improved (*Dolby*) output mute on non-audio flag now consistent
- improved (*Sync*) AES audio input channel 1/2 is now added as a default to the sync priority list
- improved (*Firmware*) firmware files are internally checked for compatibility before update
- improved (*Factory Defaults*) default settings for the loudness recommendations are up to date again
- improved (*Backup*) added serial number to exported backup file name
- improved (*Licensing*) Dolby E encoder license is now shown more clearly in license list
- fixed (*Audio*) problem with LFE Effect Gate in Upmix
- fixed (*Dante and MADI*) rarely occurring problem with detection of option boards DT-100 and MX-164 on startup
- fixed (*MADI*) unwanted cpu load with unconnected MADI inputs
- fixed (*Web UI*) problem with occasional appearing script problem in some browsers
- fixed (*Web UI*) rarely occurring Web UI inaccessibility due to system overload
- fixed (*Web UI*) problem when importing single presets in Chrome and Firefox Browsers
- fixed (*Web UI*) Local SDI and MADI Routing now works properly
- fixed (*Web UI*) problem when modifying routings in preset section
- fixed (*Measurement*) problem with sorting of both measurement slots after page reload
- fixed (*Measurement*) unintended opening of speech gate in Dialnorm measurement without input signal present
- fixed (*Mobile UI*) monitor level meter now in the correct color
- fixed (*Dolby*) removed unnecessary error message from systems without Dolby E encoder
- fixed (*Dolby*) wrong latency in Decoder/Emulation mode after initial boot
- fixed (*System*) problem with manual voice over breaking when simultaneously activated via Web UI and Events

Known issues:

- A red status bar is showing a backup while J*AM software is connecting to the device. This happens because the software cannot distinguish between a user initiated backup and the status data that is retrieved by J*AM.
Workaround: Just ignore this message
- Sending metadata with ACMMod 2/0 and LFE On to the Dolby D/D+ encoder causes a 13 ms offset between the L and R channel in encoder 2
Workaround: Do not use this invalid ACMMod 2/0 with LFE on
- Downmix output gain not working. (Fixed in 4.3.2)
Workaround: Use gain in output section.

Version 4.2.4 _____ 2015-08-14 _____

Changes:

- improved (*Web UI*) bootloader version is now shown on firmware page
- fixed (*Web UI*) possible problem with shifting lines in Firefox 40 and above
- fixed (*Backup*) rare problem restoring backup files shortly after reboot or initialization

Version 4.2.2 _____ 2015-07-30 _____

Changes:

- fixed (*Device Front Panel*) problem displaying umlauts and special characters
- fixed (*Web UI*) menu labels no longer contain local typeset characters unintendedly

Version 4.2.0 _____ 2015-07-22 _____

Corresponding minimum software versions:

Remote Panel X*AP RM1	30314	X*AP RM1
J*AM - Jünger Application Manager	2.8.12	J*AM
Dante interface board DT-100	1.0.3.6	O_DAP_DANTE_a
Firmware	6.0.0.0	
Module Software	3.7.0	
Module MB App	1.0.3	
MADI interface board MX-164	5.0.0.0	O_DAP_MB_a
		O_DAP_MO_xx_a
SDI interface board SDI-150	51.0.0.0	O_DAP_SDI_a
AES interface board DD-188A	7.0.0.0	O_DAP_AES_a
Dolby Decoder CAT1100	2.1.0.0	O_DAP_Dolby_DEC_b
Dolby Encoder CAT559	1.1.4.0	O_DAP_Dolby_EENC_a
Dolby Decoder CAT561	2.4.0.8	O_DAP_Dolby_DENC_a

Changes:

- new feature (*Audio*) automatic dual mono switching for incoming single channel signals as part of the failover system
- new feature (*Dolby*) support for Dolby CAT1100 firmware version 2.1.0.0
- new feature (*Dolby*) CAT1100 option board now supports Dolby E encoding (license required)
- new feature (*Firmware*) all option board firmwares are now automatically updated with the main system firmware and kept consistent to avoid any firmware mismatch
- improved (*Audio*) routing handling for removed option boards
- improved (*Firmware*) incompatible option board firmware is now reported for lower and higher firmware versions
- improved (*Web UI*) missing presets in preset events are now marked clearly
- improved (*Web UI*) unauthorized logins are now collected into a single system message
- improved (*Web UI*) naming consistency for all input and output parameters
- improved (*Web UI*) preset name display within EQ diagram
- improved (*Web UI*) Spectral Signature expert mode now states the center frequency of each band
- improved (*Web UI*) system status page now features a Diagnostics File download button instead of the export log function
- improved (*X*AP & Mobile UI*) system prepared for remote access filtering - coming soon
- improved (*Presets*) event and preset settings are now synchronized to avoid loss of changes made right before reboot
- fixed (*Web UI*) dynamics are now greyed out correctly on bypass
- fixed (*Web UI*) problems with metering bars when using Chrome browser and Windows 8
- fixed (*Web UI*) backup restore preset filter is now graphically separated from other restore filter options
- fixed (*Web UI*) Dante input channel 16 now shows correct subscription status
- fixed (*Metering*) problem with selecting program 2 in the upper measurement box
- fixed (*Events*) empty parameter events no longer appear as other event types

- fixed (*Events*) missing triggers can now be removed from actions without problems
- fixed (*Ember+*) possible race conditions for fragmented S101 packets causing VSM studio to crash
- fixed (*Dolby*) preset handling in Decoder/Emulation mode
- fixed (*AES option*) AES option board DD-188A can now be used as system sync source
- fixed (*Ember+*) memory leak in Ember+ server when sending warning events

Known issues:

- A Dolby E Encoder (CAT561) firmware bug causes an audible delay of about 13 ms between channel 1 and 2 of Encoder 2, if Encoder 1 is switched to "2 (two-channel)"
Workaround: Set Encoder 1 to "5.1 (surround)" instead of "2 (two-channel)" even if using stereo in Encoder 1
- Frontdisplay is not capable of displaying umlauts and some special characters
- System overview sometimes causes a 'script not responding' error when clicking any items
Workaround: On error use the main navigation tabs instead of the block diagram to navigate

Version 4.1.1 _____ 2015-05-12 _____

Corresponding minimum software versions:

Remote Panel X*AP RM1	30008	X*AP RM1
J*AM - Jünger Application Manager	2.8.12	J*AM
Dante interface board DT-100	1.0.3.5	O_DAP_DANTE_a
Firmware	5.0.0.0	
Module Software	3.7.0	
Module MB App	1.0.3	
MADI interface board MX-164	5.0.0.0	O_DAP_MB_a
		O_DAP_MO_xx_a
SDI interface board SDI-150	51.0.0.0	O_DAP_SDI_a
AES interface board DD-188A	6.0.0.0	O_DAP_AES_a
Dolby Decoder CAT1100	1.6.0.7	O_DAP_Dolby_DEC_b
Dolby Encoder CAT559	1.1.4.0	O_DAP_Dolby_EENC_a
Dolby Decoder CAT561	2.4.0.8	O_DAP_Dolby_DENC_a

Changes:

- new feature (*Audio*) added more factory default presets
- new feature (*Dante*) support for Dante Audio-over-IP Option Board DT-100
- new feature (*Dante*) parameter triggers from Dante network states and audio conditions
- new feature (*MADI*) support for MADI optical/coaxial Option Board MX-164
- new feature (*MADI*) parameter triggers from MADI states and audio conditions
- new feature (*SDI*) redesigned SDI web interface for easy setup, routing and status overview
previous settings are preserved; please become familiar with the new SDI interface after updating!
- new feature (*Firmware*) system firmware now carries all option boards firmware
after updating the system firmware please take a look at the SYSTEM -> Firmware Update page to see whether an option board firmware is available
updating option boards may take a while, please be patient and refer to the Update Guide in the firmware package
- new feature (*Measurement*) Dolby Dialnorm measurement now indicates speech gate activity
- new feature (*X*AP*) recent measurement results are now available
- new feature (*X*AP*) Dolby Dialnorm measurement now indicates Dialogue Intelligence Speech Gate activity
- new feature (*Web UI*) real time processing latency display
- new feature (*Console*) added ctrl + c command to return to console main menu from submenu
- improved (*Audio*) analog outputs automatically mute on non audio signals
- improved (*Audio*) factory default Loudness Mode is now ITU 1770-3
- improved (*Audio*) Level Magic reaction to high level input signals when using Fast Recovery mode
- improved (*Audio*) processing latency display now includes routing delay of three samples
- improved (*System*) import of backup files created from older T*AP devices
- improved (*Option Boards*) components are now reset separately after updating their individual firmwares
- improved (*Dante*) Dante Sync Source display shows detailed info about *AP sync source

- improved (*Dante*) channel status detects all SMPTE non-audio types
- improved (*Measurement*) metering data is not displayed (instead -/- is shown) until their values become valid
- improved (*Web UI*) Processing Profiles are now named equally in all applicable processors
- improved (*Web UI*) Voice Over block diagram for better intelligibility of signal flow
- improved (*Web UI*) added latency compensation block to stereo path in Upmix block diagram
- improved (*Web UI*) minor graphic and naming consistency issues with Level Magic
- improved (*Web UI*) naming consistency for all input and output parameters
- improved (*Web UI*) input filters now have sliders instead of dropdowns like all other filters
- improved (*X*AP*) initial gain and clear history function for Level Magic now adjustable via X*AP
- improved (*X*AP*) Dolby Dialnorm measurement now indicates Dialogue Intelligence Speech Gate activity
- improved (*Mobile UI*) related graphs are now visually connected by brackets
- improved (*Mobile UI*) user Operator now has access to all Mobile UI functions
- improved (*Mobile UI*) non mobile devices now show standard scroll bars for longer lists
- improved (*Mobile UI*) touch support for iOS devices
- improved (*Mobile UI*) users can now logout manually
- improved (*Mobile UI*) redirect to Mobile UI is now performed before password request preventing double logins
- improved (*Mobile UI*) metering on tablet devices
- improved (*Network*) stability by filtering broadcast and multicast network traffic
- improved (*Presets*) and fine-tuned some parameters within factory default presets and events
- improved (*Events*) audio processor triggers are now hidden for unlicensed processing blocks
- improved (*Dolby*) decoding of 7.1 signals is now possible with all devices
- fixed (*Audio*) sound distribution in front and rear channels causing strange balance issues when using Upmix with auto mono/stereo detection
- fixed (*Audio*) latency compensation for Aux input
- fixed (*Audio*) bypassing Voice Over becomes audible immediately
- fixed (*Audio*) bypass is now separated for compressor and expander
- fixed (*Web UI*) problem with Spectral Signature real-time graphic display when preset is selected and channels are unlinked
- fixed (*Web UI*) scroll bar problem in routing matrix
- fixed (*Web UI*) minor glitches in web interface graphics
- fixed (*Web UI*) graphical problems with routing matrix preset
- fixed (*Web UI*) issue with routing matrix displayed in downscaled browser windows
- fixed (*Web UI*) problem with bouncing mouse wheels when setting parameters to their boundary values
- fixed (*Web UI*) unauthorized changes made by user Operator are now correctly reset to last valid values
- fixed (*Web UI*) problem with filter graphs when switching between Program Configs
- fixed (*Web UI*) inconsistency in equalizer graph operation over independent programs
- fixed (*Web UI*) disappeared EQ curves in Internet Explorer
- fixed (*Web UI*) disappeared spectral signature graph curves and Firefox
- fixed (*Web UI*) misplaced backup restore box with long file names
- fixed (*Web UI*) preset events for 4x2 mode fail over are now correctly displayed and set
- fixed (*Web UI*) copy and paste operations now work flawlessly in preset events
- fixed (*Web UI*) problem with preset names in Spectral Signature when using Chrome or Internet Explorer
- fixed (*Web UI*) Clear Processing History is now set correctly in presets
- fixed (*Web UI*) minor consistency issues in fail over block diagram
- fixed (*Mobile UI*) occasionally unnecessarily reappearing authentication box
- fixed (*Mobile UI*) active firmware update message is now displayed properly
- fixed (*Measurement*) Dolby Dialnorm measurement now works in all program configurations
- fixed (*Measurement*) initialization issue in program measurement
- fixed (*X*AP*) Spectral Signature learn function now correct (per program) in stereo mode
- fixed (*Dolby*) metadata generator now correctly displays metadata fail if the module is set to decoding mode mute
- fixed (*System*) problem caused by long term network inactivity

- fixed (*System*) occasionally unavailable web interface although unit remains working normally
- fixed (*Device Front Panel*) monitor metering now shows correct values
- fixed (*Backup*) restoring backup files using Internet Explorer now works flawlessly

Known issues:

- (MADI) only sample rates that can be recognized by the system will be displayed correctly
- When updating the units firmware, coming from an earlier version the system may regret recognizing the new firmware file as a valid version. A message may appear stating that the file is not suitable for this unit or the MD5 checksum is wrong. This is caused by a change in firmware file structure and can be avoided by using a basic firmware file prior to updating to the final full version.
 solution: please see the Update Guide pdf provided in the firmware zip file for details
- some audio blocks may not turn grey on bypass

Version 4.1.0 _____ 2015-05-11 _____

Changes:

- technical version, final release version is 4.1.1 (see above)

Version 4.0.5 _____ 2015-04-30 _____

Changes:

- fixed (*Audio*) problem with wrong level distribution when using upmix and auto switching

Version 4.0.4 _____ 2015-03-26 _____

Changes:

- fixed (*Audio*) level mismatch when using auto upmix switching with 5.1 surround signals
- fixed (*Audio*) inter channel latency offset when using aux input to upmix processor

Version 4.0.2 _____ 2015-03-12 _____

Changes:

- changed (*Audio*) default loudness mode to ITU BS.1770-3
- fixed (*Audio*) factory default presets in audio processor setup
- fixed (*Web UI*) wrong unit for Audio Processor Latency in Latency Management (was samples)
- fixed (*Web UI*) scrolling problem in SDI local routing matrix
- fixed (*Audio*) problem with individual bypasses in Bypass Actions for Program 2
- fixed (*Network*) removed unnecessary occasional reboot caused by network inactivity
- fixed (*Dolby*) reboot problem on metadata reversion preset

Version 4.0.1 _____ 2015-02-13 _____

Changes:

- technical release, no changes

Version 4.0.0 _____ 2015-02-02 _____

Initial release for the D*AP8 processing platform

This firmware supports D*AP8 TAP EDITION, D*AP8 CODEC EDITION and D*AP8 FLX

Corresponding software versions:

X*AP RM1:	28611
J*AM - Jünger Application Manager:	2.8.10.28388
SDI interface board:	51.0.0.0
AES interface board DD188A:	6.0.0.0
Dolby Decoder CAT1100:	1.6.0.7
Dolby Decoder CAT561:	2.4.0.8
Dolby Encoder CAT559:	1.1.4.0

Changes:

- new feature (*Audio*) powerful upmix algorithm for upmixing stereo or even mono sources at highest quality while remaining fully downmix compatible
- new feature (*Audio*) LFE extraction within upmix with adaptive effect gating
- new feature (*Audio*) Spectral Signature now uses an improved detection algorithm that is insensitive to phase problems of the input signal
- new feature (*Audio*) sophisticated sync system with multi-step fail switching
- new feature (*Audio*) input and output delay now supports settings in coarse (milliseconds) and fine (samples) values
- new feature (*Audio*) comprehensive set of factory presets included
- new feature (*Audio*) six filter types for all EQ bands
- new feature (*Dolby*) fully featured Dolby metadata emulation system
- new feature (*Dolby*) option slot for next generation Dolby CAT1100 codec module
- new feature (*Firmware*) all option boards firmwares are now included in the units main firmware file
- new feature (*Web UI*) completely redesigned SDI user interface with improved handling and status overview
- new feature (*Web UI*) mono routing matrix
- new feature (*Web UI*) full Spectral Signature control with graphical interface via Web UI
- new feature (*Web UI*) Spectral Signature now offers a 1/f-balanced spectrum display option
- new feature (*Web UI*) 5-band equalizer with graphical user interface and program compare function
- new feature (*Web UI*) comprehensive loudness measurement in Web UI including Dolby Dialnorm
- new feature (*Web UI*) real time processing latency display
- new feature (*Mobile UI*) browser accessible Mobile UI
- improved (*Audio*) additional timing profiles for dynamics and Level Magic
- improved (*Audio*) Level Magic now features an independent parameter for leveler and limiter processing profile
- improved (*Audio*) short fade on program configuration change prevents audio glitches
- improved (*Web UI*) redesigned trigger-event-action system
- improved (*Web UI*) dynamic presets
- improved (*Web UI*) user access management
- improved (*Web UI*) sliders are now updated in real time (hear changes while dragging the slider)
- improved (*Web UI*) system time clock
- improved (*Web UI*) minor problems and naming consistency issues

Known issues:

- X*AP RM1 may show 'unknown device' when attempting to connect to D*AP8 due to old firmware
solution: visit www.junger-audio.com, download and install the latest X*AP RM1 firmware
- interface (option board) firmware update may not work (stops uploading at about 3 percent)
with more than one Web UI connected (browser session count problem)
workaround:
 1. reboot the unit (SYSTEM - Reboot)
 2. close all open browser connections, including Mobile UI and Web UI
 3. reopen just one browser and try updating again
- (*Dolby*) wrong latency in Decoder/Emulation mode after initial boot
workaround: switch to Decoder mode and back to Decoder/Emulation mode