



3 group



Tallinn Playout Centre

Specifications for Television Programme & Commercial Delivery 2022

Introduction.

Version. 8

Please read this document carefully, because the majority of the response to your questions can be found here.

This document defines the technical standards for programme, commercial and promo materials to be delivered to TV3 Group Tallinn Playout Centre as digital files. The purpose of this document and associated material is to set out the technical requirements to ensure that material delivered is of to a satisfactory broadcast standards. This document also stipulates technical parameters and minimum requirements for quality content. All content must arrive in Tallinn Playout Centre 3 working days prior to transmission.

It is mandatory that all material meet our requirements. In short we accept only 16:9 Full HD (FHD) video format for all content (about TV animation BUGs see page 7), with all graphical content positioned in safe area and with no more than 2 channels mastered audio per file. If the following criteria's are not met, than most probably your material will be rejected.

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Video File Specification

Video Specification:

Container:	MXF OP1a
Codec:	XDCAM HD4:2:2 1080i50
Resolution:	1920×1080
Pixel aspect ratio:	Square
Scan Type:	Interlaced Only
Field Order:	Upper Field First (Top)
Frame Rate:	25fps / PAL
Bitrate:	50 Mbit/s
Bitrate mode:	CBR / Constant Bitrate
Bit depth:	8 bit
Chroma subsampling:	4:2:2
GOP structure:	long GOP / N=12
Aspect ratio:	16:9 Full Frame
Title & graphic safe area:	All inside an area of 95% is mandatory

Audio Specification:

Format:	Linear PCM (WAVE)
Bitrate mode:	CBR Constant Bitrate
Sampling rate:	48.000 kHz
Bit depth:	24 bit
Audio order:	1-2 ch Stereo Full Mix

Audio sync relative to video shall not deviate by more than 20ms. With no more than 2 channels mastered audio per file.

File Naming

File names should be possibly short with maximum length of 40 characters. It should be easy to identify each file. Use of symbols and odd letters in file name like **ÄÖÜ%** etc. **are prohibited.**

Commercial clips:

'Brand_Campaign_Date_Length_LanguageID

Example 'COOP_Nadala_Tahed_W16_20s_EST' (for Estonian clip)

Example 'COOP_Nadala_Tahed_W16_20s_RUS' (for Russian clip)

If brand or campaign name is too long use big letter of each word or abbreviations.

Example 'Eesti Telekom' = 'EMT'

No files can be overwritten, edit or delete by you in our destination ftp. For new version clip name should be changed adding word **'NEW'** at the end. If the changes occur more than once - add number of change after the new 'NEW1' or 'NEW2' etc.

Programme files:

'ProgrammeName_EpisodeNr_Airdate

If programme name is too long use big letter of each word.

Example 'Eesti Otsib Superstaari' = 'EOS'

File Length & Timecodes

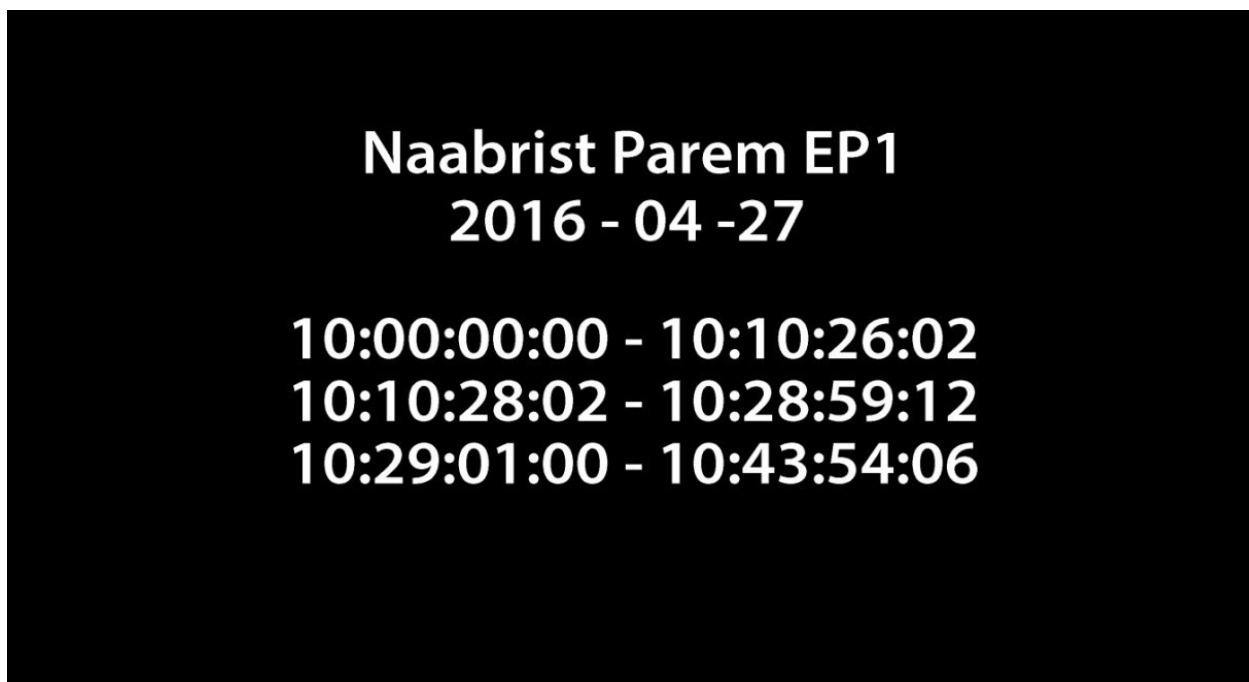
Commercial clips:

All the commercial clips are accepted with in full length in seconds **ONLY**. No missing or extra frames are allowed. So for 10 sec file the clock on your time code should be **00:00:10:00**. TC should be embedded and continuous. All materials must start and end with filled frame. Minimum duration of commercial clip is **4 seconds**.

Programme files:

All the programme content should have 10 sec black and silence on front. Programme start of spot derived from this should always be **10:00:00:00**. Ident table with timecodes at the top of programme are allowed for 7 sec, that means the **3 sec black** and silence before the programme start point 10:00:00:00 is **MANDATORY**. Commercial brake spots in programme should have about 2 sec black & silence.

Product ident table example:



Product identifier should contain:

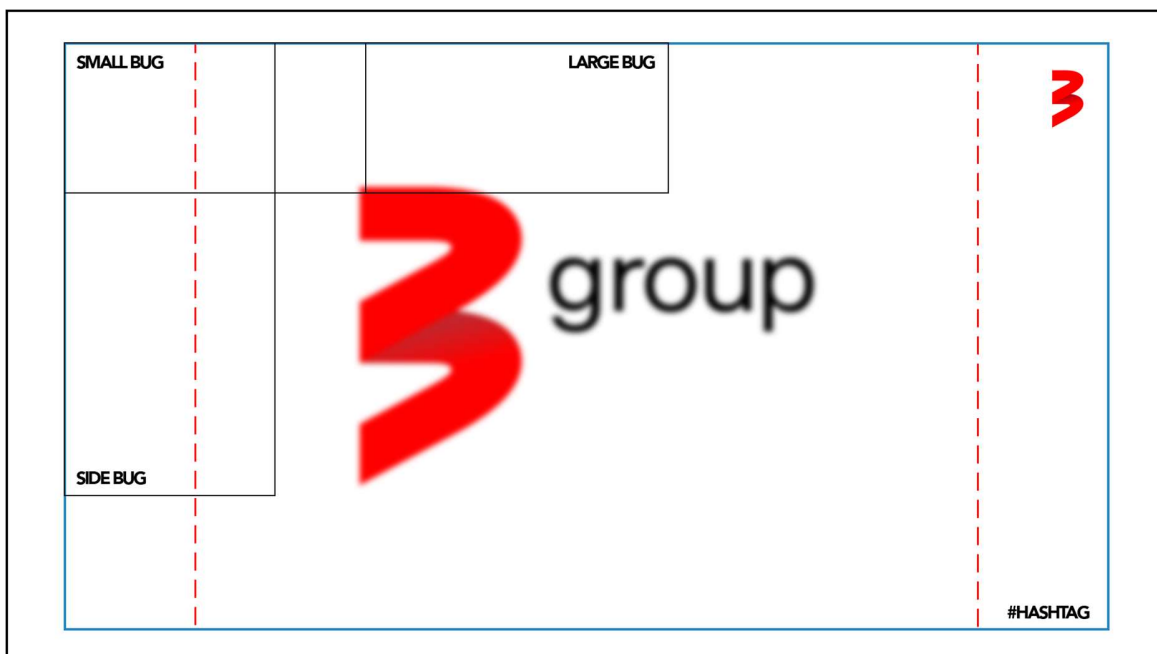
1. Product title
2. Episode number
3. IN/OUT time codes
4. Commercial brake time codes

Video & Graphics Requirements

Video levels are based on the PAL system. Which specifies 0 to 100% RGB Limits. We require that signals meet the EBU recommendation R103-2000 with Luminance limits -1% and 103%. Chrominance 105% max - RGB values to not exceed limits -5% to +105%. TV3 Group requires that all video material (except TV animation BUGs - see page 7) shall be delivered in 16:9 Full HD (FHD) 1920x1080 pixels with all pixels containing active info. All material shall not have black edges/borders unless it is targeted by its concept, example as cinematic view. The Broadcaster reserves the right to change the aspect ratio to match it to TV3 Group standard.

Safe Area

We recommend that you set in your editor software safe margin grids visible and place all graphic content strictly inside of it. This is **MANDATORY** that all graphical content on all programmes and commercial clips - artwork, logos and other information, including burnt in subtitles, remain inside the safe area, **95%** is mandatory as described in file specification. Read more about safe area from EBU: <https://tech.ebu.ch/docs/r/r095.pdf>



- Safe area, according to EBU R 95 (Version 1.1 2017) 95% of 16:9 image format on 1920x1080 resolution.
- - - 4:3 caption safe area 83,75% of 16:9 image format (1296 px wide).
- TV BUG area locations, see more on page 7.

* All graphical content should remain inside safe area grids, 95% of 16:9 format on 1920x1080 screen resolution.

Graphics

While developing your programme graphical ident and content you need to keep in mind that nothing could be positioned under TV Logo area, also it is not recommended positioning anything important under SMALL or LARGE TV BUG locations (see page 7). We recommend to use safe color combinations and add 'flicker' effect on artwork video channel, especially when using thin text elements or external images. Burnt in subtitles for programme files are not allowed exceptions are made only by programme department. For sponsor clip is required to have title "Saadet Toetab" visible for at least 4 sec in duration, for Russian in Cyrillic "Передачу Поддерживает".

Audio Requirements

Audio shall be in lip sync with the picture content and **MASTERED**. Only 2 audio channels per file. Levels shall always be measured by Peak Programme Meters (**PPM**) to **BS 5428**. No peak is allowed to exceed **-10dBfs** according to EBU Digital scale **IEC 268**. The main character which will be measured and according to what transmission levels will be set for all programmes and commercials is the Audio Dynamic Range. Whole audio **Loudness VU** shall be consistent and not contain dynamic excursions that could hamper listening comfort. Therefore programme loudness could vary between **-14 LUFS (max)** to **-28 LUFS (min)** and be average **-18 LUFS**. Average loudness for commercials is set to **-20 LUFS**. On our document 1 LUFS = 1 dBfs on EBU Digital scale. The Broadcaster reserves the right to change the audio levels to match it to TV3 Group standard.

Digital Audio reference is defined as 18dB below the maximum coding value (-18dBfs) as per EBU recommended practice R68. (EBU R68 = EBU Digital scale). More about audio levels read from official EBU page here: <https://tech.ebu.ch/docs/tech/tech3343.pdf>

Volts	dBu	IEC I Nordic	IEC IIa (BBC)	IEC IIb	DIN (RTW)	VU		EBU R68	
12.277 V	24dBu					Standard	France		
10.941 V	23dBu								
9.752 V	22dBu								
8.691 V	21dBu								
7.746 V	20dBu								
6.904 V	19dBu								
6.153 V	18dBu								
5.484 V	17dBu								
4.887 V	16dBu								
4.356 V	15dBu								
3.882 V	14dBu							0 dBfs	
3.460 V	13dBu							-1 dBfs	
3.084 V	12dBu	+12	7	+12				-2 dBfs	
2.748 V	11dBu	+11		+11	+5			-3 dBfs	
2.449 V	10dBu	+10		+10	+4			-4 dBfs	
2.183 V	9dBu	+9		+9	+3			-5 dBfs	
1.946 V	8dBu	+8	6	+8	+2			-6 dBfs	
1.734 V	7dBu	+7		+7	+1	+3		-7 dBfs	
1.546 V	6dBu	+6		+6	0	+2		-8 dBfs	
1.377 V	5dBu	+5		+5	-1	+1		-9 dBfs	
1.228 V	4dBu	+4	5	+4	-2	0		-10 dBfs	
1.094 V	3dBu	+3		+3	-3	-1		-11 dBfs	
0.975 V	2dBu	+2		+2	-4	-2		-12 dBfs	
0.869 V	1dBu	+1		+1	-5	-3	+3	-13 dBfs	
0.775 V	0dBu	test	4	test	-6	-4	+2	-14 dBfs	
0.690 V	-1dBu	-1		-1	-7	-5	+1	-15 dBfs	
0.615 V	-2dBu	-2		-2	-8	-6	0	-16 dBfs	
0.548 V	-3dBu	-3		-3	-9	-7	-1	-17 dBfs	
0.489 V	-4dBu	-4	3	-4	-10	-8	-2	-18 dBfs	
0.436 V	-5dBu	-5		-5	-11	-9	-3	-19 dBfs	
0.388 V	-6dBu	-6		-6	-12	-10	-4	-20 dBfs	
0.346 V	-7dBu	-7		-7	-13	-11	-5	-21 dBfs	
0.308 V	-8dBu	-8	2	-8	-14	-12	-6	-22 dBfs	
0.275 V	-9dBu	-9		-9	-15	-13	-7	-23 dBfs	
0.245 V	-10dBu	-10		-10	-16	-14	-8	-24 dBfs	
0.218 V	-11dBu	-11		-11	-17	-15	-9	-25 dBfs	
0.195 V	-12dBu	-12	1	-12	-18	-16	-10	-26 dBfs	
								-27 dBfs	
								-28 dBfs	
								-29 dBfs	
								-30 dBfs	

We don't accept any material with audio peak levels set to 0 dBfs.

Maximum True Peak Levels -10dBfs

Maximum Programme Loudness -14 LUFS

Average Programme Loudness -18 LUFS

Maximum Commercial Loudness -20 LUFS

EBU R 128 -23LUFS +/- 0.5 (Version 3.0 2016)

1LUFS = 1dBfs on Digiscale

Minimum Programme Loudness -28 LUFS

File Delivery & Approval

Licensor shall deliver Materials at its own cost, including but not limited to transfer software, hardware and file delivery costs. Broadcaster has the full right to reject materials that do not comply with a TV3 Group high technical broadcast standards.

Exceptions from these required formats described previously in this document are only allowed with prior approval from Tallinn Playout Centre Traffic department. For the new producers or distributors test file must be provided prior to start of the actual deliveries - use e-mail address 'eeter@tv3.ee' for that. Approval of file deliveries as such and delivery start is subject to TV3 Group acceptance of the provided test file. All transmission materials (electronic files) have to be delivered via dedicated file delivery method, approved by Tallinn Playout Centre Traffic department, described below.

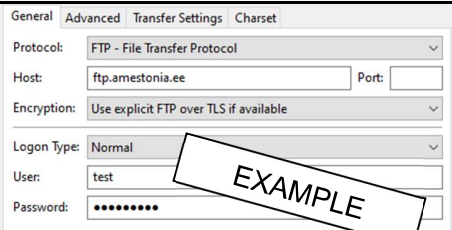
All the files have to be delivered 3 workdays before the air date by 11:00 o'clock. All files will be deleted after it's download. Any streaming or sharing file transfer protocol sites are strictly not accepted due to transfer security, speed and reliability issues. Exceptions for this rule are allowed only with prior approval by TV3 Group Tallinn Playout Centre Traffic department.

Before delivering your content please **check the file name** meets required criteria has only **two mastered audio channels** and **no video errors** or no graphics out of **safe area**. Ensure that the file has **right length** and that you are uploading it **into right place**.

Manually you can deliver your material on external drive to:

All Media Eesti
Peterburi Tee 81
13816 Tallinn, Estonia
Department: Transmission
Second floor. On spot for door opening call: (+372) **6 220 220** & use the doorbell.

Commercial clip upload ftp credits & rules:

<p>ftp.amestonia.ee <i>Note: Server uses only explicit FTP over TLS.</i> tv3reklaamid adsTV3up <i>Note: Also accept certificate during first login.</i> Folder according to language EST (Estonian) or RUS (Russian).</p>	
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All clips should be uploaded into appropriate language route folder and there is no more personal folders for each user or client.

Programme file upload ftp credits & rules:

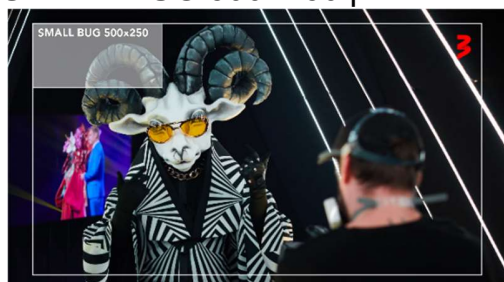
<p>ftp.amestonia.ee <i>Note: Server uses only explicit FTP over TLS.</i> saatedTV3 showUP3 <i>Send notification e-mail & time codes to saated@tv3.ee</i> <i>Note: Also accept certificate during first login.</i> Please use route folder. No personal folder for each show, user or client.</p>

*Those ftp spots are only for final broadcast master files, not for promo content. For promo content ask separate ftp info from programme or marketing department or from mont3@tv3.ee

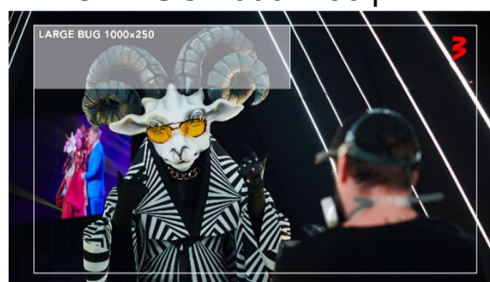
TV Animation BUG

Main rules:	All the bugs should include title "Saadet Toetab"
	All the bugs should include the name of the brand, client, or product presented
	All the bugs should have the first and the last frame EMPTY (with alpha)
	All the bug content have to be positioned with in the 'Safe Area' rules. (inside 95% of screen resolution 1920x1080)
File type:	If only logo than .tga single file, if animation then .tga-sequence (250 files indexed from 000 to 249) compressed into ZIP container
File naming:	Use of symbols and odd letters in file name like ÄÖÕÜ% etc. are prohibited
Dimensions:	Your bug size area only – see below examples
RLE Compression	Yes
Alpha Channel	32 bits/pixel (all frames should have alpha)
Alpha Channel Interpretation	Premultiplied
Frame rate:	25 fps
Aspect ratio:	Square (1:1)
Length:	10 sec – 250 frames, tga files indexing 000 to 249
Opacity 70%:	All bugs should be as animated graphics. Use of solid color background layers are not allowed.

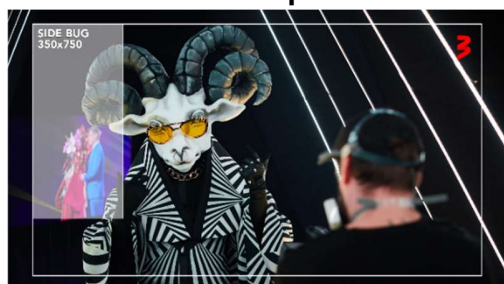
SMALL BUG 500×250 pixels



LARGE BUG 1000×250 pixels



SIDE BUG 350×750 pixels



TV BUG file upload ftp credits & rules:

ftp.amestonia.ee	Note: Server uses only explicit FTP over TLS.
tv3reklaamid	
adsTV3up	
Folder BUG.	Note: Also accept certificate during first login. All bugs should be uploaded as zip. container file.

Bugs have to be delivered 3 days prior first transmission.

Send notification e-mail to planners@tv3.ee

Special solutions by agreement with sales department.

Contacts

Programme department: kart.kynnapas@tv3.ee (All programme content inquiries.)

Sales: katri.sillaste@tv3.ee (All commercial content inquiries.)

Media planners: planners@tv3.ee (All commercial campaign inquiries.)

Marketing: annely.adermann@tv3.ee (All promo and trailer content inquiries.)

Technical department: leho.kagu@tv3.ee (All technical inquiries.)

Playout center: eeter@tv3.ee (All major material delivery inquiries.)

Logobank

Our high resolution logobank:

<https://drive.google.com/folderview?id=0BwXT5Z41mZ84VGJCOGlmZG1EM2M&usp=sharing>

Common Mistakes

Common mistakes that people overlook while preparing and uploading content.

1. **People don't read this specification document.**
2. Files are not delivered on time, 3 days prior first planned transmission date.
3. Accessing our ftp via web browser or with wrong credits or settings on ftp client.
4. Use of wrong file formats.
5. Use of wrong characters in file name.
6. Skipping to send notification e-mails about your upload, as required.
7. Missing audio processing/mastering or using wrong levels.
8. Placing graphical content out of safe area grids.
9. Uploading faulty files without self-control.
10. Constantly trying overwrite files – overwrite rights (as well deletion) are turned off for everyone!
11. Wrong field order on video files.
12. Missing first and last empty alpha frames on tv bug.
13. TV program start point is not set to 10:00:00:00
14. Commercial clips are not with proper length.