**3GPP TSG-S4 Meeting#133-e*****S4-251340***

**Online, 18th–25th July 2025**

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| *CR-Form-v12.0* | | | | | | | | |
| **CHANGE REQUEST** | | | | | | | | |
|  | | | | | | | | |
|  | **26.143** | **CR** | **0004** | **rev** | **1** | **Current version:** | **18.2.1** |  |
|  | | | | | | | | |
| *For* [***HE******LP***](http://www.3gpp.org/3G_Specs/CRs.htm#_blank)*on using this form: comprehensive instructions can be found at* [*http://www.3gpp.org/Change-Requests*](http://www.3gpp.org/Change-Requests)*.* | | | | | | | | |
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| ***Proposed change affects:*** | UICC apps |  | ME | **X** | Radio Access Network |  | Core Network |  |

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| ***Title:*** | **[VOPS] On video coding capabilities and operating points** | | | | | | | | | |
|  |  | | | | | | | | | |
| ***Source to WG:*** | Apple Inc., Qualcomm Incorporated | | | | | | | | | |
| ***Source to TSG:*** |  | | | | | | | | | |
|  |  | | | | | | | | | |
| ***Work item code:*** | **VOPS** | | | | |  | ***Date:*** | | | 2025-07-11 |
|  |  | | | |  | |  | | |  |
| ***Category:*** | **B** |  | | | | | ***Release:*** | | | Rel-19 |
|  | *Use one of the following categories:* ***F*** *(correction)* ***A*** *(mirror corresponding to a change in an earlier release)* ***B*** *(addition of feature),* ***C*** *(functional modification of feature)* ***D*** *(editorial modification)*  Detailed explanations of the above categories can be found in 3GPP [TR 21.900](http://www.3gpp.org/ftp/Specs/html-info/21900.htm). | | | | | | | | *Use one of the following releases: Rel-8 (Release 8) Rel-9 (Release 9) Rel-10 (Release 10) Rel-11 (Release 11) Rel-12 (Release 12)* *Rel-13 (Release 13) Rel-14 (Release 14) Rel-15 (Release 15) Rel-16 (Release 16)* | |
|  |  | | | | | | | | | |
| ***Reason for change:*** | | TS 26.265 is the new home for video coding capabilities. TS 26.143 currently refers to TS 26.511 for this purpose, and this needs to be updated.  AVC-HD encoding and decoding capabilities are not defined in TS 26.265 and these should be removed along with the EN. | | | | | | | | |
|  | |  | | | | | | | | |
| ***Summary of change:*** | | Updated references for video coding capabilities to TS 26.265. | | | | | | | | |
|  | |  | | | | | | | | |
| ***Consequences if not approved:*** | | Video coding capabilities in the TS would point to an incorrect reference. | | | | | | | | |
|  | |  | | | | | | | | |
| ***Clauses affected:*** | | 2, 5.6.1, 5.6.2 | | | | | | | | |
|  | |  | | | | | | | | |
|  | | **Y** | **N** |  | | | |  | | |
| ***Other specs*** | |  | **X** | Other core specifications | | | | TS/TR ... CR | | |
| ***affected:*** | |  | **X** | Test specifications | | | | TS/TR ... CR ... | | |
| ***(show related CRs)*** | |  | **X** | O&M Specifications | | | | TS/TR ... CR ... | | |
|  | |  | | | | | | | | |
| ***Other comments:*** | |  | | | | | | | | |
|  | |  | | | | | | | | |
| ***This CR's revision history:*** | |  | | | | | | | | |

\* \* \* First Change \* \* \* \*

2 References

The following documents contain provisions which, through reference in this text, constitute provisions of the present document.

- References are either specific (identified by date of publication, edition number, version number, etc.) or non‑specific.

- For a specific reference, subsequent revisions do not apply.

- For a non-specific reference, the latest version applies. In the case of a reference to a 3GPP document (including a GSM document), a non-specific reference implicitly refers to the latest version of that document *in the same Release as the present document*.

[1] 3GPP TR 21.905: "Vocabulary for 3GPP Specifications".

[2] Khronos glTF 2.0, [glTF™ 2.0 Specification (khronos.org)](https://registry.khronos.org/glTF/specs/2.0/glTF-2.0.html)

[3] ISO/IEC 23090-14 AMD 2, Information technology — Coded representation of immersive media — Part 14: Scene description — Amendment 2: Support for haptics, augmented reality, avatars, Interactivity, MPEG-I audio, and lighting

[4] 3GPP TS 26.511: "5G Media Streaming (5GMS); Profiles, Codecs and Formats".

[5] 3GPP TS 26.117: "5G Media Streaming (5GMS); Speech and audio profiles".

[6] IETF Draft draft-ietf-mimi-content-01: "More Instant Messaging Interoperability (MIMI) message content", Rohan Mahy

[7] 3GPP TS 22.140: "Multimedia Messaging Service (MMS); Stage 1".

[8] Open Mobile alliance, "MMS Architecture" OMA-AD-MMS-V1\_3-20110913-A.

[9] Open Mobile alliance, "Multimedia Messaging Service Encapsulation Protocol" OMA-TS-MMS\_ENC-V1\_3-20110913-A.

[10] GSMA "RCS Universal Profile Service Definition Document", Version 2.6, 19 December 2022.

[11] GSMA PRD RCC.07 version 13.0 - "Rich Communication Suite - Advanced Communications Services and Client Specification" 19 December 2022.

[12] IETF RFC 2046, "Multipurpose Internet Mail Extensions (MIME) Part Two: Media Types".

[13] ISO/IEC 14496-12: "Information technology - Coding of audio-visual objects -Part 12: ISO base media file format".

[14] ISO/IEC 23000-24:2023 Preliminary Draft of: Information technology — Multimedia application format (MPEG-A) — Part 24: Messaging Media Application Format (MeMAF) ".

NOTE: A preliminary draft of this standard is available as MDS23345\_W03\_N1082 here: https://www.mpeg.org/wp-content/uploads/mpeg\_meetings/144\_Hannover/w23345.zip

[15] 3GPP 23.140: "Multimedia Messaging Service (MMS); Functional Description; Stage 2".

[16] ITU-T Recommendation T.81: "Information technology; Digital compression and coding of continuous-tone still images: Requirements and guidelines".

[17] "JPEG File Interchange Format", Version 1.02, September 1, 1992.

[18] "Exchangeable image file format for digital still cameras: EXIF 2.2", Specification by the Japan Electronics and Information Technology Industries Association (JEITA), April 2002, URL: <http://www.exif.org/>

[19] CompuServe Incorporated: "GIF Graphics Interchange Format: A Standard defining a mechanism for the storage and transmission of raster-based graphics information", Columbus, OH, USA, 1987.

[20] Compuserve Incorporated, Columbus, Ohio (1990): "Graphics Interchange Format (Version 89a)".

[21] IETF RFC 2083: "PNG (Portable Networks Graphics) Specification version 1.0 ", T. Boutell, et. al., March 1997.

[22] ISO/IEC 23000-22:2019 Information technology — Multimedia application format (MPEG-A) — Part 22: Multi-image application format (MIAF)

[23] IETF RFC 2045, "Multipurpose Internet Mail Extensions (MIME) Part One: Format of Internet Message Bodies", November 1996

[24] ISO/IEC 23008-12:2019 Information technology — High efficiency coding and media delivery in heterogeneous environments — Part 12: Image File Format

[25] ITU-T Recommendation H.265 (02/2018): "High efficiency video coding".

[26] 3GPP TS 26.244: "Transparent end-to-end packet switched streaming service (PSS); 3GPP file format (3GP)"

[27] 3GPP TS 26.245: "Transparent end-to-end packet switched streaming service (PSS); Timed text format"

[28] ISO/IEC 14496-30: "Information technology - Coding of audio-visual objects - Part 30: Timed text and other visual overlays in ISO base media file format".

[29] IETF RFC 2387, "The MIME Multipart/Related Content-type"

[30] IETF RFC 6381, "The 'Codecs' and 'Profiles' Parameters for "Bucket" Media Types"

[31] 3GPP TS 26.307, "Presentation Layer for 3GPP Services"

[32] 3GPP TS 26.140, "Multimedia Messaging Service (MMS); Media formats and codecs"

[33] IETF RFC 2077, "The Model Primary Content Type for Multipurpose Internet Mail Extensions"

[34] 3GPP TS 26.119, "Media Capabilities for Augmented Reality"

[XY] 3GPP TS 26.265: "Media Delivery: Video Capabilities and Operation Points"

\* \* \* Next Change \* \* \* \*

5.6.1 Player and Decoding capabilities

The capability 26143\_VIDEO\_AVC-HD is defined as the capability of playing back (decoding and rendering) a file that

- is decodable by a decoder capable of the **AVC-HD-Dec** decoding capabilities as defined in clause 4.2.1.1 of TS 26.511 [4],

- is encapsulated in an ISO BMFF Track [14] conforming with the requirements of the sample entry 'avc1' as defined in ISO/IEC 14496-15 [15],

- is contained in a 3GP file that conforms to the 26143\_CONTAINER\_MP4\_3GP9 capability as defined in clause 5.2.

In the context of this specification, the media type for files with this capability 26143\_VIDEO\_AVC-HD shall be signalled with video/mp4, profile="3gp9" codecs="avc1.640028" or an equivalently compatible media type.

The capability 26143\_VIDEO\_AVC-FullHD is defined as the capability of playing back (decoding and rendering) a file that

- is decodable by a decoder capable of the **AVC-FullHD-Dec** decoding capabilities as defined in clause 5.3.1 of TS 26.265 [XY],

- is encapsulated in an ISO BMFF Track [14] conforming with the requirements of the sample entry 'avc1' as defined in ISO/IEC 14496-15 [15],

- is contained in a 3GP file that conforms to the 26143\_CONTAINER\_MP4\_3GP9 capability as defined in clause 5.2.

In the context of this specification, the media type for files with this capability 26143\_VIDEO\_AVC-FullHD shall be signalled with video/mp4, profile="3gp9" codecs="avc1.640029" or an equivalently compatible media type.

The capability 26143\_VIDEO\_HEVC-HD is defined as the capability of playing back (decoding and rendering) a file that

- is decodable by a decoder capable of the **HEVC-HD-Dec** decoding capabilities as defined in clause 5.3.2 of TS 26.265 [XY],

- is encapsulated in an ISO BMFF Track [14] conforming with the requirements of the sample entry 'hvc1' as defined in ISO/IEC 14496-15 [15],

- is contained in a 3GP file that conforms to the 26143\_CONTAINER\_MP4\_3GP9 capability as defined in clause 5.2.

In the context of this specification, the media type for files with this capability 26143\_VIDEO\_HEVC-HD shall be signalled with video/mp4, profile="3gp9" codecs="hvc1.1.2.L93.B0" or an equivalently compatible media type.

The capability 26143\_VIDEO\_HEVC-FullHD is defined as the capability of playing back (decoding and rendering) a file that

- is decodable by a decoder capable of the **HEVC-FullHD-Dec** decoding capabilities as defined in clause 5.3.2 of TS 26.265 [XY],

- is encapsulated in an ISO BMFF Track [14] conforming with the requirements of the sample entry 'hvc1' as defined in ISO/IEC 14496-15 [15],

- is contained in a 3GP file that conforms to the 26143\_CONTAINER\_MP4\_3GP9 capability as defined in clause 5.2.

In the context of this specification, the media type for files with this capability 26143\_VIDEO\_HEVC-FullHD shall be signalled with video/mp4, profile="3gp9" codecs="hvc1.2.4.L123.B0" or an equivalently compatible media type.

The capability 26143\_VIDEO\_HEVC-UHD is defined as the capability of playing back (decoding and rendering) a file that

- is decodable by a decoder capable of the **HEVC-UHD-Dec** decoding capabilities as defined in clause 5.3.2 of TS 26.265 [XY],

- is encapsulated in an ISO BMFF Track [14] conforming with the requirements of the sample entry 'hvc1' as defined in ISO/IEC 14496-15 [15],

- is contained in a 3GP file that conforms to the 26143\_CONTAINER\_MP4\_3GP9 capability as defined in clause 5.2.

In the context of this specification, the media type for files with this capability 26143\_VIDEO\_HEVC-UHD shall be signalled with video/mp4, profile="3gp9" codecs="hvc1.2.4.L153.B0" or an equivalently compatible media type.

NOTE: In the absence of knowledge of detailed capabilities, 16:9 and 9:16 image formats are preferably used.

\* \* \* Next Change \* \* \* \*

5.6.2 MMBP Content Generator capabilities

The capability 26143\_VIDEO\_ENC\_AVC-HD for a content generator is defined as the combination of the following capabilities:

- the capability to generate a file from a video signal in real-time, such that the file can be played back by a player with the capability 26143\_VIDEO\_AVC-HD,

- the **AVC-HD-Enc** encoding capabilities as defined in clause 4.1.2.2 of TS 26.511 [4] to generate a bitstream from the video signal

- the capability to generate an ISO BMFF track from the bitstream that conforms with the requirements of the sample entry 'avc1' as defined in ISO/IEC 14496-15 [15].

- the generation of a 3GP file from the ISO BMFF track that conforms to the 26143\_CONTAINER\_MP4\_3GP9 capability as defined in clause 5.2.

- the provisioning of media type signalling with the generated file using video/mp4, profile="3gp9" codecs=" avc1.640028" or an equivalently compatible media type.

The capability 26143\_VIDEO\_ENC\_AVC-FullHD for a content generator is defined as the combination of the following capabilities:

- the capability to generate a file from a video signal in real-time, such that the file can be played back by a player with the capability 26143\_VIDEO\_AVC-FullHD,

- the **AVC-FullHD-Enc** encoding capabilities as defined in clause 5.4 of TS 26.265 [XY] to generate a bitstream from the video signal

- the capability to generate an ISO BMFF track from the bitstream that conforms with the requirements of the sample entry 'avc1' as defined in ISO/IEC 14496-15 [15].

- the generation of a 3GP file from the ISO BMFF track that conforms to the 26143\_CONTAINER\_MP4\_3GP9 capability as defined in clause 5.2.

- the provisioning of media type signalling with the generated file using video/mp4, profile="3gp9" codecs=" avc1.640029" or an equivalently compatible media type.

The capability 26143\_VIDEO\_ENC\_HEVC-HD for a content generator is defined as the combination of the following capabilities:

- the capability to generate a file from a video signal in real-time, such that the file can be played back by a player with the capability 26143\_VIDEO\_HEVC-HD,

- the **HEVC-HD-Enc** encoding capabilities as defined in clause 5.4 of TS 26.265 [XY] to generate a bitstream from the video signal

- the capability to generate an ISO BMFF track from the bitstream that conforms with the requirements of the sample entry 'hvc1' as defined in ISO/IEC 14496-15 [15].

- the generation of a 3GP file from the ISO BMFF track that conforms to the 26143\_CONTAINER\_MP4\_3GP9 capability as defined in clause 5.2.

- the provisioning of media type signalling with the generated file using video/mp4, profile="3gp9" codecs="hvc1.1.2.L93.B0" or an equivalently compatible media type.

The capability 26143\_VIDEO\_ENC\_HEVC-FullHD for a content generator is defined as the combination of the following capabilities:

- the capability to generate a file from a video signal in real-time, such that the file can be played back by a player with the capability 26143\_VIDEO\_HEVC-FullHD,

- the **HEVC-FullHD-Enc** encoding capabilities as defined in clause 5.4 of TS 26.265 [XY] to generate a bitstream from the video signal

- the capability to generate an ISO BMFF track from the bitstream that conforms with the requirements of the sample entry 'hvc1' as defined in ISO/IEC 14496-15 [15].

- the generation of a 3GP file from the ISO BMFF track that conforms to the 26143\_CONTAINER\_MP4\_3GP9 capability as defined in clause 5.2.

- the provisioning of media type signalling with the generated file using video/mp4, profile="3gp9" codecs="hvc1.2.4.L123.B0" or an equivalently compatible media type.

The capability 26143\_VIDEO\_ENC\_HEVC-UHD for a content generator is defined as the combination of the following capabilities:

- the capability to generate a file from a video signal in real-time, such that the file can be played back by a player with the capability 26143\_VIDEO\_HEVC-UHD,

- the **HEVC-UHD-Enc** encoding capabilities as defined in clause 5.4 of TS 26.265 [XY] to generate a bitstream from the video signal

- the capability to generate an ISO BMFF track from the bitstream that conforms with the requirements of the sample entry 'hvc1' as defined in ISO/IEC 14496-15 [15].

- the generation of a 3GP file from the ISO BMFF track that conforms to the 26143\_CONTAINER\_MP4\_3GP9 capability as defined in clause 5.2.

- the provisioning of media type signalling with the generated file using video/mp4, profile="3gp9" codecs="hvc1.2.4.L153.B0" or an equivalently compatible media type.

\* \* \* End of Changes \* \* \* \*