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Digital Video Subcommittee

SCTE STANDARD

SCTE 215-2 2018

HEVC Video Constraints for Cable Television
Part 2- Transport

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HEVC Constraints for Cable Television Part 2- Transport

1.0 SCOPE

This document defines the transport constraints on ITU-T Rec. H.265 | ISO/IEC 23008-2 [8] video compression (hereafter called "HEVC") for Cable Television. In particular, this document describes the transmission of a single HEVC coded video elementary stream constrained per SCTE 215-1 [2] over MPEG-2 transport (ISO/IEC 13818-1 [7] for linear delivery systems supporting ad insertion services [5]. Beyond linear delivery with DPI, signaling is provided for segmentation of contents for xDVR applications.

NOTE 1: The carriage of video in the MPEG-2 service multiplex is described in SCTE 54 [1].

1.1 Background (Informative)

This document specifies the transport of an HEVC coded video elementary stream constrained per SCTE 215-1 [2] intended for cable video services. There are other applications such as time-shifting (e.g., PVR/DVR service), Video-on-Demand services, and splicing (e.g., Ad-insertion) that could employ the specifications in this document. However, constraints specific to those applications are outside of the scope of this document at this time.

2.0 NORMATIVE REFERENCES

The following documents contain provisions, which, through reference in this text, constitute provisions of this document. At the time of Subcommittee approval, the editions indicated were valid. All documents are subject to revision; and while parties to any agreement based on this document are encouraged to investigate the possibility of applying the most recent editions of the documents listed below, they are reminded that newer editions of those documents might not be compatible with the referenced version.

2.1 SCTE References

- [1] ANSI/SCTE 54 2015, Digital Video Service Multiplex and Transport System Standard for Cable Television.
- [2] SCTE 215-1 2018, HEVC Video Constraints for Cable Television Part 1 – Coding.
- [3] ANSI/SCTE 128-1 2013, AVC Video Constraints for Cable Television Part 1 – Coding.
- [4] ANSI/SCTE 128-2 2013, AVC Video Constraints for Cable Television Part 2 – Transport.
- [5] ANSI/SCTE 35 2017, Digital Program Insertion Cueing Message for Cable.

2.2 Standards from other Organizations

- [6] ATSC A/65:2013 Program and System Information Protocol for Terrestrial Broadcast and Cable; Section 6.9.2.
- [7] ISO/IEC 13818-1:2018, "Information Technology – Generic coding of moving pictures and associated audio – Part 1: Systems
- [8] ITU-T Rec H.265 | ISO/IEC 23008-2– MPEG-H Part 2: 2017, High Efficiency Video Coding.
- [9] ETSI TS 101 154 V2.4.1 Digital Video Broadcasting (DVB): Specification for the use of Video and Audio Coding in Broadcasting Applications based on the MPEG-2 Transport Stream, 2014.

3.0 INFORMATIVE REFERENCES

The following documents may provide valuable information to the reader but are not required when complying with this standard.