



# STANDARD AND SPECIFICATIONS

## LIST OF DCI / SMPTE STANDARDS AND SPECIFICATIONS

The standardization of digital cinema is compiled into this DCI Specification and SMPTE standards below :

- **DCI DCSS** : [Digital Cinema System Specification](#)
- **Sources [DCDM]** - SMPTE-428 :
  - **SMPTE 428-1** : [Image Characteristics](#)
  - **SMPTE 428-2** : [Audio Characteristics](#)
  - **SMPTE 428-3** : [Audio Channel Mapping and Channel Labeling](#)
  - **SMPTE 428-7** : [Subtitle](#)
  - **SMPTE 428-10** : [Closed Caption and Closed Subtitle](#)
  - **SMPTE 428-11** : [Additional Frame Rates](#)
  - **SMPTE 428-12** : [Common Audio Channels & SoundField Groups](#)
- **Packaging [DCP]** - SMPTE-429 :
  - **SMPTE 429-2** : [Operational Constraints](#)
  - **SMPTE 429-3** : [Sound And Picture Track File](#)
  - **SMPTE 429-4** : [MXF JPEG 2000 Application](#)
  - **SMPTE 429-5** : [Timed Text Track File](#)
  - **SMPTE 429-6** : [MXF Track File Essence Encryption](#)
  - **SMPTE 429-7** : [Composition Playlist \(CPL\)](#)
  - **SMPTE 429-8** : [Packing List \(PKL\)](#)
  - **SMPTE 429-9** : [Asset Mapping & File Segmentation \(ASSETMAP\)](#)
  - **SMPTE 429-10** : [Stereoscopic Picture Track File](#)
  - **SMPTE 429-12** : [Caption and Closed Subtitle](#)
  - **SMPTE 429-13** : [Operational Constraints for Additional Frame Rates](#)
  - **SMPTE 429-14** : [Aux Data Track File](#)
  - **SMPTE 429-16** : [Additional Composition Metadata & Guidelines](#)
  - **SMPTE 429-17** : [XML Constraints](#)
  - **SMPTE 429-18** : [Immersive Audio Track File](#)
  - **SMPTE 429-19** : [Operational Constraints for Immersive Audio](#)
  - **SMPTE RDD-52** : [DCP Bv2.1 Application Profile](#)
- **Security** - SMPTE-430 :
  - **SMPTE 430-1** : [Key Delivery Message \(KDM\)](#)
  - **SMPTE 430-2** : [Digital Certificate](#)
  - **SMPTE 430-3** : [Generic Extra-Theater Message Format \(ETM\)](#)
  - **SMPTE 430-4** : [Log Record Format Specification](#)
  - **SMPTE 430-5** : [Security Log Event Class and Constraints](#)
  - **SMPTE 430-6** : [Auditorium Security Message for Intra-Theater Communications](#)
- **Additional References** :
  - **SMPTE 377** : [MXF File Format Specification](#)
  - **SMPTE 379** : [MXF Generic Container](#)
  - **SMPTE 390** : [MXF Specialized Operational Pattern OP-Atom](#)
  - **SMPTE 377-4** : [MXF Multichannel Audio Labeling Framework](#)
  - **SMPTE 400** : [SMPTE Labels Structures](#)

- **SMPTE EG 432-1** : [Digital Source Processing — Color Processing for D-Cinema](#)
- **SMPTE 2098-1** : [Immersive Audio Metadata](#)
- **SMPTE 2098-2** : [Immersive Audio Bitstream Specification](#)
- **SMPTE 2098-5** : [Immersive Audio Channels and Soundfield Groups](#)
- **External References** :
  - **ISO-IEC 15444-1** : [JPEG 2000 - Part1, Core](#)
  - **RFC 4122** : [Universally Unique Identifier \(UUID\)](#)
  - **RFC 5646** : [Tags for Identifying Languages](#)
- **Related References** :
  - **SMPTE 430-10** : [Auxilliary Content Synchronization Protocol](#)
  - **SMPTE 430-11** : [Auxilliary Resource Presentation List](#)
  - **SMPTE 430-12** : [FSK Synchronization Signal](#)
  - **SMPTE 430-14** : [Digital Sync Signal and Aux Data Transfer Protocol](#)
  - **SMPTE 430-15** : [Facility List Message Exchange Protocol](#)
  - **SMPTE 430-16** : [Extended Facility List Message](#)

All SMPTE references can be found at the following addresses :

- **IEEEExplore** : [Search Engine](#) : SMPTE Database, D-Cinema Section (this is the reference)
- **ISDCF** : [SMPTE and Other Standards](#) : The complete list of technical documentation about the digital cinema.
- **ISDCF** : [Technical Docs](#) : List of (some) documentation related to the digital cinema.
- [Interop DCP Specs](#) : The old standards of the previous DCPs format (Interop) (but still active)
- **SMPTE Journals** : The publications and articles from SMPTE Journals