
# EIDR 2.6 DATA FIELDS REFERENCE

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# 1 INTRODUCTION

This document provides detailed descriptions of the metadata fields stored by EIDR for various types of audiovisual assets. One can use this reference manual to understand the results from EIDR resolutions and queries and to map to and from other metadata systems. Further guidance for EIDR record creators can be found in the ***Best Practices and Use Cases for Abstraction Records***.

The manual is based on the EIDR XML Schema v2.6. All EIDR schemas are available at http://www.eidr.org/schema. The common.xsd and md-v28-eidr.xsd files are the starting point for other useful information about working with EIDR records.

The reader is assumed to be familiar with ***Introduction to the EIDR Data Model*** and ***Registry Technical Overview***, which provide an overview of the EIDR System.

**CONVENTIONS:**

`Courier` typeface is used for strings that users might type such as enumerated values and for system output.

## 1.1 INTRODUCTION TO CONTENT

A content record is defined and described by its metadata. This guide is divided into three major sections for different classes of records and relationships:

- Base Object Type – Describes a set of fields that are common to all content records. Some instances of Movie, TV (show), Web (original content), Short, and Supplemental Referent Types can be defined solely with base object data.
- NOTE: See the **NOTES** section under:
- "Title Details" for further information on the treatment of Unicode characters, diacritics and ligatures, and whitespace in EIDR registry text strings.
- "AssociatedOrg Details" for a summary of the "Participant" rule that governs the requirement for AssociatedOrg, Director, and Actor entries.
- "AssociatedOrg Details" for the rules governing "Participant" data inheritance in child records.

## 1.2 COMPOSITE DETAILS

Abstraction records (Movie, TV, Short, Supplemental, and Web) can optionally include Composite information (as described in "Composite" below) within an Extra Object Metadata block following the Base Object Data. For example:

```
<BaseObjectData>
  <ID>10.5240/12C3-9CB2-24BA-03C6-03DB-O</ID>
  <StructuralType>Abstraction</StructuralType>
  <Mode>AudioVisual</Mode>
  <ReferentType>Movie</ReferentType>
  <ResourceName lang="en" titleClass="release">That's
Entertainment</ResourceName>
  <OriginalLanguage mode="Audio" type="primary">en</OriginalLanguage>
      …
</BaseObjectData>
<ExtraObjectMetadata>
  <CompositeInfo>
```

```
      <CompositeClass>Excerpt</CompositeClass>
      <Element>
        <ID>10.5240/1DF4-A55B-62FE-F2BF-B447-V</ID>
        <Description>Fred Astaire in "The Band Wagon"</Description>
      </Element>
      <Element>
        <ID>10.5240/CE08-A846-EB2B-C220-1B14-M</ID>
        <Description>Bing Crosby in "Going Hollywood"</Description>
      </Element>
        …
    </CompositeInfo>
</ExtraObjectMetadata>
```

- Derived Types – Objects of derived type include extra metadata (in addition to base metadata). The derived object types are: Series, Season, Compilation, Edit, Clip, and Manifestation.
- Other Relationships – Lightweight relationships that connect records after they have been created. These are created with a small amount of extra metadata in a record.

In order to keep the amount of metadata small, the metadata required for an object has been chosen to meet these requirements:

- To differentiate a particular object from others that may be similar in many aspects but not identical and need to be distinguished. (This also helps restrict the creation of duplicate IDs.)
- To define relationships among objects.
- To support the distribution workflow (such as a private sequence number or information about a language-only track for mastering for several different VOD platforms).

Basic record syntax is described and enforced by the EIDR schema (e.g., you cannot list more than 4 actors). More complex business rules (e.g., you cannot create an Edit of a Compilation) are described and enforced by registry Data Validation Rules and are described below for each object type.

## 1.3 HOW TO READ THE TABLES

There are tables of metadata fields for each data type. For each of the metadata fields listed in this document, the following information is presented as columns.

**FIELD NAME:** The name of the metadata field in the schema. Field attributes are separated from the field name by an at-symbol (@), while nested field names are separated with a forward slash (/).

**TYPE:** The data type of the field is usually a standard programming type such as Boolean, integer, or string (including enumerated lists), which are expressed in XML as a simpleType. In other cases, a field is a more complex structure, including attributes and nested data fields.

Each data type is introduced by a simple description with an example followed by the XML definition for that data type.[1]

Many EIDR data types are inherited or extended from other standards, including:

[1] In some cases, the XML schema may allow values that are restricted by EIDR Registry validation rules.

- MovieLabs Common Metadata 2.8 (md: prefix) as found at http://movielabs.com/schema/md/v2.8/md-v2.8.xsd —generically (documentation at http://movielabs.com/md/md/)
  http://www.eidr.org/schema/md-v28-eidr.xsd — specific to EIDR.
- DOI Metadata Kernel (doi: prefix) as found at http://dx.doi.org/10.1000/276
- DOI version of ISO 3166-1 alpha 2, two-character code as found at http://dx.doi.org/10.1000/279

**NOTE:** Text strings are not case sensitive in the EIDR database. Case should be used to improve readability in a user-provided string (for example in a title).

**NOTE:** Field names, attribute names, and enumerated values are case sensitive in XML and so will result in an EIDR schema-validation error if not capitalized correctly.

**CARDINALITY:** The number of times a particular element can appear within a single record, including if the field is required or optional.

- **Required:** Fields required for registration. For child objects (such as series episodes), these fields may sometimes be inherited from the parent record and do not need to be provided directly unless the value is different in the child record.
- **Conditionally Required:** Fields that are required under certain circumstances, but are optional in others.
- **Optional:** Fields that are optional. Note that in case of child objects some optional fields can be inherited from the parent. Some optional fields are marked **Recommended**.

The cardinality for optional fields has a range that starts with 0 (such as 0 or 0-1). Required fields start with 1. Repeating items may have an upper limit (such as 1-8 or 0-32) or may repeat an unlimited number of times (1-∞).

**NOTE:** Required child elements and attributes are only required when their parent, or containing element, is present.

**NOTE:** For a quick reference to the required fields per record type, see EIDR ***Required Data Fields for Abstractions, Episodics, and Edits***.

**EXPLANATORY NOTES:** Additional details regarding the nature of the field. For instructions on how to populate the various fields under both common and unusual circumstances, see EIDR ***Best Practices Guide***.

## 1.4 EIDR IDS

Various interrelated types of unique IDs are used within the EIDR system:

1. **Content ID** – This is the ID issued to each unique record in the EIDR Content ID Registry. Whenever an “EIDR ID” is referenced without a qualifier (such as “Party” or “User") it is a Content ID. These are referred to as assetDOIType in the data Type column, since they are considered “Assets” under the DOI standard. Content records are created and maintained by the EIDR members. The Content prefix in the Registry is 10.5240.

2. **Party ID** – This identifies an organization. These are referred to as partyDOIType in the data Type column. Parties can be used is several ways in the EIDR system. For example, they can serve as the registrant of a content record or be referenced in an asset's metadata as playing a role in the physical production of an audiovisual work. Party IDs are maintained by the EIDR system administrator. A Party used for registering content will have one or more associated Users. The Party prefix in the Registry is 10.5237.

3. **User ID** – This identifies a user of the EIDR system. All Users are associated with a single Party. Your EIDR system administrator will supply your User ID and associated Party ID. The User prefix in the Registry is 10.5238.

4. **Video Service ID** – This identifies a video content delivery service such as a broadcast network or data feed. These may be arranged in a hierarchy reflecting relationships such as corporate ownership. The Video Service prefix in the Registry is 10.5239.

Each of these IDs belongs to a different namespace (by virtue of their prefixes) and may have a different format for the unique suffix that follows the prefix. For more information, see EIDR ***ID Format***.

# 2 BASE OBJECT TYPE

## 2.1 SUMMARY

All content types share the EIDR Base Object Data. The base type extends the DOI Kernel metadata.[2] Certain Base Object fields can map to DOI fields as indicated in the Type or Explanatory Notes columns of the metadata table. For more information on this mapping see Appendix II: DOI Resolution.

The following Referent Types can be created using only a base object type:

- Movie
- TV
- Web
- Short
- Supplemental

If only Base Object Data are used to create a record, then it will be the fundamental version (Abstraction) at the root of a record tree: e.g., the Abstraction of a Movie or a one-time-only TV show. Other versions of the content, such as Edits, Clips, and Manifestations, will be registered using derived types with additional metadata (as described in the "Derived Types" section below).

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| ID | EIDR Content ID: e.g., 10.5240/4DDF-A111-8543-E67B-58F6-2<br><br><xs:element name="ID" type="eidr:assetDOIType"/> | 1<br>Conditionally Required | The EIDR Content ID assigned to the work, version, encoding, etc.<br><br>Included with a record's metadata when retrieved from the Registry (via a resolve or query), but not included by the user when registering a record. |

[2] EIDR is an implementation of the DOI (Digital Object Identifier) system, defined as ISO 26324: DOI System.

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `StructuralType` | Enumeration: `Abstraction, Performance, Digital`<br><br>`<xs:element name="StructuralType" type="doiavs:creationStructuralType"/>` | 1<br>Required | • **Abstraction:** A work in general, without reference to a specific cut, encoding, etc., including Collections such as Series, Seasons, and Compilations of Abstraction records. This cannot be used with Edit, Clip, or Manifestation.<br>• **Performance:** A particular cut or creative version of a work. Used for Edit and Clip records and Compilations of Edits or Clips.<br>• **Digital:** An encoding of a work. Typically, a particular digital file. Used for Manifestation records and Compilations of Manifestations. |
| `Mode` | Enumeration: `AudioVisual, Visual, Audio, Other`<br><br>`<xs:element name="Mode" type="eidr:modeType"/>` | 1<br>Required | • **AudioVisual**: Works with both audio and visual components. This is the most common mode in EIDR.<br>• **Visual:** Silent works that do not have a soundtrack[3] and video or timed text components registered on their own (as video or subtitle tracks in Manifestations).<br>• **Audio:** For audio-only works (Radio programs) and audio components registered on their own (audio tracks in Manifestations).<br>• **Other:** Material that does not fit within a specific Mode. |

[3] If a soundtrack is later added to what was originally a silent work, this is captured at the Edit level.

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| ReferentType | Enumeration: `Series, Season, TV, Movie, Short, Web, Compilation, Supplemental`<br><br>`<xs:element name="ReferentType" type="eidr:referentType"/>` | 1<br>Required | The basic nature of the work .<br><br>See "Referent Type Details" below. |
| ResourceName | Unicode 128 character string: e.g., `Ben Hur`<br><br>`<xs:element name="ResourceName" type="eidr:titleType"/>` | 1<br>Required | The primary name (title) of the work.<br><br>See "Title Details" and "Rules for EIDR Titles" below. |
| @titleClass | Enumeration: `release, abbreviated, working, acronym, fan-based, internal, series numeric, series date, regional, broadcast, AKA, FKA, transliterated, other`<br><br>`<xs:attribute name="titleClass" type="eidr:titleClassType" use="optional"/>` | 0-1<br>Optional | The general type of the title in Resource Name. |
| @lang | LMT written language code: e.g., `en`<br><br>`<xs:attribute name="lang" type="md:language-redefine" use="required"/>` | 1<br>Required | The language of the title in Resource Name. (This is not the language(s) of the work itself, which are recorded in Original and Version Language.)<br><br>See "Language Code Details," below, and ***Using EIDR Language Codes***. |
| @systemGenerated | Boolean: e.g., `true`<br><br>`<xs:attribute name="systemGenerated" type="xs:boolean" use="optional"/>` | 0-1<br>Optional | Set by the Registry when it generates the Resource Name for Seasons and Episodes. If the attribute is missing, it is presumed to be false. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| AlternateResourceName | Unicode 128 character string: e.g., Ben-Hur: A Tale of the Christ<br><br><xs:element maxOccurs="128" minOccurs="0" name="AlternateResourceName" type="eidr:titleType"/> | 0-128<br>Optional | Alternate names for the work.<br><br>See "Title Details" and "Rules for EIDR Titles" below. |
| @titleClass | Enumeration: release, abbreviated, working, acronym, fan-based, internal, series numeric, series date, regional, broadcast, AKA, FKA, transliterated, other<br><br><xs:attribute name="titleClass" type="eidr:titleClassType" use="optional"/> | 0-1<br>Optional | The general type of the Alternate Resource Name. |
| @lang | LMT written language code: e.g., en<br><br><xs:attribute name="lang" type="md:language-redefine" use="required"/> | 1<br>Required | The language of the Alternate Resource Name. (This is not the language(s) of the work itself, which are recorded in Original and Version Language.)<br><br>See "Language Code Details," below, and ***Using EIDR Language Codes***. |
| OriginalLanguage | LMT language code, including "und" for "undetermined" and "zxx" for "no linguistic content": e.g., pt<br><br><xs:element maxOccurs="32" name="OriginalLanguage" type="eidr:languageType"/> | 1-32<br>Required | The principal language(s) in the work.<br><br>Cannot be set directly in Edit and Manifestation records, where Version Language applies and Original Language is inherited from the parent.<br><br>See "Language Code Details," below, and ***Using EIDR Language Codes***. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| @mode | Enumeration: Audio, Visual<br><br><xs:attribute name="mode" type="eidr:doiModeRestricted" use="required"/> | 1<br>Required | The presentation mode of the Original Language, whether spoken (Audio), written (Visual), or signed (Visual). |
| @type | Enumeration: primary, narration, dialogcentric, commentary, normal, SDH, large, forced, easyreader, other<br><br><xs:attribute name="type" type="eidr:languageTrackTypeType"/> | 0-1<br>Optional | How the Original Language appears or is used within the work. |
| VersionLanguage | Enumeration: primary, narration, dialogcentric, commentary, normal, SDH, large, forced, easyreader, other<br><br><xs:element maxOccurs="64" minOccurs="0" name="VersionLanguage" type="eidr:languageType"/> | 0-64<br>Optional | The language(s) of a derivative object to the extent they differ from the Original Language(s) of the parent, such as subtitles or dubbing of an Edit, Clip, or Manifestation. See "Language Code Details" below.<br><br>Cannot be applied at the root, Season, or Episode, where Original Language applies.<br><br>Any user-provided values are replaced with Registry-generated values for Manifestations Audio, Video, or Subtitle Track languages.<br><br>See "Language Code Details," below, and ***Using EIDR Language Codes***. |
| @mode | Enumeration: Audio, Visual<br><br><xs:attribute name="mode" type="eidr:doiModeRestricted" use="required"/> | 1<br>Required | The presentation mode of the Original Language, whether spoken (Audio), written (Visual), or signed (Visual). |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| @type | Enumeration: `primary, narration, dialogcentric, commentary, normal, SDH, large, forced, easyreader, other`<br><br>`<xs:attribute name="type" type="eidr:languageTrackTypeType"/>` | 0-1<br>Optional | How the Original Language appears or is used within the work. |
| AssociatedOrg | <xs:element maxOccurs="16" minOccurs="0" name="AssociatedOrg" type="md:AssociatedOrg-type"/> | 0-16<br>Conditionally Required | Organizations that are most responsible for creating the work.<br><br>Required unless at least 1 Director or 4 Actors are present. May be inherited in child records.<br><br>Associated Org is a complex type where all data are recorded in child elements and attributes. See "AssociatedOrg Details" below.<br><br>See also "Parties" in the ***Registry Technical Overview***. |
| @organizationID | A text string (of type xs:string), constrained by the idType<br><br>• EIDRPartyID: e.g., `10.5237/2135-296E`<br>• ISNI: e.g., `0000-0001-2307-5070`<br><br>`<xs:attribute name="organizationID" type="md:orgID-type"/>` | 0-1<br>Optional | A unique identifier of the type identified in ID Type that is associated with the Associated Org. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| @idType | Enumeration: EIDRPartyID, ISNI<br><br><xs:attribute name="idType" type="md:string-OrgName-idType"/> | 0-1<br>Conditionally Required | The type of ID used in the organization ID field.<br><br>Required if an Organization ID is provided.<br><br>**NOTE:** ISNI (International Standard Name Identifier) is a separate ISO standard identifier. It can be used as an Associated Org ID in the EIDR Registry, but EIDR does not provide any ISNI registration or resolution services. |
| @role | Enumeration: producer, distributor, broadcaster, editor, encoder, other<br><br><xs:attribute name="role" type="md:string-AssociatedOrg-role" use="required"/> | 1<br>Required | The basic contribution of the Associated Org to the creation or presentation of the work. |
| /md:DisplayName | Unicode 128 character string: e.g., Σπύρος Σκούρας Σ.Α.<br><br><xs:element name="DisplayName"><br><xs:complexType><br><xs:simpleContent><br><xs:extension base="md:string128Type"><br>…<br></xs:extension><br></xs:simpleContent><br></xs:complexType><br></xs:element> | 1<br>Conditionally Required | The Associated Org's primary business name.<br><br>Required if an Organization ID is not provided. (The Registry will look up the Organization ID and fill in the Display Name, replacing any Display Name provided by the user.) |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| /md:AlternateName | Unicode 128 character string: e.g., Σκούρας<br><br><xs:element maxOccurs="32" minOccurs="0" name="DisplayName"><br><xs:complexType><br><xs:simpleContent><br><xs:extension base="md:string128Type"><br>…<br></xs:extension><br></xs:simpleContent><br></xs:complexType><br></xs:element> | 0-32<br>Optional | Additional names by which the Associated Org is known.<br><br>The Registry will look up the Organization ID (if provided) and fill in the Alternate Names, replacing any Alternate Names provided by the user. |
| ReleaseDate | A date (of type xs:date) or four-digit year (of type xs:gYear): e.g., 1959-11-18<br><br><xs:element name="ReleaseDate" type="eidr:dateType"/> | 1<br>Required | The date the work was first released, broadcast, offered for retail sale, or otherwise made available for public viewing. Either a full date (preferred) or a four-digit year.<br><br>See "Time and Date" below. |
| CountryOfOrigin | ISO 3166-1 alpha-2, two-character country code, DOI four-character obsolete country code, or "XX" for "unknown": e.g., FR<br><br><xs:element maxOccurs="32" name="CountryOfOrigin" type="eidr:countryType"/> | 1-32<br>Conditionally Required | The home country of the companies that had primary creative control of the creation of the work, generally the producers (Associated Orgs with a "producer" role).<br><br>May be inherited in child records. **(**Child records can have a different Country of Origin than the parent, if applicable.) |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `Status` | Enumeration: `valid, in development`<br><br><xs:element name="Status" type="eidr:statusType"/> | 1<br>Required | • **valid:** Most records – including all released works – will be "valid." (Valid records are visible to all EIDR users, including the general public.)<br>• **in development:** Use with caution. (Contrary to the name, this is not for projects that are in development, but for records that should be private.) Such records are hidden and can only be seen by their Registrant, parties explicitly added to the record's ACL (Access Control List), and EIDR administrators. They should be promoted to "valid" as soon as possible.<br><br>A child record's Status cannot be "valid" if the parent is "in development."<br><br>See the ***Registry Technical Overview***. |
| `ApproximateLength` | An amount of time (xs:duration): e.g., `PT2H13M`<br><br><xs:element name="ApproximateLength" type="xs:duration"/> | 1<br>Conditionally Required | The approximate duration of the work.<br><br>For Abstraction objects, this may be estimated, but it should be more precise for lower level records such as Edits and Manifestations.<br><br>For Collection records (Series, Season, and Compilation), this may be 0.<br><br>For Episodes, non-zero values may be inherited from the parent Series or Season. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| AlternateID | A text string with no whitespace characters, constrained according to the idType (free text for "Proprietary"): e.g., tt0052618<br><br><xs:element maxOccurs="unbounded" minOccurs="0" name="AlternateID" type="eidr:alternateIDType"/> | 0-∞<br>Optional | Non-EIDR identifiers associated with the work. There is no defined limit on the number of Alternate IDs.<br><br>See "Alternate ID Details" below. |
| @relation | Enumeration: IsSameAs, IsEntirelyContainedBy, ContainsAllOf, IsPartiallyContainedBy, ContainsPartOf, IsDerivedFrom, IsSourceOf, HasCueSheet, HasSoundRecording, DepictsEvent, Duplicate, Other<br><br><xs:attribute name="relation" type="eidr:alternateIDRelationType"/> | 0-1<br>Optional | The relationship between the work identified by the EIDR ID and the work identified by the Alternate ID. In most cases, this is isSameAs (when not provided, isSameAs is assumed), but if, for example, the EIDR ID content is the source from which the Alternate ID content is derived, then the Relation would be IsSourceOf. |
| @xsi:type | Enumeration: Ad-ID, AFI, AMG, Baseline, BFI, cIDF, CRID, DOI, EAN, GRid, GTIN, IMDB, ISAN, ISRC, ISTC, IVA, Lumiere, MUZE, Proprietary, SMPTE-UMID, TRIB, TVG, UPC, URI, UUID, URN | 1<br>Required | The Alternate ID type. Generally, the organization that issues the IDs.<br><br>**NOTE:** "Proprietary" is a term of art from the Standards Community. It does not mean that the ID is not freely available or publicly resolvable. All that it means is that the ID is not defined in a published standard. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| @domain | A text string with no whitespace characters, following the general pattern of a dot-separated list of sub-domains ending in a top-level domain followed by an optional slash-separated list of ID types: e.g.: `spe.sony.com/MPM`<br><br>`<xs:attribute name="domain" type="eidr:constrainedURIType" use="required"/>` | 0-1<br>Conditionally Required | Identifies the organization that issued the ID with the option to specify a type of ID if the organization maintains more than one.<br><br>Required if Type is `Proprietary`. Not valid otherwise. |
| Administrators | <xs:element name="Administrators" type="eidr:administratorsInfoType"/> | 1<br>Required | The record's Registrant and Metadata Authorities.<br><br>Administrators is a complex type where all data are recorded in child elements.<br><br>See "Administrators Details" below. |
| /Registrant | The EIDR Party ID of an entity authorized as a Registrant: e.g., `10.5237/F012-89FD`<br><br>`<xs:element name="Registrant" type="eidr:registrantType"/>` | 1<br>Required | In most cases, this must match the Party ID of the user registering the record. For subsequent modifications, any user on the record's ACL (Access Control List) can update the record, even if not a member of the Registrant's Party. |
| /MetadataAuthority | The EIDR Party ID of an entity authorized as a Metadata Authority: e.g.: `10.5237/AD45-F060`<br><br>`<xs:element maxOccurs="4" minOccurs="0" name="MetadataAuthority" type="eidr:metadataAuthorityType"/>` | 0-4<br>Optional | EIDR Parties must be authorized to act as Metadata Authorities. When added to a record, a Metadata Authority asserts that it possess complete and accurate metadata and commits to maintaining the record going forward. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| Credits | <xs:element minOccurs="0" name="Credits" type="eidr:creditsType"/> | 0-1<br>Conditionally Required | Contains the works' Director(s) and Actor(s).<br><br>Required if at least 1 Associated Org is not present. May be inherited in child records.<br><br>This section can only appear once, but it can contain up to 2 Directors and 4 Actors.<br><br>Credits is a complex type where all data are recorded in child elements and attributes.<br><br>See section "Credits Details" below. |
| /Director | <xs:element maxOccurs="2" minOccurs="0" name="Director" type="md:PersonName-type"/> | 0-2<br>Conditionally Required | A Director, including someone who performed the role of Director but was not credited as such.<br><br>Credits/Director is a complex type where all data are recorded in child elements. |
| /md:DisplayName | Unicode 128 character string: e.g., 黒澤　明<br><br><xs:element name="DisplayName"><br><xs:complexType><br><xs:simpleContent><br><xs:extension base="md:eidr-PersonName-DisplayName-type"><br>…<br></xs:extension><br></xs:simpleContent><br></xs:complexType><br></xs:element> | 1<br>Required | The Director's name presented in natural name order (i.e., **NOT** Last, First).<br><br>In most cases, this is represented in Latin-1 script, Romanized for non-Latin-1 alphabets, to aid in discovery and de-duplication (e.g., Akira Kurosawa instead of 黒澤　明). |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| /Actor | <xs:element maxOccurs="4" minOccurs="0" name="Actor" type="md:PersonName-type"/> | 0-4<br>Conditionally Required | An Actor, including any individual who is seen or heard within the work even if not acting.<br><br>Credits/Actor is a complex type where all data are recorded in child elements. |
| /md:DisplayName | Unicode 128 character string: e.g., Харрисону Форду<br><br><xs:element name="DisplayName"><br><xs:complexType><br><xs:simpleContent><br><xs:extension base="md:eidr-PersonName-DisplayName-type"><br>…<br></xs:extension><br></xs:simpleContent><br></xs:complexType><br></xs:element> | 1<br>Required | The Actor's name presented in natural name order (i.e., **NOT** Last, First).<br><br>In most cases, this is represented in Latin-1 script, Romanized for non-Latin-1 alphabets, to aid in discovery and de-duplication (e.g., Harrison Ford instead of Харрисону Форду). |
| RegistrantExtra | Unicode 128 character string: e.g., COO:BG;<br><br><xs:element minOccurs="0" name="RegistrantExtra" type="eidr:registrantExtraDataType"/> | 0-1<br>Optional | Additional information provided by the Registrant.<br><br>Often used to encode forward compatible values (data valid in a later version of the EIDR schema than the one being used).<br><br>Visible to all EIDR users, including the general public. |
| Description | Unicode 128 character string: e.g., Theatrical serial.<br><br><xs:element minOccurs="0" name="Description" type="eidr:descriptionType"/> | 0-1<br>Optional | Additional information regarding the nature of the work to assist discovery and manual de-duplication. Not a plot synopsis. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| @lang | RFC 5646 written language code: e.g., `en`<br><br>`<xs:attribute name="lang" type="md:language-redefine" use="required"/>` | 1<br>Required | The language of the Description.<br><br>See "Language Code Details," below, and ***Using EIDR Language Codes***. |

Below is a sample XML Base Object Data record for an Abstraction Movie as may be retrieved from the Registry via the API, SDKs, or command line tools.[4] You can also view Registry records in XML form using the "View XML" option on the EIDR Web UI.[5] For details on generating XML records see the ***Registry Technical Overview*** and the ***EIDR 2.6 REST API Reference***.

```
<BaseObjectData>
  <ID>10.5240/4DDF-A111-8543-E67B-58F6-2</ID>
  <StructuralType>Abstraction</StructuralType>
  <Mode>AudioVisual</Mode>
  <ReferentType>Movie</ReferentType>
  <ResourceName lang="en" titleClass="release">Ben-Hur</ResourceName>
  <AlternateResourceName lang="en" titleClass="AKA">Ben-Hur: A Tale of the Christ</AlternateResourceName>
  <AlternateResourceName lang="el" titleClass="regional">Μπεν Χουρ</AlternateResourceName>
  <AlternateResourceName lang="ru" titleClass="regional">Бен-Гур</AlternateResourceName>
  <OriginalLanguage mode="Audio" type="primary">en</OriginalLanguage>
  <AssociatedOrg idType="EIDRPartyID" organizationID="10.5237/169B-EDEB" role="producer">
    <md:DisplayName>Metro-Goldwyn-Mayer</md:DisplayName>
    <md:AlternateName>MGM</md:AlternateName>
  </AssociatedOrg>
  <ReleaseDate>1959-11-18</ReleaseDate>
  <CountryOfOrigin>US</CountryOfOrigin>
  <Status>valid</Status>
  <ApproximateLength>PT3H32M</ApproximateLength>
  <AlternateID relation="IsSameAs" xsi:type="ISAN">0000-0002-E823-0000-0-0000-0000-3</AlternateID>
```

[4] When submitting a record to the Registry, do not include the ID field – that is assigned by the Registry, not the user.
[5] Available at https://ui.eidr.org/.

```
    <AlternateID domain="warnerbros.com/MPM" xsi:type="Proprietary">2009218</AlternateID>
    <AlternateID domain="veronicamagazine.nl" xsi:type="Proprietary">388496</AlternateID>
    <AlternateID relation="IsSameAs" xsi:type="IMDB">tt0052618</AlternateID>
    <AlternateID relation="IsSameAs" domain="flixster.com" xsi:type="Proprietary">9402</AlternateID>
    <AlternateID domain="comcast.com" xsi:type="Proprietary">77732325130735351l2</AlternateID>
    <AlternateID domain="itv.com" xsi:type="Proprietary">2/4139/0001</AlternateID>
    <Administrators>
      <Registrant>10.5237/superparty</Registrant>
    </Administrators>
    <Credits>
      <Director>
        <md:DisplayName>William Wyler</md:DisplayName>
      </Director>
      <Actor>
        <md:DisplayName>Charlton Heston</md:DisplayName>
      </Actor>
      <Actor>
        <md:DisplayName>Jack Hawkins</md:DisplayName>
      </Actor>
    </Credits>
  </BaseObjectData>
```

When submitting this same record for registration or modification, the ID element is excluded and a Creation Type tag is wrapped around the core metadata. Each distinct record type has its own Creation Type. In this case, use the CreateBasic type and a Basic metadata tag, since only `BaseObjectData` is necessary for an Abstraction Movie record:

```
<Create type="CreateBasic">
  <Basic xmlns="http://www.eidr.org/schema" xmlns:md="http://www.movielabs.com/schema/md/v2.8/md">
    <BaseObjectData>
      <StructuralType>Abstraction</StructuralType>
      <Mode>AudioVisual</Mode>
      <ReferentType>Movie</ReferentType>
      <ResourceName lang="en" titleClass="release">Ben-Hur</ResourceName>
      <AlternateResourceName lang="en" titleClass="AKA">Ben-Hur: A Tale of the Christ</AlternateResourceName>
      <AlternateResourceName lang="el" titleClass="regional">Μπεν Χουρ</AlternateResourceName>
      <AlternateResourceName lang="ru" titleClass="regional">Бен-Гур</AlternateResourceName>
      <OriginalLanguage mode="Audio" type="primary">en</OriginalLanguage>
      <AssociatedOrg idType="EIDRPartyID" organizationID="10.5237/169B-EDEB" role="producer">
        <md:DisplayName>Metro-Goldwyn-Mayer</md:DisplayName>
        <md:AlternateName>MGM</md:AlternateName>
      </AssociatedOrg>
```

```
        <ReleaseDate>1959-11-18</ReleaseDate>
        <CountryOfOrigin>US</CountryOfOrigin>
        <Status>valid</Status>
        <ApproximateLength>PT3H32M</ApproximateLength>
        <AlternateID relation="IsSameAs" xsi:type="ISAN">0000-0002-E823-0000-0-0000-0000-3</AlternateID>
        <AlternateID domain="warnerbros.com/MPM" xsi:type="Proprietary">2009218</AlternateID>
        <AlternateID domain="veronicamagazine.nl" xsi:type="Proprietary">388496</AlternateID>
        <AlternateID relation="IsSameAs" xsi:type="IMDB">tt0052618</AlternateID>
        <AlternateID relation="IsSameAs" domain="flixster.com" xsi:type="Proprietary">9402</AlternateID>
        <AlternateID domain="comcast.com" xsi:type="Proprietary">77732325130735351l2</AlternateID>
        <AlternateID domain="itv.com" xsi:type="Proprietary">2/4139/0001</AlternateID>
        <Administrators>
          <Registrant>10.5237/superparty</Registrant>
        </Administrators>
        <Credits>
          <Director>
            <md:DisplayName>William Wyler</md:DisplayName>
          </Director>
          <Actor>
            <md:DisplayName>Charlton Heston</md:DisplayName>
          </Actor>
          <Actor>
            <md:DisplayName>Jack Hawkins</md:DisplayName>
          </Actor>
        </Credits>
      </BaseObjectData>
    </Basic>
  </Create>
```

**NOTE:** The Registry prohibits the use of empty XML tags. If a particular entry does not have any values (attributes, data payload, or nested elements), do not include the entry. For example, if a record does not have an Associated Org, do not include:

```
<AssociatedOrg></AssociatedOrg>
```
OR
```
<AssociatedOrg />
```

Simply skip the entry entirely.

## 2.2 REFERENT TYPE DETAILS

In DOI terms, the referent is the item to which the DOI refers independent of any particular instantiation or meaning. The DOI handbook says, "ReferentType typically describes the abstract nature of the content of a referent irrespective of its structuralType." For example, an object created as a movie is a movie whether it is being shown in a cinema, broadcast as an edited version over terrestrial TV, streamed over the Internet, or played from a DVD. A fundamental object can have multiple children through relationships such as a Clip, Edit, or Manifestation.

The EIDR ReferentType can have one of following values, set based on the original intent of a production or where the content was first made available for public viewing:

| **Value** | **Explanatory Notes** |
|---|---|
| `Series` | A Collection that includes ordered or unordered child items (Seasons and Episodes). Its child Episode records can have a Referent Type of TV, Movie, Web, Short, or Supplemental. |
| `Season` | A second Collection below a Series that includes ordered or unordered child Episode items. Its child Episode records can have a Referent Type of TV, Movie, Web, Short, or Supplemental. |
| `TV` | Content that first appeared via broadcast (terrestrial, satellite, cable, etc.). This includes telefilms, other one-off programs, and Episodes of television series. |
| `Movie` | A feature film or other long-from motion picture that first appeared in theatrical exhibition or was released directly to video (home entertainment). If the duration is ≤ 40 minutes, then the record is a Short. |
| `Web` | Content that first appeared on the Internet. (Increasingly, Web-original content is considered "TV" content: e.g., Netflix's *Stranger Things*.) |
| `Short` | A short program (≤ 40 minutes ) that first appeared in theatrical exhibition or was released directly to video (home entertainment). If the duration is > 40 minutes, then the record is a Movie. Do not use for a Clip or Edit unless inherited from the parent. |
| `Compilation` | A collection of multiple whole works, such as an electronic sell-through movie bundle, DVD with multiple works, a franchise, etc. |
| `Supplemental` | Material created to support some other work, such as a trailer, featurette, deleted scenes, gag reel, interviews, behind-the-scenes, etc. |

## 2.3 TITLE DETAILS

Titles in EIDR are stored in Resource Name fields: Resource Name for a work's primary (original or full) title and Alternate Resource Name for all other titles or nicknames by which the work is known. For more information on how to structure an EIDR title string, see "Titles and Alternate Titles" in ***Best Practices and Use Cases for Abstraction Records***.

**NOTE:** EIDR supports Unicode for user-defined text strings, so titles are not limited to the Latin-1 character set.

**NOTE:** Registry de-duplication ignores diacritical marks and ligatures. That means that accented and un-accented characters are equivalent. Given the choice, always use the accented version when registering or modifying a record since that tends to be the more correct representation of local language use. You can always use the un-accented version later when conducting a search.

**NOTE:** EIDR Resource Names are automatically whitespace normalized[6] by the Registry. This has no effect on searching or de-duplication, but makes display values more consistent.

Each title must have a language (`lang`) attribute that identifies the language of the title string. (See "Language Code Details," below, and ***Using EIDR Language Codes***.) EIDR also optionally allows a `titleClass` attribute that can have one of the following values:

| Value | Explanatory Notes |
|---|---|
| `release` | The original release title for the work. This is the name that appears in the credits for the home territory release or that is used as a worldwide foreign territory title for modern commercial works. The same work may have more than one release title: e.g, Cantonese and Mandarin versions of the same title for a domestic Chinese release, or a non-English home territory release title and an English worldwide release title. |
| `abbreviated` | Shortened version of a longer title: e.g., "Prince Caspian" for "The Chronicles of Narnia: Prince Caspian". |
| `working` | Working title: e.g., "Eight Arms to Hold You" for "Help!" |
| `acronym` | Commonly used initialism of a longer title: e.g., "SATC" for "Sex and the City". |

[6] Tabs, carriage returns, non-breaking spaces, etc. are replaced with spaces, multiple spaces in a row are replaced with a single space, and leading and trailing spaces are removed.

| Value | Explanatory Notes |
|---|---|
| fan-based | A commonly used title coined by the public. |
| internal | An internal title or code name, not used in commercial release. |
| series numeric | A Registry-generated Season or Episode title, based on a sequence number. |
| series date | A Registry-generated Season or Episode title, based on a release date. |
| regional | A title unique to a particular territory or otherwise used outside the work's original home territory, such as local titles given to foreign imports. May be in the same language as the Release title. |
| broadcast | A broadcast-specific title that differs from the original Release title. |
| AKA | Also Known As for works known by multiple names in their home territory in addition to the original Release title. |
| FKA | Formerly Known As for works that are no longer known by a particular name, but may be found under that title in historical records: e.g.: "Revenge of the Jedi" for "Return of the Jedi." |
| transliterated | A title that originally appeared in one script but is now presented in a different script based on a phonetic transcription, not a translation. Most commonly used for Romanized versions of titles originally in non-Latin-1 scripts, such as a Japanese title presented in romaji. |
| other | Used when no other type fits. Might be used for a descriptive title given by an archive for an actuality. |

## 2.4 LANGUAGE CODE DETAILS

In EIDR, language codes are used in fields such as Original and Version Language and as attributes for fields such as Resource Name and Description. Language codes are type xs:language, which is specified according to IETF BCP 47, following the guidelines of the SMPTE/MESA LMT (Language Metadata Table). See ***Using EIDR Language Codes*** for detailed instructions and EIDR-specific guidelines.

- The simplest case of a language code is a two-letter code (originating from ISO 639-1) such as `fr` for French. Three-letter codes are required for some languages such as `sgn` for sign language (subtype not known) and `zxx` for no language content (which can apply to some of the earliest actuality films).
- Additional detail may be necessary to identify spoken or written country-specific language dialects such as Canadian French (fr-CA) vs. Parisian French (fr-FR) or Portuguese as spoken in Brazil (pt-BR). It is also possible to identify regionally intelligible (or neutral) dialects such as `es-419` for Latin American Spanish.
- Additional detail may be necessary to identify the script used with a written language when the language is presented in a non-standard script (or when there are multiple scripts in common use for the same language), such as Mongolian, which appears as both `mn-Cyrl` (Cyrillic) and `mn-Latn` (Latin-1).
- Differences in both dialect and script can be combined. For example, `sr-Latn-HU` represents the Serbian language (`sr`) written using Latin script (`Latn`) as used in Hungary (`HU`).

## 2.5 ASSOCIATEDORG DETAILS

In EIDR, Associated Orgs are organizations[7] that performed an identified function[8] in relation to the content identified by a particular EIDR record. While it is not common, the most appropriate list of Associated Orgs could differ from Abstraction to Edit to Manifestation levels or from Series to Season to Episode. The same organization could be listed more than once so long as the role differs each time.

- In general, producers are the most durable, identifying, and differentiating type of Associated Org, so every reasonable effort should be expended to include a complete list of producers, particularly at the Abstraction level.
- Distributors and broadcasters are not particularly identifying or distinguishing until the Edit or Manifestation levels. The exception being the original commissioning broadcaster or a negative pick-up distributor, which are useful at the Abstraction level.
- By their nature, editor (the company that created the edited content) and encoder (the company that produced a particular encoding or rendering) apply exclusively at the Edit and Manifestation levels, respectively.
- Other should be reserved for special circumstances where an Associated Org was directly involved with the creation or presentation of the identified work, but not in a role otherwise described.

Associated Org is a complex data type with attributes and nested elements. The simplest form of an Associated Org includes a `role` attribute (in the `AssociatedOrg` element) and a `DisplayName` (as a nested element):

```
<AssociatedOrg role="producer">
  <md:DisplayName>Metro-Goldwyn-Mayer</md:DisplayName>
</AssociatedOrg>
```

You can also include Alternate Names:

```
<AssociatedOrg role="producer">
  <md:DisplayName>Metro-Goldwyn-Mayer</md:DisplayName>
  <md:AlternateName>Metro-Goldwyn-Mayer Pictures</md:DisplayName>
  <md:AlternateName>MGM</md:AlternateName>
  <md:AlternateName>M-G-M</md:AlternateName>
```

[7] Never people, though some organizations are named after people. Such organizations should be – but do not have to be – identified by EDIR Party IDs.
[8] As per the Associated Org Role controlled vocabulary: producer, distributor, broadcaster, editor, encoder, and other.

```
</AssociatedOrg>
```

If an EIDR Party ID is provided with the Associated Org, then the Registry will automatically look up the `DisplayName` and any `AlternateName` elements for that Party (replacing any that were provided by the user[9]). This both ensures consistency across registry records (eliminating the impact of spelling variations, typos, etc.) and allows for very efficient entry of common Associated Orgs. The Party ID is included in an `organizationID` attribute of the `AssociatedOrg` element. When this is included, then an `idType` attribute must also be included. If you submit the following to the Registry:

```
<AssociatedOrg idType="EIDRPartyID" organizationID="10.5237/169B-EDEB" role="producer" />
```

It will return:

```
<AssociatedOrg idType="EIDRPartyID" organizationID="10.5237/169B-EDEB" role="producer">
  <md:DisplayName>Metro-Goldwyn-Mayer</md:DisplayName>
  <md:AlternateName>MGM</md:AlternateName>
</AssociatedOrg>
```

**NOTE:** Associated Org is part of the conditionally required rule that applies to EIDR record "Participants," along with Director and Actor. Each of these fields is individually optional, but at least one of them must be included to provide a minimum level descriptive metadata to distinguish the content identified by the EIDR ID. In other words, each EIDR record must contain:

- At least one Associated Org (preferably a producer at the Abstraction level)
  OR
- At least one Director
  OR
- Four Actors

**NOTE:** All of the "Participant" fields can be inherited, so once the Participant requirement is satisfied for a parent record, it is also satisfied for all child records. In most cases, the child records should not specify these values and allow them to inherit from the parent. The exception is when the child record has values that are distinct from the parent such as when a Clip features an Actor not present in the Edit's Actor list or when identifying the original distributor for an Edit when the parent Abstraction record only identified its producers.

[9] Contact the EIDR Help Desk if an EIDR Party record needs to be added or updated.

### 2.5.1 ASSOCIATEDORG ROLE DETAILS

| Value | Explanatory Notes |
|---|---|
| producer | The AssociatedOrg is a production company involved in the creation of the work. |
| distributor | The AssociatedOrg is a distributor. Not useful in Abstraction records (other than Compilations). May be useful in Edit records, if the version is unique to the distributor. Certainly useful in Manifestation records to identify the source of the viewable asset. |
| broadcaster | The AssociatedOrg is the commissioning broadcaster or the original broadcaster of an Abstraction record. Otherwise, use only if the broadcaster played a unique role in the creation of the identified object. |
| editor | The AssociatedOrg is the company that produced a particular Edit. |
| encoder | The AssociatedOrg is the company that produced a particular Manifestation. |
| other | The AssociatedOrg has a durable relationship to the identified object (it will not change over time) that is not otherwise identified above. |

## 2.6 TIME AND DATE DETAILS

Full dates are based on XML xs:date, which is inspired by ISO 8601 and take the form yyyy-mm-dd with a four-digit year, two-digit months and days, and hyphen separators. This is a neutral representation that works equally well in all regions of the world and has the added benefit of sorting chronologically when using a simple text sort (no other simple date representations do this).

To record August 9, 2002 (or 9 August, 2002, if you prefer) in an EIDR date field, use `2002-08-09`.

Full dates are always preferred, but when they are not available, a four-digit year may be used instead. This is based on XML xs:gYear with the format yyyy, or 2002.

All times (both length and position) in the EIDR system are represented as a duration, based on XML xs:duration, which is the ISO 8601 extended format PnYnMnDTnHnMnS:

- The duration begins with P
- nY is the number of years followed by Y
- nM is the number of months followed by M
- nD is the number of days followed by D
- The date information is separated from the time information with T
- nH is the number of hours followed by H
- nM is the number of minutes followed by M
- nS the number of seconds followed by S

All of the numbers, other than Seconds, are integers with optional leading zeros. Seconds can include a decimal number to represent fractions of a second (i.e., frames).

For example, to indicate a duration of 2 hours, 30 minutes use PT2H30M.

Only provide significant values. That is, PT2H rather than PT2H00M00S, unless the value is known to be accurate to the second, and PT22M rather than PT0H22M. A value of 0 is typically represented as either PT0H or PT0M.

**NOTE:** Durations are automatically normalized by the Registry so that PT90M becomes PT1H30M and PT1H5S becomes PT1H0M5S. This has no effect on searching or de-duplication, but makes display values more consistent.

## 2.7 ALTERNATE ID DETAILS

Alternate ID includes a number of attributes in addition to the ID data payload. The simplest form of an Alternate ID a `type` attribute and the ID value:

```
<AlternateID xsi:type="IMDB">tt0052618</AlternateID>
```

The required Alternate ID `type` attribute is taken from the following list:

| Value | Explanatory Notes |
|---|---|
| Ad-ID | 4 alphanumeric chars (company code), 7 alphanumeric (generated code), optional 'H' (for HD version). |
| AFI | American Film Institute: unrestricted integer. |
| AMG | All Movie Guide (part of All Media Guide), now owned by NetAktion LLC. |
| Baseline | Baseline ID: 7-digit integer. |
| BFI | British Film Institute: 9-character numeric string (integer with leading zeroes). |
| cIDF | Content ID Forum Content ID. |
| CRID | TV-Anytime Content Reference Identifier (RFC 4078): crid://<DNS name>/<data>. |
| DOI | A non-EIDR doi:name (i.e., a DOI with a non-EIDR prefix). |
| EAN | International Article Number (née European Article Number): 8- or 13-character numeric string. |
| GRid | Global Release Identifier: 2 character (identifier scheme), 5 character (issuer code), 10 character (release number), 1 check character. Letters must be upper case. Either all sections are separated with dashes or none are. |
| GTIN | Global Trade Item Number: 8-, 13-, or 14-character numeric string. |
| IMDB | IMDb Title ID: tt followed by a 7- or 8-digit integer. |
| ISAN | International Standard Audiovisual Number: Standard ISAN: 4-4-4-4, 4-4-4-4-C; V-ISAN: 4-4-4-4-C-4-4-C, or 4-4-4-4-4-4-4, where 4 is 4 uppercase hexadecimal digits, C is a single uppercase check character, and all occurrences of "-" must be a dash, a space, or nothing. The 24-digit V-ISAN must have both check characters or none. |
| ISRC | International Standard Recording Code: a 2-character (non-digit) country code, 3-character (alphanumeric or digit) registrant code, 2-digit year of reference, 5-digit designation code, with optional separating dashes. Letters are upper case. Either all dashes are present, or none are. |

| Value | Explanatory Notes |
|---|---|
| ISTC | International Standard Text Code: 3 hex digits, 4 digits, 8 hex digits, ISO 7064 MOD16-3 check digit. (The groups can be separated by nothing, a space, or a hyphen. The same separator must be used for the whole ID.) |
| IVA | Internet Video Achive ID. The form is a 7-digit integer (that cannot have 0 as the first digit). |
| Lumiere | European Audiovisual Observatory: unrestricted integer. |
| MUZE | A TiVo video or disc ID. |
| Proprietary | For numbering systems that are not otherwise identified. A distinguishing domain attribute must be provided. No formatting restrictions are applied to the ID itself. |
| SMPTE-UMID | SMPTE Unique Material Identifier. |
| TRIB | Tribune Media TMS number (now Gracenote). |
| TVG | TV Guide ID. |
| UPC | Universal Product Code – twelve decimal digits. |
| URI | Uniform Resource Identifier: `scheme://domain name/data [# query] [#fragment]`. Note that an IP address is not permitted. |
| UUID | Universal Unique Identifier: 128-bit number presented as 8-4-4-4-12. Both upper and lowercase hexadecimal digits allowed. |
| URN | Uniform Resource Name (RFC 2141): urn: <NID> : <NSS>. |

Alternate IDs that do not have an explicit `type` value must be presented using the `Proprietary` form, which includes a required domain to identify the source (and ID type, when one source has more than one ID type) of the ID. An ID from a source with only one ID type:

```
<AlternateID domain="veronicamagazine.nl" xsi:type="Proprietary">388496</AlternateID>
```

An ID from a source with more than one ID type, with the ID type presented after the domain, separated with a slash:

```
<AlternateID domain="warnerbros.com/MPM" xsi:type="Proprietary">2009218</AlternateID>
```

Alternate IDs can also include an optional `relation` attribute that indicates how the EIDR ID relates to the Alternate ID, taken from the following list:

| Value | Explanatory Notes |
|---|---|
| IsSameAs | The object referred to by the EIDR ID is equivalent to the object referred to by the Alternate ID: e.g., this would apply to an IMDb ID for a root Movie record. |

| | |
|---|---|
| IsEntirelyContainedBy | The object referred to by the EIDR ID is entirely contained by the object referred to by the Alternate ID: e.g., the Alternate ID might apply to a DVD that contains the Movie identified by the EIDR ID along with other material. (The Alternate ID did not reference additional material, then the relationship would be IsSameAs.) This is the inverse of ContainsAllOf. |
| ContainsAllOf | The object referred to by the EIDR ID includes the entire object referred to by the AlternateID plus additional material. (If the EIDR ID did not reference additional material, then the relationship would be IsSameAs.) This is the inverse of IsEntirelyContainedBy. |
| IsPartiallyContainedBy | Some portion of, but not all of, the object referred to by the EIDR ID is included within the object referred to by the Alternate ID. (The Alternate ID may or may not reference additional content.) This is the inverse of ContainsPartOf. |
| ContainsPartOf | The object referred to by the EIDR ID includes some portion of, but not all of, the object referred to by the AlternateID. (The EIDR ID may or may not reference additional content.) This is the inverse of IsPartiallyContainedBy. |
| IsDerivedFrom | The object referred to by the EIDR ID is derived from the object referred to by the Alternate ID, e.g., the EIDR ID is an Edit or Manifestation of the Alternate ID. This is the inverse of IsSourceOf. |
| IsSourceOf | The object referred to by the EIDR ID is the master from which the object referred to by the Alternate ID is derrived, e.g., the EIDR ID is an Abstraction while the Alternate ID a derived Edit or Manifestation. This is the inverse of IsDerivedFrom. |
| DepictsEvent | The object referred to by the EIDR ID is a recording of a live event identified by the indicated Event Identifier. |
| HasCueSheet | The Alternate ID refers to a music cue sheet (in whatever format is implied by the particular Alternate ID issuing organization) listing the music cues that appear within the object referred to by the EIDR ID.<br>**NOTE:** It is theoretically possible to construct a cue sheet equivalent using Alternate IDs for each piece of music associated to the EIDR record with ContainsAllOf and ContainsPartOf relationships, but this would not indicate their order, number of uses, position, and duration and is not recommended except for music and concert videos where the music is fixed to the performance. Use external music cue sheets and an Alternate ID liked with a HasCueSheet relationship instead. |
| HasSoundRecording | The Alternate ID refers to sound recording used within an audiovisual work, generally a piece of recorded music.<br><br>**NOTE:** It is theoretically possible to construct a cue sheet equivalent using Alternate IDs for each piece of music associated to the EIDR record with HasSoundRecording relationships, but this would not indicate their order, number of uses, position, and duration and is not recommended except for music and concert videos where the music is fixed to the performance. Use external music cue sheets and an Alternate ID liked with a HasCueSheet relationship instead. |

| | |
|---|---|
| Duplicate | The Alternate ID issuing organization has two or more ID referencing the same thing. While the Alternate ID may no longer be active (it has been deleted from the source or it has been aliased to refer to a surviving ID) third-party data sources may still reference this ID, so it is important to keep it in the EIDR record as a cross reference. Flagging it as “Duplicate” will indicate that it is no longer the primary Alternate ID from that particular source. |
| Other | The relationship between the EIDR ID and the Alternate ID is unknown or not one of those listed above. |

For example:

```
<AlternateID relation="IsSameAs" xsi:type="IMDB">tt0052618</AlternateID>
```

## 2.8 ADMINISTRATORS DETAILS

`Administrators` is a complex data type with nested elements for `Registrant` (required) and `MetadataAuthoritiy` (optional).

`Registrant` is a simple type that includes the Party ID of the user who created the record. For example:

```
<Administrators>
  <Registrant>10.5237/AD45-F060</Registrant>
</Administrators>
```

The Registrant is a permanent feature of the record and cannot be changed (it is an historical artifact). It has no correlation to who created the referenced work or who currently holds which rights in the work. Any EIDR member who has a need to identify a piece of work may create an EIDR ID if one does not already exist.[10] To begin, the Registrant is on the record's ACL (Access Control List) and can therefore modify the record after it is created, but the ACL can be changed thereafter to include any Parties authorized by EIDR administration.

`MetadataAuthority` is a simple type that includes the Party ID of organizations that assert they possess complete and accurate metadata that describes the object referred to by the EIDR ID and agree to maintain the record going forward. For example:

```
<Administrators>
  <Registrant>10.5237/superparty</Registrant>
  <MetadataAuthority>10.5237/2FE2-24F2</MetadataAuthority>
</Administrators>
```

The `MetadataAuthority` need not be the same as the `Registrant`.

**NOTE:** Both Registrant and Metadata Authority are assigned Roles and only those Parties authorized to perform these roles may be identified in these fields.

**NOTE:** All non-administrative EIDR Parties IDs are automatically normalized to uppercase by the Registry. This has no effect on searching or de-duplication, but makes display values more consistent.

[10] If such an ID already exists, then all subsequent registration attempts will return the existing EIDR ID as a duplicate record rather than issuing a new ID.

## 2.9 CREDITS DETAILS

`Credits` is a complex data type with nested elements for `Director` and `Actor`, each of which contains a nested `DisplayName`. Directors (if any) are always listed first, followed by any Actors.

A Credits block with only a Director:

```
<Credits>
  <Director>
    <md:DisplayName>Nicholas Webster</md:DisplayName>
  </Director>
</Credits>
```

A Credits block with only Actors:

```
<Credits>
  <Actor>
    <md:DisplayName>Leonard Hicks</md:DisplayName>
  </Actor>
  <Actor>
    <md:DisplayName>John Call</md:DisplayName>
  </Actor>
</Credits>
```

A Credits block with a Director and Actors:

```
<Credits>
  <Director>
    <md:DisplayName>Nicholas Webster</md:DisplayName>
  </Director>
  <Actor>
    <md:DisplayName>Leonard Hicks</md:DisplayName>
  </Actor>
  <Actor>
    <md:DisplayName>John Call</md:DisplayName>
  </Actor>
  <Actor>
    <md:DisplayName>Vincent Beck</md:DisplayName>
  </Actor>
  <Actor>
    <md:DisplayName>Pia Zadora</md:DisplayName>
  </Actor>
</Credits>
```

**NOTE:** See the **NOTES** section under:

- "Title Details" for further information on the treatment of Unicode characters, diacritics and ligatures, and whitespace in EIDR registry text strings.
- "AssociatedOrg Details" for a summary of the "Participant" rule that governs the requirement for AssociatedOrg, Director, and Actor entries.
- "AssociatedOrg Details" for the rules governing "Participant" data inheritance in child records.

## 2.10 COMPOSITE DETAILS

Abstraction records (Movie, TV, Short, Supplemental, and Web) can optionally include Composite information (as described in "Composite" below) within an Extra Object Metadata block following the Base Object Data. For example:

```
<BaseObjectData>
  <ID>10.5240/12C3-9CB2-24BA-03C6-03DB-O</ID>
  <StructuralType>Abstraction</StructuralType>
  <Mode>AudioVisual</Mode>
  <ReferentType>Movie</ReferentType>
  <ResourceName lang="en" titleClass="release">That's Entertainment</ResourceName>
  <OriginalLanguage mode="Audio" type="primary">en</OriginalLanguage>
      …
</BaseObjectData>
<ExtraObjectMetadata>
  <CompositeInfo>
    <CompositeClass>Excerpt</CompositeClass>
    <Element>
      <ID>10.5240/1DF4-A55B-62FE-F2BF-B447-V</ID>
      <Description>Fred Astaire in "The Band Wagon"</Description>
    </Element>
    <Element>
      <ID>10.5240/CE08-A846-EB2B-C220-1B14-M</ID>
      <Description>Bing Crosby in "Going Hollywood"</Description>
    </Element>
      …
  </CompositeInfo>
</ExtraObjectMetadata>
```

# 3 DERIVED TYPES

## 3.1 SUMMARY

All data described in Base Object Type above applies to the derived types, and is similarly either required or optional. Derived types provide extra metadata, some of which is required.

All derived types except Series and Compilation have a parent:

- Season: Parent Series
- Episode: Parent Series or Season
- Edit: Parent Abstraction Record, Edit, or Clip (Collection records – Series, Season, and Compilation – cannot be the parent of an Edit)
- Clip: Parent Edit or Clip
- Manifestation: Parent Edit, Clip, or Manifestation.

Derived types with a parent can generally inherit Base Object Data from the parent as follows:

| **Inheritance** | **Required Fields** | **Optional Fields** |
|---|---|---|
| Can be Inherited | `ApproximateLength`<br>`CountryOfOrigin`<br>`Mode`<br>`OriginalLanguage`<br>`ReferentType`<br>`ReleaseDate`<br>`ResourceName`<br>`StructuralType` | `AssociatedOrg`<br>`Credits/Actor`<br>`Credits/Director`<br>`VersionLanguage` |

| | | |
|---|---|---|
| Cannot be Inherited | Administrators/Registrant<br>ID<br>Status | Administrators/MetadataAuthority<br>AlternateID<br>AlternateResourceName<br>Description<br>RegistrantExtra |

An object can have only one parent, but any number of children. Inheritance is from the nearest ancestor. If a field is provided directly with the object, then it is considered Self-Defined. (Extra Object Metadata is always Self-Defined.) Some fields that are optional in a base object are required for certain derived types while some fields that are usually inherited must be specified for certain derived types. This is all described in the sections below.

Creating objects with an identified parent also creates an implicit relationship between the child and parent object. The relationship is summarized in the Relationship field of the SimpleInfo view of an object with details in extra relationship-specific metadata. Here is the example of the Relationship field for an Edit:

```
<Relationship type="isEditOf">10.5240/32D7-A9D7-9BC1-F5A4-ACB4-Q</Relationship>
```

For details on object views available when retrieving metadata from the Registry, see the ***Registry Technical Overview*** and the ***EIDR 2.6 REST API Reference***.

The sections that follow provide a list of Extra Object Metadata fields for each derived type that is relevant to creating and modifying these types.

## 3.2 SERIES

A Series is a Collection record that can have child Seasons and Episodes. This includes series of programs presented on television (including mini-series), theatrically (such as *The Perils of Pauline*), and on the Web (such as *lonelygirl15*). Series have a Series Referent Type. Episodes in a Series can be TV, Movie, Web, Short, or Supplemental Referent Types, which cannot be inherited and must be self-defined.

Alternate Resource Names can be provided for other markets. The Approximate Length should be the length of a typical episode, or 0. For a theatrical serial, this can be the total duration of all the installments. The Credits should be provided if they do not change for the entire series; otherwise, this information should be provided in the Season or Episode.

The Extra Object Metadata for a Series is contained within `SeriesInfo`:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `EndDate` | A date (of type `xs:date`) or four-digit year (of type `xs:gYear`): e.g., `2006-05-14`<br><br>`<xs:element minOccurs="0" name="EndDate" type="eidr:dateType"/>` | 0-1<br>Optional | Strongly recommended if applicable and known. The date the last Episode of the Series was released or aired.<br><br>See "Time and Date Details" above. |
| `SeriesClass` | Enumeration: `Episodic`, `Anthology`, `Mini-series`<br><br>`<xs:element minOccurs="0" name="SeriesClass" type="eidr:seriesClassType"/>` | 0-1<br>Optional | Describes the general type of Series. Most Series are `Episodic`, which is assumed if no Series Class is provided.<br><br>See "SeriesClass Details" below. |
| `NumberRequired` | Boolean: e.g., `true`<br><br>`<xs:element minOccurs="0" name="NumberRequired" type="xs:boolean"/>` | 0-1<br>Optional | If `true`, then all direct child Season and Episode records must have a Sequence or Distribution Number.<br><br>Skipping this element is equivalent to setting it `false`. |
| `DateRequired` | Boolean: e.g., `true` | 0-1<br>Optional | If `true`, then all direct child Season and Episode records must have a full date (not just a four-digit year) in their Release Date. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| | `<xs:element minOccurs="0" name="DateRequired" type="xs:boolean"/>` | | Skipping this element is equivalent to setting it `false`. |
| `OriginalTitleRequired` | Boolean: e.g., `true`<br><br>`<xs:element minOccurs="0" name="OriginalTitleRequired" type="xs:boolean"/>` | 0-1<br>Optional | If `true`, then all direct child Season and Episode records must have a user-supplied Resource Name (it cannot be system-generated).<br><br>Skipping this element is equivalent to setting it `false`. |

Here is sample XML for the Extra Object Metadata for a Series (the preceding Base Object Data is not shown):

```
<ExtraObjectMetadata>
  <SeriesInfo>
    <EndDate>2009</EndDate>
    <NumberRequired>true</NumberRequired>
  </SeriesInfo>
</ExtraObjectMetadata>
```

**NOTE:** There is a Registry validation rule that prohibits empty XML tags in submitted records. Since all of the Series Extra Object Metadata elements are optional, it is theoretically possible to construct an empty Series Info block. For this reason, at least one of the Series Info blocks elements must be included. This can be satisfied by setting `NumberRequired` to `false`. This is functionally the same as providing no Number Required field at all, so there is no impact on the child records. This issue does not affect other Derived Types, such as Seasons and Episodes, because all of the others have at least one required field.

### 3.2.1 SERIESCLASS DETAILS

| Value | Explanatory Notes |
|---|---|
| `Episodic` | The typical structure of a series. The episodes have a continuing through-line of characters, actors, or plot and are produced in sets by a coordinated production effort. This includes sitcoms, soap operas, dramas, game shows, etc. |
| `Anthology` | A series of largely independent works. Typical of documentary series. Less common for scripted fiction. The included episodes may also be presented as stand-alone works or a new anthology series may be constructed by combining episodes from other series. |
| `Mini-series` | A limited run series. This includes broadcast miniseries with two or more original episodes and theatrical serials or chapter plays. |

## 3.3 SEASON

A Season is a Collection record that is a child of a Series and can have child Episodes. Seasons have a Season Referent Type, which cannot be inherited and must be self-defined.

The required state of certain Base Object Data and Extra Object Metadata fields in a Season record is determined by values in the parent Series.

- The Approximate Length can be inherited if the parent's Approximate Length is not 0.
- The Resource Name must be supplied for each Season if the parent's Original Title Required is true. Otherwise, the record can be submitted without a Resource Name field[11] and the Registry will generate a standardized title based on available metadata: e.g., `$100,000 Pyramid: Season 2`
- The Release Date must always be self-defined, but a full date (rather than just a four-digit year) is required if the parent's Date Required is true.
- The Season must have a Sequence Number in its Extra Object Metadata if the parent's Number Required is true.

**NOTE:** There is a Registry validation rule that requires Seasons to have a Release Date that is greater than or equal to the Release Date of the parent Series and less than or equal to the End Date of the parent Series, if provided. Seasons with Sequence Numbers must have a Release date greater than or equal lower numbered Seasons.

The Extra Object Metadata for a Season is contained within `SeasonInfo`:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `Parent` | EIDR Content ID: e.g., `10.5240/7427-4EB8-BB2F-F13B-3F5A-V`<br><br>`<xs:element name="Parent" type="eidr:assetDOIType"/>` | 1<br>Required | The EIDR Content ID of the parent Series. |

[11] Very few Seasons actually have unique names. Most are simply known by their sequence number or starting date. Such Seasons should be submitted without a Resource Name so that they all have consistently formatted names.

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| EndDate | A date (of type xs:date) or four-digit year (of type xs:gYear): e.g., 2000-05-17<br><br><xs:element minOccurs="0" name="EndDate" type="eidr:dateType"/> | 0-1<br>Optional | Strongly recommended if applicable and known. The date the last Episode in the Season was released or aired.<br><br>See "Time and Date Details" above. |
| SeasonClass | Enumeration: Main, Adjunct, Recut, Mini-series, Enhanced, Pro Forma<br><br><xs:element maxOccurs="unbounded" minOccurs="0" name="SeasonClass" type="eidr:seasonClassType"/> | 0-5<br>Optional | Describes the general type of Season. Most original broadcast Seasons are Main, which is assumed if no Season Class is provided.<br><br>See "SeasonClass Details" below. |
| NumberRequired | Boolean: e.g., true<br><br><xs:element minOccurs="0" name="NumberRequired" type="xs:boolean"/> | 0-1<br>Optional | If true, then all child Episode records must have a Distribution Number.<br><br>Skipping this element is equivalent to setting it false. |
| DateRequired | Boolean: e.g., true<br><br><xs:element minOccurs="0" name="DateRequired" type="xs:boolean"/> | 0-1<br>Optional | If true, then all child Episode records must have a full date (not just a four-digit year) in their Release Date.<br><br>Skipping this element is equivalent to setting it false. |
| OriginalTitleRequired | Boolean: e.g., true<br><br><xs:element minOccurs="0" name="OriginalTitleRequired" type="xs:boolean"/> | 0-1<br>Optional | If true, then all child Episode records must have a user-supplied Resource Name (it cannot be system-generated).<br><br>Skipping this element is equivalent to setting it false. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| SequenceNumber | A positive integer: e.g., 1<br><br><xs:element minOccurs="0" name="SequenceNumber" type="xs:positiveInteger"/> | 0-1<br>Optional | The number of the Season within the Series, for Seasons that have a sequenced order. |

Here is sample XML for the Extra Object Metadata for a Season (the preceding Base Object Data is not shown):

```
<ExtraObjectMetadata>
  <SeasonInfo>
    <Parent>10.5240/920C-D802-C433-807B-246C-S</Parent>
    <EndDate>2010</EndDate>
    <NumberRequired>true</NumberRequired>
    <SequenceNumber>4</SequenceNumber>
  </SeasonInfo>
</ExtraObjectMetadata>
```

### 3.3.1 SEASONCLASS DETAILS

| Value | Explanatory Notes |
|---|---|
| Main | An original or primary Season within the Series. Generally used to distinguish this from other Seasons in the same Series that are Adjunct, Recut, Mini-Series, Enhanced, or Pro Forma. |
| Adjunct | An additional Season not part of the main sequence of Seasons. |
| Recut | Consists of recut Episodes from an existing Season when the number of episodes differs from the original presentation format. For example, when a Mini-Series originally airs with 7 Episodes and is then re-cut so that it has 3 Episodes. The episodes of the 7-night version would be part of a Main Season while the Episodes of the 3-night version would be part of a Recut Season. |
| Mini-series | A limited run set of Episodes (Season) presented as part of a larger Series. |
| Enhanced | Episodes of a Series re-issued with additional materials included. |

| | |
|---|---|
| `Pro Forma` | A Season created for administrative or organizational convenient that did not actually exist in original presentation. For example, soap operas and strip shows may not have formal Seasons, but grouping the episodes into annual `Pro Forma` Seasons helps organize the Episodes of the Series. Similarly, theatrical serials do not have Seasons, but it may be convenient to use a three-level Series, Season, Episode structure in their registration nonetheless. |

## 3.4 EPISODE

An Episode is an Abstraction record that is registered as a child of a Series or Season.

Episodes can have a Referent Type of TV, Movie, Web, Short, or Supplemental, which cannot be inherited and must be self-defined.

The required state of certain Base Object Data and Extra Object Metadata fields in an Episode record is determined by values in the parent record.

- The Approximate Length can be inherited if the parent's Approximate Length is not 0.
- The Resource Name must be supplied for each Episode if the parent's Original Title Required is true. Otherwise, the record can be submitted without a Resource Name field and the Registry will generate a standardized title based on available metadata: e.g., `$100,000 Pyramid: Season 2: Episode 3`
- The Release Date must always be self-defined, but a full date (rather than just a four-digit year) is required if the parent's Date Required is true.
- The Episode must have a Distribution Number in its Extra Object Metadata if the parent's Number Required is true.

**NOTE:** There is a Registry validation rule that requires Episodes to have a Release Date that is greater than or equal to the Release Date of the parent Series or Season and less than or equal to the End Date of the parent, if provided. Exceptions are provided for Episodes with an Episode Class of `Pilot` or `Special`, which can have release dates outside the span of the parent record.

The Extra Object Metadata for an Episode is contained within `EpisodeInfo`:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `Parent` | EIDR Content ID: e.g., `10.5240/7715-953F-1CCF-3501-D6CA-H`<br><br>`<xs:element name="Parent" type="eidr:assetDOIType"/>` | 1<br>Required | The EIDR Content ID of the parent Series or Season. |
| `EpisodeClass` | Enumeration: `Main`, `Pilot`, `Standalone`, `Special`, `Omnibus`, `Recut`, `Segment`<br><br>`<xs:element maxOccurs="unbounded" minOccurs="0" name="EpisodeClass" type="eidr:episodeClassType"/>` | 0-7<br>Optional | Describes the general type of Episode. Most Episodes are `Main`, which is assumed if no Episode Class is provided.<br><br>See "EpisodeClass Details" below. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `SequenceInfo` | `<xs:element minOccurs="0" name="SequenceInfo" type="md:ContentSequenceInfo-type"/>` | 0-1 Conditionally Required | Episode sequence numbers.<br><br>Required if the parent `NumberRequired` is `true`.<br><br>`SequenceInfo` is a complex type where all data are recorded in child elements. |
| `/md:DistributionNumber` | A complex number[12] up to 8 characters long supporting the most common Episode number formats (1, 203, 4a, etc.) and compound Episode formats (3a/b, 4-6, etc.).<br><br>`<xs:element minOccurs="0" name="DistributionNumber" type="md:complex-SequenceInfo-DistributionNumber"/>` | 0-1 Conditionally Required | The position number of the Episode within its parent Season (or parent Series, if a season-less episode) during initial broadcast.<br><br>Required if the parent `NumberRequired` is `true`.<br><br>See “Episode Number Details” below. |
| `@domain` | A text string with no whitespace characters, following the general pattern of a dot-separated list of sub-domains ending in a top-level domain: e.g.: `itv.com`<br><br>`<xs:attribute name="domain" type="md:string-SequenceInfo-DistributionNumber-domain"/>` | 0-1 Optional | Identifies the organization that assigned the number. |
| `/md:HouseSequence` | A complex number[13] up to 8 characters long, e.g.: 204<br><br>`<xs:element minOccurs="0" name="HouseSequence" type="md:complex-SequenceInfo-HouseSequence"/>` | 0-1 Optional | The internal Episode number assigned by the producer or commissioning broadcaster. May differ from the Distribution Number in format or sequence.<br><br>See “Episode Number Details” below. |

[12] The XML regular expression that controls Distribution Numbers is `"0|[1-9][0-9a-zA-Z]*([:/\-.,][0-9a-zA-Z]+)?"`
[13] The XML regular expression that controls House Sequence numbers is `"[0-9a-zA-Z:/\-.,]+"`

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| @domain | A text string with no whitespace characters, following the general pattern of a dot-separated list of sub-domains ending in a top-level domain: e.g.: `itv.com`<br><br>`<xs:attribute name="domain" type="md:string-SequenceInfo-DistributionNumber-domain"/>` | 0-1<br>Optional | Identifies the organization that assigned the number. |
| /md:AlternateNumber | A complex number[14] up to 8 characters long, e.g. `1402b`<br><br>`<xs:element maxOccurs="32" minOccurs="0" name="AlternateNumber" type="md:complex-SequenceInfo-AlternateNumber"/>` | 0-32<br>Optional | Any other numbering sequence for the Episode. Examples include: a number that is cumulative across seasons; numbers that result from re-ordering in foreign distribution; a number from an EPG provider, etc.<br><br>See "Episode Number Details" below. |
| @domain | A text string with no whitespace characters, following the general pattern of a dot-separated list of sub-domains ending in a top-level domain: e.g.: `itv.com`<br><br>`<xs:attribute name="domain" type="md:string-SequenceInfo-DistributionNumber-domain"/>` | 1<br>Required | Identifies the organization that assigned the number.<br><br>**NOTE:** Unlike Distribution Number and House Sequence, all Alternate Numbers must have an identifying `domain`. |
| EpisodeClass | Enumeration: `Main`, `Pilot`, `Standalone`, `Special`, `Omnibus`, `Recut`, `Segment`<br><br>`<xs:element maxOccurs="unbounded" minOccurs="0" name="EpisodeClass" type="eidr:episodeClassType"/>` | 0-7<br>Optional | Describes the general type of Episode. Most Episodes are `Main`, which is assumed if no Episode Class is provided.<br><br>See "EpisodeClass Details" below. |

[14] The XML regular expression that controls Alternate Numbers is `"[0-9a-zA-Z]+([:/\-.,][0-9a-zA-Z]+)*"`

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| TimeSlot | A time of day (xs:time): e.g., 09:00:00-08:00<br><br><xs:element minOccurs="0" name="TimeSlot" type="xs:time"/> | 0-1<br>Optional | The start time of the time slot of the original broadcast.<br><br>See "TimeSlot Details" below. |

Here is sample XML for the Extra Object Metadata for an Episode (the preceding Base Object Data is not shown):

```
<ExtraObjectMetadata>
  <EpisodeInfo>
    <Parent>10.5240/14F9-6921-47AF-E605-E45D-H</Parent>
    <SequenceInfo>
      <md:DistributionNumber domain="spe.sony.com">2</md:DistributionNumber>
      <md:AlternateNumber domain="spe.sony.com">5518</md:AlternateNumber>
    </SequenceInfo>
  </EpisodeInfo>
</ExtraObjectMetadata>
```

### 3.4.1 EPISODECLASS DETAILS

| Value | Explanatory Notes |
|---|---|
| Main | The standard type of Episode for a Series. If no Episode Class is specified, then Main is assumed. |
| Pilot | The Series pilot episode. Not all Series have pilots.<br><br>**NOTE:** Setting the Episode Class to Pilot optionally allows the Episode to take on a Distribution Number of 0 and a Release Date outside the parent Season's or Series' run. |
| Standalone | Was, is, or could be in distribution as a standalone TV program, independent of its Series. This often applies to pilots, specials, series with movie-length episodes, anthology programs that re-air shows that were originally released on their own (in broadcast, theatrical, etc.), etc. |
| Special | An Episode that is outside the usual sequence of programs in that Season or Series, such as a Christmas special.<br><br>**NOTE:** Setting the Episode Class to Special optionally allows the Episode to take on a Distribution Number of 0 and a Release Date outside the parent Season's or Series' run. |

| | |
|---|---|
| Omnibus | An edited synopsis of multiple Episodes, such as a weekly recap of the prior week's episodes or a pre-season recap of the prior season's episodes. |
| Recut | The primary content of multiple episodes merged into one episode.<br><br>**NOTE:** Simply splitting an episode into smaller pieces either results in Episode Segments (if the pieces represent self-contained packages within the original program) or Split Edits (if the larger program is simply divided into pieces as a matter of convenience – to fit a shorter time slot, to make a more convenient download, etc.). |
| Segment | An individual part of an episode that that can stand on its own, such as the common practice in half-hour cartoon programs of including two or more separate cartoons. Individual Episode Segments can also be re-combined to form new composite episodes. |

### 3.4.1 EPISDOE NUMBER DETAILS

Episode Distribution Numbers are 1 to 8 characters long. They can be simple integer episode numbers (1, 2, 3, …), season-episode numbers (201, 202, 203, …), a number followed by a letter (1a, 1b, 2a, …) or two such numbers with a separator character (2-6, 3a/b, 3a/4a, …). Only Pilots and Specials can have the Distribution Number 0. The allowed separators are `:/-.,` (colon, slash, hyphen, period, and comma).

House Sequence numbers are less structured sequences 1 to 8 characters long and can contain any combination of 0-9, a-z, A-Z, and the symbols `:/-.,` (colon, slash, hyphen, period, and comma).

Alternate Numbers are 1 to 8 characters long and start with one or more alphanumeric characters; optionally followed by 0 or more suffixes. Each suffix is composed of a separator character followed by 1 or more alphanumeric characters. The allowed separators are `:/-.,` (colon, slash, hyphen, period, and comma).

### 3.4.2 TIMESLOT DETAILS

Time slots reference the start time of the original broadcast of a program based on the earliest time zone it was first presented in. For example, a national broadcast in the US would use Eastern Time as the basis for its time slot whether it was pre-recorded or broadcast live.

Time slots are based on XML xs:time and take the form hh:mm:ss[Z|[+|-]HH:MM]:

- hh is the hour, represented using a 24-hour clock, followed by a colon
- mm is the minutes followed by a colon

- ss is the seconds
- The seconds are followed by either:
  - Z, indicating that the time is presented in UTC (Coordinated Universal Time AKA Greenwich Mean Time or GMT)

    OR
  - The offset from UTC to the local time zone:
    - +/- (plus or minus) indicating if the local time zone is ahead of or behind UTC)
    - HH is the number of hours offset from UTC, followed by a colon
    - MM is the number of minutes offset from UTC (in most cases, 00)

All of the numbers are two-digit, non-negative integers with leading zeros as necessary.

### 3.4.1 COMPOSITE EPISODE DETAILS

Episodes can optionally include Composite information (as described in "Composite" below) within their Extra Object Metadata block. For example:

```
<ExtraObjectMetadata>
  <EpisodeInfo>
    <Parent>10.5240/7833-E70C-F070-07B2-01F2-W</Parent>
    <SequenceInfo>
      <md:DistributionNumber domain="nbcuni.com">12/13</md:DistributionNumber>
    </SequenceInfo>
  </EpisodeInfo>
  <CompositeInfo>
    <CompositeClass>Mashup</CompositeClass>
    <Element>
      <ID>10.5240/4168-A39F-82BF-5A54-2129-Z</ID>
    </Element>
    <Element>
      <ID>10.5240/6BB9-B779-781E-196F-61CE-N</ID>
    </Element>
  </CompositeInfo>
</ExtraObjectMetadata>
```

## 3.5 CLIP

The Clip data type is used for a fragment of an asset. Typically, these are contiguous excerpts, but not necessarily so. Clips must have a Performance Structural Type.

The Approximate Length field must be specified for all Clips and cannot be inherited. The Approximate Length will be the Clip's Duration plus padding, if any. Padding adds trivial material at the beginning or end (such as studio logos, disclaimers, a title identifying the clip, etc.). If the additions are non-trivial then the record should be registered as a Composite derived type.

The Extra Object Metadata for a Clip is contained within `ClipInfo`:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `Parent` | EIDR Content ID: e.g., `10.5240/7715-953F-1CCF-3501-D6CA-H`<br><br>`<xs:element name="Parent" type="eidr:assetDOIType"/>` | 1<br>Required | The EIDR Content ID of the parent Edit or Clip. |
| `ComponentsMode` | Enumeration: `Audio, Visual, AudioVisual,Other,All`<br><br>`<xs:element minOccurs="0" name="ComponentsMode" type="eidr:componentsModeType"/>` | 1<br>Required | The Clip's Mode, which need not be the same as the parent's Mode. For example, an `AudioVisual` Edit could have a derived clip that does not have a sound track, making the Clip's Mode, `Visual`. |
| `Start` | An amount of time (xs:duration): e.g., `PT4M24S`<br><br><xs:element name="Start" type="eidr:startingPointType"/> | 0-1<br>Optional | The start time in the parent of the extract, if known.<br><br>See "Start Details" below and "Time and Date Details" above. |
| `Duration` | An amount of time (xs:duration): e.g., `PT38S`<br><br><xs:element name="Duration" type="xs:duration"/> | 0-1<br>Optional | This is the length of the clipped segment itself within the parent, not including any padding.<br><br>See "Duration Details" below and "Time and Date Details" above. |

A Clip can be defined with:

Here is sample XML for the Extra Object Metadata for a Clip (the preceding Base Object Data is not shown):

```
<ExtraObjectMetadata>
  <ClipInfo>
    <Parent>10.5240/315D-0B78-961A-3360-896F-I</Parent>
    <ComponentsMode>Visual</ComponentsMode>
  </ClipInfo>
</ExtraObjectMetadata>
```

### 3.5.1 START DETAILS

The Clip's Start is the starting point of the Clip as measured from the start of the source Edit or Clip. It is presented using the same xs:duration data type as the time components discussed in "Time and Date Details" above.

**NOTE:** If a single clip contains multiple extracts from the source program, then Start is not valid.

Here is sample XML for the Extra Object Metadata for a Clip that begins 4 minutes, 24 seconds from the start of the source program:

```
<ExtraObjectMetadata>
  <ClipInfo>
    <Parent>10.5240/315D-0B78-961A-3360-896F-I</Parent>
    <Start>PT4M24S</Start>
    <ComponentsMode>Visual</ComponentsMode>
  </ClipInfo>
</ExtraObjectMetadata>
```

### 3.5.2 DURATION DETAILS

The Clip's Duration is the total length of the Clip as extracted from the source program. It is presented using the same xs:duration data type as the time components discussed in "Time and Date Details" above.

**NOTE:** The Clip duration does not include any padding added to the extracted material (leader, bars and tone, slates, etc.), only the material extracted from the source program. (The Clip's Approximate Length in Base Object Data records the total duration of the clip, including any padding.)

**NOTE:** Duration applies equally to Clips that contain a single extract and Clips that contain multiple extracts from the source program.

Here is sample XML for the Extra Object Metadata for a Clip with a total duration of 38 seconds:

```
<ExtraObjectMetadata>
  <ClipInfo>
    <Parent>10.5240/315D-0B78-961A-3360-896F-I</Parent>
    <Duration>PT38S</Duration>
    <ComponentsMode>Visual</ComponentsMode>
  </ClipInfo>
</ExtraObjectMetadata>
```

For Clips based on a single extract from the source program, Start and Duration may be combined to more precisely identify the Clip:

```
<ExtraObjectMetadata>
  <ClipInfo>
    <Parent>10.5240/315D-0B78-961A-3360-896F-I</Parent>
    <Start>PT4M24S</Start>
    <Duration>PT38S</Duration>
    <ComponentsMode>Visual</ComponentsMode>
  </ClipInfo>
</ExtraObjectMetadata>
```

## 3.6 COMPILATION

A Compilation is a grouping of individual items. Generally, each item in a Compilation is included in its entirety, and exists separately within the Compilation. Examples include themed distribution packages, media bundles, franchises, and the contents of a DVD or Blu-ray disc. Note that while the elements of a Compilation can be sequenced, their order is not considered significant when identifying a Compilation. A Compilation may include another Compilation (for example a boxed set Compilation that contains individual disc Compilations).

The Referent Type of a Compilation must be a Compilation. The Structural Type of a Compilation can be Abstraction, Performance, or Digital, and must match the Structural Type of the included Entries, excluding other Compilations. The Approximate Length should be equal to the cumulative durations of the included Entries (for Performance and Digital Compilations) or zero (for Abstract Compilations or when the complete inventory of included Entries is not known). Credits will not apply unless they are common across all of the included Entries.

**NOTE:** Compilation only allows child records that are Manifestations. Edits and Clips are not allowed.

The Extra Object Metadata for a Compilation is contained within `CompilationInfo`:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `md:Entry` | `md:CompObjEntry-type`<br>`<xs:element maxOccurs="unbounded" minOccurs="0" name="Entry" type="md:CompObjEntry-type"/>` | 0-∞<br>Optional | The components of the Compilation, creating an inventory list of the included Entries.<br><br>Entry is a complex type where all data are recorded in child elements.<br><br>**NOTE:** A Compilation should, but does not have to include Entries. If there are no Entries, then the CompilationClass @hasOtherInclusions attribute must be set to `true`. |
| `/md:DisplayName` | Unicode 128 character string: e.g., `Duck Dodgers in the 24½th Century`<br><br>`<xs:element minOccurs="0" name="DisplayName">` | 0-1<br>Optional | The name of the Compilation component as it is known within the context of the Compilation. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| /md:EntryNumber | A complex number[15] up to 8 characters long, but typically a simple non-negative integer: e.g., 1<br><br><xs:element minOccurs="0" name="EntryNumber" type="md:string-Compilation-EntryNumber"/> | 0-1<br>Optional | Indicates the position of this entry within the Compilation. The format matches that of an EIDR Episode Distribution Number. |
| /md:EntryClass | Enumeration: Episode, Installment, Part, Season, Supplemental<br><br><xs:element minOccurs="0" name="EntryClass" type="md:string-Compilation-EntryClass"/> | 0-1<br>Optional | Describes the association between the Entry elements.<br><br>See "EntryClass Details" below. |
| /md:ContentID | EIDR Content ID: e.g., 10.5240/4DDF-A111-8543-E67B-58F6-2<br><br><xs:element name="ContentID" type="md:ContentID-type"/> | 1<br>Required | The EIDR Content ID of the Compilation Entry item.<br><br>**NOTE:** All included Entries (excluding other Compilations) must have the same Structural Type as the Compilation itself. |
| md:CompilationClass | Enumeration: Blu-ray, Digital Cinema, Distribution Bundle, DVD, EST, Franchise, Home Entertainment, Syndication, Series, Season, Volume, Other<br><br><xs:element name="CompilationClass" type="md:CompObjClass-type"/> | 1<br>Required | The general type of the Compilation.<br><br>See "CompilationClass Details" below |

[15] The XML regular expression that controls Compilation Entry Numbers is "0|[1-9][0-9a-zA-Z]*([:/\-.,][0-9a-zA-Z]+)?".

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| @hasOtherInclusions | Boolean: e.g., `true`<br><br>`<xs:attribute name="hasOtherInclusions" type="xs:boolean" use="optional"/>` | 0-1 Conditionally Required | Indicates if the list of `Entry` elements is exhaustive for the Compilation. If this is known to be true, set `hasOtherInclusions` to `false`. If it is known not to be true, set it to `true`. If the state is unknown, skip this entry. |

Here is sample XML for the Extra Object Metadata for a Compilation (the preceding Base Object Data is not shown):

```
<ExtraObjectMetadata>
  <CompilationInfo>
    <md:Entry>
      <md:DisplayName>Alien Director's cut</md:DisplayName>
      <md:EntryNumber>1</md:EntryNumber>
      <md:ContentID>10.5240/8172-952F-E129-3FAF-1387-9</md:ContentID>
    </md:Entry>
    <md:Entry>
      <md:DisplayName>Alien 3 Extended</md:DisplayName>
      <md:EntryNumber>2</md:EntryNumber>
      <md:ContentID>10.5240/13DE-7053-272A-3879-824B-Z</md:ContentID>
    </md:Entry>
    <md:Entry>
      <md:DisplayName>Alien Resurrection original</md:DisplayName>
      <md:EntryNumber>3</md:EntryNumber>
      <md:ContentID>10.5240/3FB2-9C6E-FAA0-DDF2-EC98-W</md:ContentID>
    </md:Entry>
    <md:Entry>
      <md:DisplayName>Aliens Extended</md:DisplayName>
      <md:EntryNumber>4</md:EntryNumber>
      <md:ContentID>10.5240/12C1-89F2-7811-BE87-2FF4-J</md:ContentID>
    </md:Entry>
    <md:CompilationClass>Home Entertainment</md:CompilationClass>
  </CompilationInfo>
</ExtraObjectMetadata>
```

### 3.6.1 ENTRYCLASS DETAILS

| Value | Explanatory Notes |
|---|---|
| Episode | The Entry is an Episode of a Series, with the Compilation Class = Series or Season. Used with episodic distribution bundles. |
| Instalment | The Entry is part of a sequential but non-episodic set of items, such as a successful film and its prequels/sequels, a franchise, etc. |
| Part | The Entry is one part of a multi-part program. |
| Season | The Entry is a Season of a Series, with the Compilation Class = Series. Used with episodic distribution bundles. |
| Supplemental | The Entry is a piece of supporting (supplemental) content for the primary work(s). The referenced EIDR ID may be a Supplemental record (trailer, deleted scenes, etc.) or could be some other work that is being used in a supplemental capacity in this context (an episode of a series, a short, etc.). |

### 3.6.1 COMPILATIONCLASS DETAILS

| Value | Explanatory Notes |
|---|---|
| Blu-ray | The Compilation includes the contents of a Blu-ray disc (packaged media). Structural Type is Performance; Entries are Edits. |
| Digital Cinema | The Compilation includes the contents of a Digital Cinema DCM (Digital Cinema Master) or DCP (Digital Cinema Package). Structural Type is Performance or Digital; Entries are Edits or Manifestations. |
| Distribution Bundle | The Compilation includes the contents of an otherwise unspecified media distribution bundle. Structural Type is Performance or Digital; Entries are Edits or Manifestations. |
| DVD | The Compilation includes the contents of a DVD disc (packaged media). Structural Type is Performance; Entries are Edits. |
| EST | The Compilation includes the contents of an Electronic Sell-Through bundle. Structural Type is Performance; Entries are Edits. |
| Franchise | The Compilation includes the related items of a franchise, the œuvre of an actor or director, etc. Structural Type is Abstraction; Entries are Abstraction records. |
| Home Entertainment | The Compilation includes the contents of an otherwise unspecified home entertainment distribution bundle, often some form of packaged media. Structural Type is Performance; Entries are Edits. |

| | |
|---|---|
| `Syndication` | The Compilation includes entries in a syndication bundle. Structural Type is `Performance`; Entries are Edits. |
| `Series` | The Compilation is an episodic distribution bundle, representing an entire Series. Structural Type is `Performance`; Entries include Season Compilations and Episode Edits. |
| `Season` | The Compilation is an episodic distribution bundle, representing an entire Season. Structural Type is `Performance`; Entries are Episode Edits. |
| `Volume` | The Compilation is one of several that, when taken together, cover a particular topic (Episodes of a Series, Movies within a Franchise, etc.), often distinguished with “Volume 1”, “Volume 2”, etc. in their name. Unlike a Franchise, a Volume is a distribution bundle so it its Structural Type is `Performance`; Entries include Edits. |
| `Other` | The Compilation includes items that are not otherwise defined. Structural Type is `Performance` or `Digital`; Entries are Edits or Manifestations. |

## 3.7 COMPOSITE

Composites are single works that contain elements of one or more other works, such as a clip show, a work that incorporates stock footage, a program that includes a flashback from an earlier program, etc. The Composite information is added to an Abstraction record, so you can have a Movie that's a Composite, an Episode that's a Composite, etc.[16]

Composite data fields can be included at the time an EIDR record is created or added later. See the ***Registry Technical Overview*** for details on adding Relationships to existing records.

The previously existing Elements that are included in a Composite can be identified by an EIDR Content ID or an Alternate ID if the Element does not have an EIDR ID.

The Extra Object Metadata for a Composite is contained within `CompositeInfo`:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `CompositeClass` | Enumeration: `Mashup, Omnibus, Excerpt, Inclusion, Other`<br><br>`<xs:element name="CompositeClass" type="eidr:compositeClassType"/>` | 1<br>Required | Describes the general type of Composite.<br><br>See "CompositeClass Details" below. |
| `Element` | `<xs:element maxOccurs="unbounded" minOccurs="0" name="Element" type="eidr:compositeElementType"/>` | 0-∞<br>Optional | The components of the Composite, creating an inventory list of the included Elements.<br><br>Element is a complex type where all data are recorded in child elements.<br><br>**NOTE:** A Composite should, but does not have to include Elements. |
| `/ID` | EIDR Content ID: e.g., `10.5240/4DDF-A111-8543-E67B-58F6-2`<br><br>`<xs:element name="ID" type="eidr:assetDOIType"/>` | 0-1<br>Conditionally Required | The EIDR Content ID of the Element.<br><br>Required if `OtherID` is not present. |

[16] You cannot add Composite information to a Series, Season, or Compilation because, while these are Level 1 records, they are container or grouping records, not Title records.

| | | | | |
|---|---|---|---|---|
| | /OtherID | A text string with no whitespace characters, constrained according to the idType (free text for "Proprietary"): e.g., tt0058548<br><br><xs:element name="OtherID" type="eidr:alternateIDType"/> | 0-1<br>Conditionally Required | An Alternate ID of the Element .<br><br>Required if ID is not present.<br><br>This is the same type of field as BaseObjectData/AlternateID. See " Alternate ID Details" above. |
| | @relation | Enumeration: IsSameAs, IsEntirelyContainedBy, ContainsAllOf, IsPartiallyContainedBy, ContainsPartOf, IsDerivedFrom, IsSourceOf, HasCueSheet, HasSoundRecording, DepictsEvent, Duplicate, Other<br><br><xs:attribute name="relation" type="eidr:alternateIDRelationType"/> | 0-1<br>Optional | The relationship between the included Element and the work identified by the Alternate ID. In most cases, this is isSameAs (when not provided, isSameAs is assumed), but if the included Element was derived from the Alternate ID source material, then the Relation would be IsDerivedFrom. |
| | @xsi:type | Enumeration: Ad-ID, AFI, AMG, Baseline, BFI, cIDF, CRID, DOI, EAN, GRid, GTIN, IMDB, ISAN, ISRC, ISTC, IVA, Lumiere, MUZE, Proprietary, SMPTE-UMID, TRIB, TVG, UPC, URI, UUID, URN | 1<br>Required | The Alternate ID type. Generally, the organization that issues the IDs.<br><br>**NOTE:** "Proprietary" is a term of art from the Standards Community. It does not mean that the ID is not freely available or publicly resolvable. All that it means is that the ID is not defined in a published standard. |
| | @domain | A text string with no whitespace characters, following the general pattern of a dot-separated list of sub-domains ending in a top-level domain followed by an optional slash-separated list of ID types: e.g.: spe.sony.com/MPM<br><br><xs:attribute name="domain" type="eidr:constrainedURIType" use="required"/> | 0-1<br>Conditionally Required | Identifies the organization that issued the ID with the option to specify a type of ID if the organization maintains more than one.<br><br>Required if Type is Proprietary. Not valid otherwise. |

| | | | | |
|---|---|---|---|---|
| | /SourceStart | An amount of time (xs:duration): e.g., PT4M24S<br><br><xs:element minOccurs="0" name="SourceStart" type="eidr:startingPointType"/> | 0-1<br>Optional | The starting point of the extracted Element included in the Composite as measured from the start of the source material referred to by ID or OtherID. It is presented using the same xs:duration data type as the time components discussed in "Time and Date Details" above. |
| | /SourceDuration | An amount of time (xs:duration): e.g., PT4M24S<br><br><xs:element minOccurs="0" name="SourceDuration" type="xs:duration"/> | 0-1<br>Optional | The total length of the Element extracted from the source program referred to by ID or OtherID. It is presented using the same xs:duration data type as the time components discussed in "Time and Date Details" above. |
| | /ComponentsMode | Enumeration: Audio, Visual, AudioVisual, Other, All<br><br><xs:element minOccurs="0" name="ComponentsMode" type="eidr:componentsModeType"/> | 0-1<br>Optional | The Element's Mode, which need not be the same as the source material's Mode. For example, a Visual Element could be extracted from an AudioVisual source. |
| | /DestStart | An amount of time (xs:duration): e.g., PT4M24S<br><br><xs:element minOccurs="0" name="DestStart" type="eidr:startingPointType"/> | 0-1<br>Optional | The starting point of the included Element measured from the start of the Composite program. It is presented using the same xs:duration data type as the time components discussed in "Time and Date Details" above. |
| | /DestDuration | An amount of time (xs:duration): e.g., PT4M24S<br><br><xs:element minOccurs="0" name="DestDuration" type="xs:duration"/> | 0-1<br>Optional | The total length of the Element within the Composite program, including any adjustments or alterations to the Element. It is presented using the same xs:duration data type as the time components discussed in "Time and Date Details" above. |
| | /Description | Unicode 128 character string: e.g., Interview stock footage<br><br><xs:element minOccurs="0" name="Description" type="eidr:string128Type"/> | 0-1<br>Optional | A free text description of how the Element is used within the Composite. |

Here is sample XML for the Extra Object Metadata for a Composite (the preceding Base Object Data is not shown):

```
<ExtraObjectMetadata>
  <CompositeInfo>
    <CompositeClass>Mashup</CompositeClass>
    <Element>
      <ID>10.5240/2046-2046-2046-2046-02BC-V</ID>
      <SourceStart>PT0S</Start>
      <SourceDuration>PT30M</SourceDuration>
    </Element>
    <Element>
      <ID>10.5240/2046-2046-2046-2046-0283-Q</ID>
      <SourceDuration>PT6M</SourceDuration>
    </Element>
  </CompositeInfo>
</ExtraObjectMetadata>
```

**NOTE:** Composite data are always added to an Abstraction record. See "Composite Details" under "Base Object Type", above, for an example of a Composite Movie. See "Composite Details" under "Episode", above, for an example of a Composite Episode. In the former case, the `CompositeInfo` may be the only entry in the `ExtraObjectMetadata` section. In the latter case, `CompositeInfo` follows `EpisodeInfo` in the `ExtraObjectMetadata` section.

### 3.7.1 COMPOSITECLASS DETAILS

| Value | Explanatory Notes |
|---|---|
| `Mashup` | The resulting work is primarily a sequence of clips, edited together, with little other material, such as a clip show. This is the most common Composite Class. |
| `Omnibus` | The Composite work is a condensed summary of a group of other programs, such as the weekly run of a serial. |
| `Excerpt` | A substantial portion of the Composite is made up of clips from other works along with significant new material, such as *That's Entertainment* (1974), which mixed existing clips with new interviews. This differs from a Mashup, where the included clips comprise nearly the entire program. |
| `Inclusion` | The included clips represent a relatively small portion of the Composite and are not its primary focus. |
| `Other` | The Composite is in a form not otherwise defined. |

## 3.8 EDIT

An EIDR Edit ID identifies a unique version of a work: generally, a creative cut of an Abstraction such as the original domestic theatrical release version, a director's cut, a broadcast television version, a colorized version of an originally black-and-white work, etc. Translating the linguistic elements of a work without changing their essential meaning (aka, "subs and dubs") is considered a technical, rather than creative, change and so is represented by an EIDR Manifestation rather than an Edit. See ***Best Practices and Use Cases for EIDR Edits*** for more information.

Of the Base Object Data fields, StructuralType, Release Date, and Approximate Length must be specified for all Edits and cannot be inherited.

If there are language changes in the Edit, they are recorded as Version Languages in the Base Object Data.[17]

The Extra Object Metadata for an Edit is contained within `EditInfo`:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `Parent` | EIDR Content ID: e.g., `10.5240/95F1-4D95-6A6B-E859-9410-F`<br><br>`<xs:element name="Parent" type="eidr:assetDOIType"/>` | 1<br>Required | The EIDR Content ID of the parent Abstraction record, Edit, or Clip. |
| `EditUse` | Enumeration: `Theatrical, Home Video, Broadcast, Hospitality, Web, Preservation Master, Unknown, General`<br><br>`<xs:element name="EditUse" type="eidr:editUseType"/>` | 1<br>Required | The original, primary, intended use of the Edit. In many cases, the actual uses will be different, such as the Apple iTunes Store distributing a Theatrical cut.<br><br>See "EditUse details" below. |

[17] Such language changes do not motivate the creation of an Edit record – language changes on their own are recorded as Manifestations – rather, these language changes accompany other changes to the work that do warrant an Edit.

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `EditClass` | Enumeration: `Original, Unrated, Censored, Sanitized, Sanitized Audio, Sanitized Picture, Extended, Shortened, Director's Cut, Colorized, Restored, Restored Audio, Restored Picture, Anniversary, Rereleased, Creative, Technical, Alternate Ending, Recap, Product Placement, Dialog, Music, Sound Effects, Credits, Dubbing Credits, Logos, Overture, Intermission, Exit, Content Break, Interactive Platform, Promotional, Regionalized, Split, Substitutions, Syndication, Textless, Three-D, Other`<br><br>`<xs:element maxOccurs="8" minOccurs="0" name="EditClass" type="eidr:editClassType"/>` | 0-8<br>Optional | The nature of the changes in an Edit that differentiate it from other versions.<br><br>See "EditClass details" below. |
| `MadeForRegion` | Enumeration: ISO 3166-1 alpha-2, two-character country code, DOI four-character obsolete country code, UN M49 region code, plus "Domestic" and "International": e.g., `CN`<br><br>`<xs:element maxOccurs="8" minOccurs="0" name="MadeForRegion" type="eidr:madeForRegionType"/>` | 0-8<br>Optional | The distribution territory(ies) for which the Edit was originally made. (This does not imply anything about where the Edit is actually distributed.)<br><br>**NOTE:** Domestic and International are interpreted in relation to the Edit's Country of Origin in the Base Object Data.<br><br>See ***Using EIDR Region Codes***. |
| `EditDetails` | Unicode 128 character string: e.g., `US broadcast free-to-air version.`<br><br>`<xs:element maxOccurs="8" minOccurs="0" name="EditDetails" type="eidr:usageDetailsType"/>` | 0-8<br>Optional | A terse, keyword-type summation of factors that differentiate this Edit from other, similar Edits. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| @domain | A text string with no whitespace characters, following the general pattern of a dot-separated list of sub-domains ending in a top-level domain followed by an optional slash-separated list of ID types: e.g.: `itv.com`<br><br>`<xs:attribute name="domain" type="eidr:constrainedURIType" use="required"/>` | 1<br>Required | Identifies the organization that added the Edit Details to the record.<br><br>**NOTE:** A single Edit record can have Edit Details provided by more than one organization or multiple Edit Details provided by the same organization, so long as the Domains are unique. |
| ColorType | Enumeration: `color`, `bandw`, `colorized`, `composite`<br><br>`<xs:element name="ColorType" type="md:ColorType-type"/>` | 1<br>Required | Type of color in the visual portion of the content.<br><br>See "ColorType Details" below. |
| ThreeD | Boolean: e.g., `true`<br><br>`<xs:element name="ThreeD" type="xs:boolean"/>` | 1<br>Required | Set to true if this version is 3D. This should be true even if only part of the Edit is actually 3D (and the rest is 2D). |

Here is sample XML for the Extra Object Metadata for an Edit (the preceding Base Object Data is not shown):

```
<ExtraObjectMetadata>
  <EditInfo>
    <Parent>10.5240/95F1-4D95-6A6B-E859-9410-F</Parent>
    <EditUse>Theatrical</EditUse>
    <ColorType>color</ColorType>
    <ThreeD>false</ThreeD>
  </EditInfo>
</ExtraObjectMetadata>
```

### 3.8.1 EDITUSE DETAILS

| Value | Explanatory Note |
|---|---|
| Theatrical | For theatrical exhibition, including general release and festival versions. |
| Broadcast | For traditional multipoint television delivery (over-the-air, satellite, cable, free TV, pay TV), excluding Web. |

| Value | Explanatory Note |
|---|---|
| Home Video | For packaged media presentation in-home or on personal media devices, excluding Broadcast and Web.[18] |
| Hospitality | Edits created for the hospitality and traditional non-Theatrical market (airlines, oil rigs, military bases, church basements, etc.). |
| Web | Edits created for all forms of digital delivery (free streaming, VOD, EST, OTT, etc.), excluding Theatrical and Broadcast.[19] |
| Preservation Master | Versions (primarily of broadcast works) that include all materials recorded for that program (often including materials that do not appear in the Original version). |
| General | For versions that are intended for multiple forms of presentation, including combinations of the above. |
| Unknown | When the registrant is not the creator of the Edit and the original purpose for which the Edit was created is not known. For example, when a retailer creates an Edit using internally-sourced metadata. |

### 3.8.2 EDITCLASS DETAILS

| Value | Explanatory Note |
|---|---|
| Original | The original release version of a work. |
| Unrated | An un-cut version; one that has not received content advisory or censorship classification. |
| Alternate Ending | A version with an ending that differs from a reference version. (May also be used to describe an Edit that only includes the alternate ending scenes.) |
| Anniversary | An anniversary edition. (Often used with Restored.) |
| Censored | A version edited for content to comply with local content advisory or censorship requirements. |

[18] Note that Broadcast excludes original programming for direct Internet delivery.
[19] This means that the original release of the *Orange is the New Black* (2013 —) is a Web Edit Use.

| Value | Explanatory Note |
|---|---|
| Colorized | A color version produced from a black-and-white original. |
| Content Break | A version where the primary program has been modified to accommodate new or different content breaks, such as commercials, pledge breaks, etc.<br><br>**NOTE:** If a program is simply interrupted by hard cuts to insert unrelated material (commercials, etc.), that is captured as a Manifestation. This Edit Class only applies when the program itself has been modified – shortened, with video and audio fade out/fade surrounding the break, etc. The break itself and changes to the inserted material do not warrant a new Edit. |
| Creative | A version produced for creative reasons not otherwise specified. |
| Credits | New or modified main title or end credits, excluding subtitle translations that appear onscreen with the original credits. |
| Dialog | A change in dialogue more significant than Sanitized Audio, excluding translation. |
| Director's Cut | A version that more closely represents the director's original vision than an earlier reference version. (Usually, both Extended and Unrated.) |
| Dubbing Credits | Additional credits added for the dubbing actors, translators, etc. |
| Exit | A version that includes exit music (and optional images) that follows the presentation of the work itself and its closing credits. (May also be used to describe a particularly short Edit that only includes the Exit.) |
| Extended | Additional materials added to the work that make this version longer than a reference version. |
| Interactive Platform | Platform-specific content changes to an Interactive work. For example, if the iPad version of an interactive map application contains different content from the Blu-ray or mobile (iPhone/Android) versions of that same interactive map application.<br><br>**NOTE:** Use the Edit Details field to identify the specific interactive platforms that apply to each version. |
| Intermission | A version that includes intermission music (and optional images) typically presented during a break in a particularly long presentation. (May also be used to describe a particularly short Edit that only includes the Intermission.) |
| Logos | A change to the presentation of distributor or producer logos (cards or bumpers) at the head of a work. |

| Value | Explanatory Note |
|---|---|
| Music | A change in the music, generally expressed by a new music cue sheet. (May accompany a territory-specific Edit.) |
| Overture | A version that includes overture music (and optional images) that precedes the presentation of the work itself and its opening credits. (May also be used to describe a particularly short Edit that only includes the Overture.) |
| Product Placement | Alterations made to a work for the purpose of product placement. |
| Promotional | A new version of an existing work created for promotional purposes. May be further clarified with additional Edit Classes such as Censored, Regionalized, etc. |
| Recap | A significantly condensed version that provides background important to the narrative thread that continues in a sequel or subsequent episode. |
| Regionalized | Alterations made to localize the work, such as changing the text on signs in the background, but excluding changes made for Product Placement. |
| Rereleased | Reissued for an un-specified reason. |
| Restored | A version that more closely resembles the original release than other versions recently available, includes restoring missing elements, correcting physical damage, etc. |
| Restored Audio | Only the audio has been restored. |
| Restored Picture | Only the video has been restored. |
| Sanitized | Objectionable audio and/or images have been obscured rather than removed. |
| Sanitized Audio | Only objectionable audio has been obscured (silenced, bleeped, replaced with alternate dialogue, etc.). |
| Sanitized Picture | Only objectionable images have been obscured (blurred, pixelated, covered with a black bar, etc.). |
| Shortened | Materials removed for other than censorship reasons, making this version shorter than a reference version. |

| Value | Explanatory Note |
|---|---|
| Sound Effects | A change in the audio, excluding music and dialogue. |
| Split | When a longer work is divided into two or more pieces for presentation in smaller time slots over multiple nights, for separate download/streaming, to fit on separate physical media, etc.<br><br>**NOTE:** Append a "Part *n*" (or similar) descriptor to the end of the Edit's Title to distinguish the split parts and indicate their viewing order. |
| Substitutions | A version where different video clips or audio elements are removed or substituted without changing the basic structure or narrative flow. Typical for archival and sports clips included in documentary programs and removal or replacement of presenters. These are not creative-driven changes but are motivated by external factors, such as licensing or other contractual requirements. |
| Syndication | A version produced expressly for television syndication. May also occur with Shortened, Sanitized, Censored, etc. |
| Textless | A version with no on-screen text, captions, credits, etc. Often prepared for international re-mastering. |
| Three-D | All or part of the version is presented in stereoscopic 3D. |
| Other | A version not otherwise described. Include a clarifying description in the Edit Details field. |

### 3.8.3 COLORTYPE DETAILS

| Value | Explanatory Note |
|---|---|
| color | A work that is presented entirely in color (includes full color, 2-strip color, hand-tinting, etc. – does not include sepia tone). |
| bandw | A work that is presented entirely in monochrome (includes true black-and-white and sepia tone). |
| colorized | An originally monochrome work that has been post-processed to appear in color. |
| composite | A work that mixes color modes, such as *The Wizard of Oz* (1939), *Sin City* (2005), and *The Phantom of the Opera* (1925). |

## 3.9 MANIFESTATION

A Manifestation describes a particular distributable instantiation of a work. For example, the Manifestation object type represents asset files in EIDR (such as the H.264 version of an asset). The encoding information is not intended to be a complete description of an encoded object; it needs to be sufficient for disambiguation at registration time and useful for managing the objects in the post-production and distribution workflow.

Of the Base Metadata, the Structural Type must always be specified for Manifestations.

The Extra Object Metadata when creating a Manifestation can have two general levels of detail:

- **Generic Manifestation** – A simple format that describes the file at a high level and includes only the ManifestationClass. Any Version Languages can be specified in the Base Object Data along with particular Manifestation descriptive details in the Description field.
- **Technical Manifestation** – A more complete format that contains detailed information about its containers, tracks, and cards. Any Version Languages specified in the Manifestation Info will be automatically summarized in the Base Object Data, replacing any Version Languages that may be there.

An Encoding Agent can be provided for individual components of a Manifestation. For example, it can be used if the encoding of individual components has been subcontracted out from the eventual Registrant or Associated Organization. The primary entity responsible for producing the Manifestation would be recorded as an Associated Org in the Base Metadata with an "encoder" role attribute.

The Extra Object Metadata for a Manifestation is contained within `ManifestationInfo`:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `Parent` | EIDR Content ID: e.g., `10.5240/7715-953F-1CCF-3501-D6CA-H`<br><br>`<xs:element name="Parent" type="eidr:assetDOIType"/>` | 1<br>Required | The EIDR Content ID of the parent Edit, Clip, Compilation, or Manifestation. |
| `ManifestationClass` | Enumeration: `Version Language, VOD, EST, Game Machine, Mobile, Web, Master, Mezzanine, Proxy, Screener, DVD, Blu-ray, HD, SD, UHD, Adaptation Set, Broadcast Package, CMP, CPL, IMF, Presentation, Representation, Other`<br><br>`<xs:element maxOccurs="8" name="ManifestationClass" type="eidr:manifestationClassType"/>` | 1-8<br>Required | The general type of Manifestation.<br><br>See "`<ExtraObjectMetadata> <ManifestationInfo> <Parent>10.5240/8CE9-63F0-4746-2DD4-9070-F</Parent>`<br><br>`<ManifestationClass>DVD</ManifestationClass> </ManifestationInfo> </ExtraObjectMetadata>`<br>ManifestationClass Details" below. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| MadeForRegion | Enumeration: ISO 3166-1 alpha-2, two-character country code, DOI four-character obsolete country code, UN M49 region code, plus "Domestic" and "International": e.g., CA<br><br><xs:element maxOccurs="8" minOccurs="0" name="MadeForRegion" type="eidr:madeForRegionType"/> | 0-8<br>Optional | The distribution territory(ies) for which the Manifestation was originally made. (This does not imply anything about where the Manifestation is actually distributed.)<br><br>**NOTE:** Domestic and International are interpreted in relation to the Manifestation's Country of Origin in the Base Object Data.<br><br>See ***Using EIDR Region Codes***. |
| ManifestationDetails | Unicode 128 character string: e.g., AVOD version<br><br><xs:element maxOccurs="8" minOccurs="0" name="ManifestationDetails" type="eidr:usageDetailsType"/> | 0-8<br>Optional | A terse, keyword-type summation of factors that differentiate this Edit from other, similar Edits. |
| @domain | A text string with no whitespace characters, following the general pattern of a dot-separated list of sub-domains ending in a top-level domain followed by an optional slash-separated list of ID types: e.g.: play.google.com<br><br><xs:attribute name="domain" type="eidr:constrainedURIType" use="required"/> | 1<br>Required | Identifies the organization that added the Manifestation Details to the record.<br><br>**NOTE:** A single Manifestation record can have Manifestation Details provided by more than one organization or multiple Manifestation Details provided by the same organization, so long as the Domains are unique. |

Here is sample XML for the Extra Object Metadata for a generic Manifestation (the preceding Base Object Data is not shown):

```
<ExtraObjectMetadata>
  <ManifestationInfo>
    <Parent>10.5240/8CE9-63F0-4746-2DD4-9070-F</Parent>
    <ManifestationClass>DVD</ManifestationClass>
  </ManifestationInfo>
</ExtraObjectMetadata>
```

### 3.9.1 MANIFESTATIONCLASS DETAILS

| Value | Explanatory Notes |
|---|---|
| Version Language | The Manifestation changes the language of the version. |
| VOD | Video on Demand |
| EST | Electronic Sell-Through |
| Game Machine | Game machine platforms |
| Mobile | Mobile platforms |
| Web | Web distribution |
| Master | A master file |
| Mezzanine | A mezzanine file |
| Proxy | Low-resolution version for editing, Web preview, etc. |
| Screener | An advance copy of a film |
| DVD | DVD |
| Blu-ray | Blu-ray |
| HD | High-definition |
| SD | Standard-definition |
| UHD | Ultra-high-definition |
| Adaptation Set | A collection of video, audio, or timed text Representations included as part of an offer. |
| Broadcast Package | A bundle of content presented in a contiguous broadcast programming block. |

| Value | Explanatory Notes |
|---|---|
| CMP | Common Media Package |
| CPL | Composition Playlist |
| IMF | Interoperable Master Format |
| Presentation | The collection of Adaptation Sets that represent a complete offer. |
| Representation | A digital file that contains a complete video, audio, or timed text stream, generally at a specific bitstream bandwidth. |
| Other | If unable to categorize otherwise |

### 3.9.2 DIGITAL DETAILS

Technical Manifestations include specific details describing the internal components and structure of the Manifestation. This can be quite extensive and is all contained inside a Digital element:

```
<xs:element name="Digital" type="eidr:digitalTracksType"/>
```

A Digital element may contain any number of the following in any order:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| Track | <xs:element name="Track" type="md:DigitalAssetMetadata-type"/> | 0-∞<br>Optional | Logical tracks of the Digital Manifestation.<br><br>Track is a complex type where all data are recorded in child elements<br><br>See “Digital Manifestation Tracks” below. |
| Container | <xs:element name="Container" type="md:ContainerMetadata-type"/> | 0-∞<br>Optional | Containers of the Digital Manifestation.<br><br>Container is a complex type where all data are recorded in child elements<br><br>See “Digital Manifestation Containers” below. |

Here is sample XML for the Extra Object Metadata for a technical Manifestation with Digital details (the preceding Base Object Data is not shown):

```
<ExtraObjectMetadata>
  <ManifestationInfo>
    <Parent>10.5240/72AD-9183-3936-6116-79F6-E</Parent>
    <ManifestationClass>HD</ManifestationClass>
    <ManifestationClass>EST</ManifestationClass>
    <ManifestationDetails domain="decellc.com/CFF/cvr">US v1.0</ManifestationDetails>
    <Digital>
      <Container>
        <md:Type>CFF</md:Type>
        <md:Track>
          <md:InternalTrackReference/>
        </md:Track>
      </Container>
      <Track>
```

```
          <md:Video>
            <md:Type>primary</md:Type>
            <md:Encoding>
              <md:Codec>H.264</md:Codec>
              <md:CodecType>IANA:h.264</md:CodecType>
              <md:BitrateMax>12000000</md:BitrateMax>
            </md:Encoding>
            <md:Picture>
              <md:AspectRatio>1:1</md:AspectRatio>
              <md:FrameRate>24</md:FrameRate>
            </md:Picture>
          </md:Video>
        </Track>
        <Track>
          <md:Audio>
            <md:Type>primary</md:Type>
            <md:Encoding>
              <md:Codec>AAC</md:Codec>
              <md:BitrateMax>192000</md:BitrateMax>
              <md:SampleRate>48000</md:SampleRate>
              <md:SampleBitDepth>16</md:SampleBitDepth>
            </md:Encoding>
            <md:Language dubbed="false">en</md:Language>
            <md:Channels>2</md:Channels>
          </md:Audio>
        </Track>
        …
        <Track>
          <md:Subtitle>
            <md:Format HDImage="false" SDImage="false">Text</md:Format>
            <md:Type>normal</md:Type>
            <md:FormatType>SMPTE 2052-1 Timed Text</md:FormatType>
            <md:Language>en</md:Language>
          </md:Subtitle>
        </Track>
      </Digital>
    </ManifestationInfo>
  </ExtraObjectMetadata>
```

## 3.10 DIGITAL MANIFESTATION TRACKS

A Digital Track element must contain one of the following elements:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `Audio` | md: DigitalAssetAudioData-type | 0-∞<br>Optional | Audio track type. See "Audio Track Details" below |
| `Video` | md: DigitalAssetVideoData-type | 0-∞<br>Optional | Video track type. See "Video Track Details" below. |
| `Subtitle` | md: DigitalAssetSubtitleData-type | 0-∞<br>Optional | Subtitle track type. See "Subtitle Track Details" below. |
| `Interactive` | md: DigitalAssetInteractiveData-type | 0-∞<br>Optional | Interactive material track type. Not common. See "Interactive Track Details" below. |

### 3.10.1 AUDIO TRACK DETAILS

The following fields are found in an Audio element:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `Description` | {xs:string of 1-128 characters, `lang` of xs:language} | 0-1<br>Optional | Explanation of what the audio encoding is, why it exists, and similar. |
| `Type` | Controlled vocabulary:<br>`primary`, `narration`, `dialogcentric`, `commentary`, `silent-omitted`, `silent`, `other` | 0-1<br>Optional | Describes purpose of the track. If not present, track is assumed to be primary. Based on md:string-Audio-Type.<br>Narration is for the visually impaired and may use multiple channels. Dialogcentric is for the hearing impaired and may use multiple channels. Commentary on the video may be paired with a PIP. |
| `Language` | {xs:language, `dubbed` Boolean attribute} | 1<br>Required | The language of this Track. Dubbed is false for works with subtitles. |
| `Encoding` | md:DigitalAssetAudioEncoding-type | 0-1<br>Optional | See Audio Encoding Details immediately below. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| Channels | xs:string | 0-1<br>Optional | Number of audio channels, either as a 1–2-digit integer (e.g., 2) or of the form x.y where x is a 1–2-digit integer of full channels, and y is limited channels (e.g. 5.1).<br>(Based on md:string-Audio-Channels.) |
| TrackReference | xs:string of 1-128 characters | 0-1<br>Optional | Track cross-reference to be used in conjunction with container-specific metadata. (Based on md:string-TrackReference.) |
| Private | md:PrivateData-type | 0-1<br>Optional | See the "Private Details" section below. |

Sample XML for the Audio block:

```
<md:Audio>
  <md:Type>primary</md:Type>
  <md:Encoding>
    <md:Codec>AAC</md:Codec>
    <md:BitrateMax>192000</md:BitrateMax>
    <md:SampleRate>48000</md:SampleRate>
    <md:SampleBitDepth>16</md:SampleBitDepth>
  </md:Encoding>
  <md:Language dubbed="false">en</md:Language>
  <md:Channels>2</md:Channels>
</md:Audio>
```

### 3.10.2 AUDIO ENCODING DETAILS

This describes the audio encoding details. Equivalent to md:DigitalAssetAudioEncoding-type.

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `Codec` | Enumeration | 1<br>Required | Codec used to encode the audio data such as AAC, AIFF, FLAC, Vorbis, WAV, or WMA. If the codec is unknown, this element should not be included. |
| `CodecType` | xs:string | 0-∞<br>Optional | Encoding of codec type based on formal registries. The first part includes the name of the authority which must be either: `mpeg4ra`, `IANA`, `rfc4281`<br>This is followed by a colon and then up to 128 characters. For example:<br>`rfc4281: audio/3gpp2; codecs=mp4a.E1` |
| `BitrateMax` | xs:integer | 0-1<br>Optional | Maximum bitrate (bits/second) |
| `BitrateAverage` | xs:integer | 0-1<br>Optional | Bitrate averaged over the entire track. (bits/second) |
| `VBR` | Enumeration:<br>`VBR`, `Constrained VBR`, `2-pass VBR` | 0-1<br>Optional | VBR type. (Based on md:string-Audio-Enc-VBR.) |
| `SampleRate` | xs:integer | 0-1<br>Optional | Optional temporal sample rate in Hz (samples/second) |
| `SampleBitDepth` | xs:integer | 0-1<br>Optional | Optional number of bits per audio sample |
| `ChannelMapping` | Enumeration | 0-1<br>Optional | Indication of how channels are mapped to intended speaker locations. See “Channel Mapping Details” below. |
| `Watermark` | DigitalAssetWatermark-type | 0-∞<br>Optional | Information about watermark(s) embedded in audio. See “Watermark Details” section below. |
| `ActualLength` | xs:duration | 0-1<br>Optional | Optional number of bits per audio sample |

Sample XML for the Encoding element:

```
<md:Encoding>
  <md:Codec>AAC</md:Codec>
```

```
      <md:BitrateMax>192000</md:BitrateMax>
      <md:SampleRate>48000</md:SampleRate>
      <md:SampleBitDepth>16</md:SampleBitDepth>
    </md:Encoding>
```

### 3.10.3 CHANNEL MAPPING DETAILS

| Value | Explanatory Notes |
|---|---|
| Enumeration: Left, Center, Right, LFE screen, Left surround, Right surround, Center surround, Left center, Right center, LFE 2, Vertical height front, Top center surround, Left wide, Right wide, Rear surround left, Rear surround right, Left surround direct, Right surround direct | From SMPTE 428-3 |

| Value | Explanatory Notes |
|---|---|
| Left Top Front Surround | |
| Left Top Rear Surround | |
| Right Top Front Surround | |
| Right Top Rear Surround | |
| stereo | Left and Right |
| dual mono | |
| 5.1 matrix | 5.1 channels matrixed in two channels |
| 6.1 Matrix | |
| surround | Greater than two channels, without a specific channel assignment |
| L,R,C,LFE,LS,RS | Left, Right, Center, Low Frequency Effects, Left Surround, Right Surround |
| IMAX 6.0 | |
| IMAX 6.1 | |
| IMAX 12.0 | |
| IMAX 12.1 | |

| Value | Explanatory Notes |
|---|---|
| L,C,R,LS,RS,LFE | Left, Center, Right, Left Surround, Right Surround, Low Frequency Effects |

### 3.10.4 WATERMARK DETAILS

This describes the Watermark element details:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| Vendor | xs:string of 2-128 characters | 0-1<br>Optional | Organization associated with the watermark. |
| ProductAndVersionID | xs:string of 1-128 characters | 0-1<br>Optional | Identification of specific watermark version of the technology. It must be sufficiently precise to differentiate between incompatible watermarks from the same Vendor. |
| Data | xs:string of 1-256 characters | 0-1<br>Optional | Data is a string that either contains the information encoded by the watermark or is a reference to that data. Its content is outside the scope of this document. This may be vendor- private data. |

### 3.10.5 PRIVATE DETAILS

This describes the Private element details that have been defined for EIDR. Based to md:PrivateData-type.

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| EncodingAgent | partyDOIType | 0-1<br>Optional | For the EIDR Party that created this container or track, or is otherwise associated with it. Informational only, and not used for access control. |
| Description | xs:string of 1-128 characters | 0-1<br>Optional | Description of this Track. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| Hash | {xs:string, method of md:Hash-type such as MD5} | 0-8<br>Optional | Hash of the file and the method used to generate it. The values for method from md:Hash-type are as follows:<br>Message Digest: MD2, MD4, MD5, C4.<br>Secure Hash: SHA-0, SHA-1, SHA-2, SHA-3<br>Cyclic Redundancy Check: CRC16, CRC32, CRC64 |
| Size | {xs:positiveInteger, optional pad of xs:positiveInteger} | 1<br>Required | Size of the track, in bytes, with optional pad attribute block size to which Size is padded. |

### 3.10.6 VIDEO TRACK DETAILS

The following fields are found in a Video element:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `Description` | {xs:string of 1-128 characters, lang of xs:language} | 0-1<br>Optional | Explanation of what the audio encoding is, why it exists, and similar. |
| `Type` | Controlled vocabulary:<br>`primary`, `overlay`, `angle`, `enhancement`, `other` | 0-1<br>Optional | Describes purpose of the track. If not present, track is assumed to be primary. Based on md:string-Video-Type.<br>Whether the primary has burned-in subtitles is determined by the presence of the SubtitleLanguage element.<br>overlay refers to PIP or other overlay track, intended for use with a "primary" track.<br>angle is alternate angle track.<br>Other is for none of the above. |
| `Encoding` | md:DigitalAssetVideoEncoding-type | 0-1<br>Optional | See "Video Encoding Details" immediately below. |
| `Picture` | md:DigitalAssetVideoPicture-type | 1<br>Required | See "Picture Details" below. |
| `ColorType` | md:ColorType-type, which has an enumeration:<br>`color`, `bandw`, `colorized`, `composite`, `unknown` | 0-1<br>Optional | Type of color in the visual portion of the content.<br>color will be the most common color type.<br>bandw for black and white.<br>colorized is for video that has had color added to what was originally filmed in black-and-white.<br>composite mixes black and white and color segments in the same frame as in the movie Sin City.<br>unknown is for assets based on legacy metadata where color type is not specified. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| PictureFormat | Controlled vocabulary:<br>Letterbox, Pillarbox, Full, Stretch, Pan and Scan, 360, Other | 0-1<br>Optional | Based on the md:string-Video-PictureFormat type.<br>"Full" means the entire original image is substantially included and that the active pixels fit the full area of the picture (within a few pixels). (This should not be confused with fullscreen, a term that may also refer to Pan and Scan.)<br>"Pan and Scan" also includes any other cropping methods.<br>"Other" is picture format encoding other than the above applies. For example, "SmileBox" or "windowbox". |
| SubtitleLanguage | {xs:language, closed Boolean attribute, type attribute (enumeration:<br>normal, SDH, large, forced, commentary, easyreader, other)} | 0-1<br>Optional | Indicates the presence of subtitles embedded in the video stream, either closed (e.g., EIA-608B) or rendered into the video. This would apply to silent films with intertitles, where the type value would be "normal".<br>This should *not* be used for subtitles handled via separate tracks. Subtitles in separate tracks should be included in DigitalAssetMetadata-type's Subtitle element.<br>This is md:DigitalAssetVideoSubtitleLanguage-type. |
| SignedLanguage | xs:language | 0-1<br>Optional | Indicates the presence of signed language in the video. The value must be a sign language such as American or French Sign Language. |
| CardsetList | md:DigitalAssetCardsetList-type | 0-∞<br>Optional | Cardsets, such as distribution logos and anti-piracy notices, embedded in video. See "Cardset List Details" below. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| TrackReference | xs:string of 1-128 characters | 0-1<br>Optional | Track cross-reference to be used in conjunction with container-specific metadata. (Based on md:string-TrackReference.) |
| Private | md:PrivateData-type | 0-1<br>Optional | See the "Private Details" section below. |

Sample XML for the Video block:

```
<md:Video>
  <md:Type>primary</md:Type>
  <md:Encoding>
    <md:Codec>H.264</md:Codec>
    <md:CodecType>IANA:h.264</md:CodecType>
    <md:BitrateMax>1600000</md:BitrateMax>
  </md:Encoding>
  <md:Picture>
    <md:AspectRatio>1:1</md:AspectRatio>
    <md:FrameRate>24</md:FrameRate>
  </md:Picture>
</md:Video>
```

### 3.10.7 VIDEO ENCODING DETAILS

This describes the audio encoding details. Equivalent to md:DigitalAssetAudioEncoding-type.

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| Codec | Enumeration | 1<br>Required | Codec used to encode the video data such as H.264, Sorenson 3. See "Video Codec Details" below. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| CodecType | xs:string | 0-∞<br>Optional | Encoding of codec type based on formal registries. The first part includes the name of the authority which must be either: mpeg4ra, IANA<br>This is followed by a colon and then up to 128 characters. For example:<br>mpeg4ra: mp4v |
| MPEGProfile | Enumeration | 0-1<br>Optional | The MPEG profile:<br>For MPEG-2: SP, MP, SNR, Spatial, HP, 422, MVP<br>For MPEG-4: MP, CBP, BP, MP, XP, HiP, CHiP (Constrained High Profile), Hi10P, Hi422P, Hi444P, Hi444PP, Hi10IP, Hi422IP, Hi444IP, C444IP, SBP, SCBP, SHP, SHIP, SCHP, StereoHP, MultiviewHP |
| MPEGLevel | Enumeration | 0-1<br>Optional | The MPEG level:<br>For MPEG-2: LL, ML, H-14 (High Level 1440), HL<br>For MPEG-4: 1, 1b, 1.1, 1.2, 1.3, 2, 2.1, 2.2, 3, 3.1, 3.2, 4, 4.1, 4.2, 5.1, 5.2 |
| BitrateMax | xs:integer | 0-1<br>Optional | Maximum bitrate (bits/second) |
| BitrateAverage | xs:integer | 0-1<br>Optional | Bitrate averaged over the entire track. (bits/second) |
| VBR | Enumeration:<br>VBR, Constrained VBR, 2-pass VBR | 0-1<br>Optional | VBR type. (Based on md:string-Audio-Enc-VBR.) |
| SampleRate | xs:integer | 0-1<br>Optional | Optional temporal sample rate in Hz (samples/second) |
| SampleBitDepth | xs:integer | 0-1<br>Optional | Optional number of bits per audio sample |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| ChannelMapping | Enumeration | 0-1<br>Optional | See “Channel Mapping Details”. |
| Watermark | Enumeration | 0-∞<br>Optional | Information about watermark(s) embedded in audio. See “Watermark Details” below. |
| ActualLength | xs:duration | 0-1<br>Optional | The actual duration of the encoded video stream. |

Sample XML for the Encoding element:

```
<md:Encoding>
  <md:Codec>H.264</md:Codec>
  <md:CodecType>IANA:h.264</md:CodecType>
  <md:BitrateMax>1600000</md:BitrateMax>
</md:Encoding>
```

### 3.10.8 VIDEO CODEC DETAILS

| Value | Explanatory Notes |
|---|---|
| AVI Uncompressed | AVI Uncompressed |
| CineForm HD | CineForm HD |
| DIVX | DivX |
| DV | DV, including variants such as DVCPRO, DVCAM, etc. |
| H.264 | H.264, MPEG-4 Part 10 |
| H.264-DolbyVision | H.264 Dolby Vision Enhancement layer |
| H.265 | HEVC/H.265 |

| Value | Explanatory Notes |
|---|---|
| H.265-DolbyVision | H.265 Dolby Vision Enhancement layer |
| JPEG2000 | JPEG 2000 |
| MOBICLIP | Actimagine's Mobiclip |
| MPEG1 | MPEG 1 Part 2 |
| MPEG2 | MPEG 2 Part 2 |
| On2 | On2 codec when not VP6, VP7 or VP8, or exact codec is unknown. |
| PHOTOJPEG | PHOTOJPEG |
| PRORES | Apple ProRes |
| PRORESHQ | Apple ProRes HQ |
| PRORES422 | Apple ProRes 422 |
| PRORESXQ | ProRes 4444 XQ |
| PRORES4444 | ProRes 4444 |
| QT Uncompressed | Apple QT Uncompressed |
| REAL | RealVideo |
| Spark | Sorenson Spark |
| SVQ | Sorenson Video Quantizer |
| WMV | Windows Media Video when not WMV7, WVM8 or WMV9 or exact codec is unknown. |

| Value | Explanatory Notes |
|---|---|
| WMV7 | Windows Media Video 7 |
| WMV8 | Windows Media Video 8 |
| WMV9 | Windows Media Video 9 |
| VC1 | Microsoft VC-1 |
| VP6 | On VP6 |
| VC-2 | VC-2 as defined by SMPTE 2042 [SMPTE-2042]; also known as Dirac. |
| VC-3 | VC-3, as defined by SMPTE ST 2019-1 [SMPTE-2019]; also known as Avid DNxHD. |
| VC-5 | VC-5 as defined by SMPTE 2073 [SMPTE-2073] ; also known as CineForm. |
| VC-6 | In development. Term may be used for SMPTE VC-6. |
| VP7 | On VP7 |
| VP8 | On VP8 |
| VP9 | Google VP9 |
| XVID | Xvid |
| OTHER | None of the above. |

### 3.10.9 PICTURE DETAILS

This is md:DigitalAssetVideoPicture-type. Only AspectRatio is required in this element.

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| AspectRatio | Restricted to a pattern of N:M, NN:M, N.NN:M | 1<br>Required | Video aspect ratio of the encoded object, which may differ from that of the original. 16:9 is HD, 4:3 is SD, 1.85:1 is 37:20, 2.2:1 is 11:5, 2.35:1 is 47:20. |
| PixelAspect | Controlled vocabulary:<br>NTSC, PAL, square, other | 0-1<br>Optional | Aspect ratio of a pixel. Note that the arithmetic ratio is implied (square would be 1:1, NTSC is 10:11). Same as md:string-Video-Pic-PixelAspect. |
| WidthPixels | xs:int | 0-1<br>Optional | Number of columns encoded (e.g., 1920) |
| HeightPixels | xs:int | 0-1<br>Optional | Number of rows encoded (e.g., 1080) |
| ActiveWidthPixels | xs:int | 0-1<br>Optional | Must be <= WidthPixels |
| ActiveHeightPixels | xs:int | 0-1<br>Optional | Must be <=HeightPixels |
| FrameRate | {xs:int, multiplier, timecode} | 0-1<br>Optional | In frames per second. If interlaced, use frame rate (e.g., NTSC is 30), not the field rate.<br>The multiplier attribute indicates whether the 1000/1001 multiple should be applied. There is only one legal value for this attribute which is “1000/1001”. If present, then apply 1000/1001 multiplier to FrameRate. For example, a FrameRate of 30 with multiplier=“1000/1001” defines an actual frame rate of 29.97. If the frame rate is integral, this attribute shall not be present.<br>The timecode attribute indicates how drop frames are handled in timecode. The values are: Drop (Drop frame SMPTE timecode), EBU (AES/EBU embedded timecode), Other. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| Progressive | {xs:boolean, scanOrder} | 0-1<br>Optional | true for progressive<br>false for interlaced<br>The scanOrder attribute indicates the scan order which differentiates interlaced types. The values for false are TFF (Top Field First), BFF (Bottom Field First), while true this value is *not* recommended, but if supplied must be PFF (Picture Per Field). |
| ColorSubSampling | Enumerated: 4:1:1, 4:2:0, 4:2:2, 4:4:4 | 0-1<br>Optional | Chroma subsampling method. |
| Colorimetry | Enumerated: 601, 709, 2020, P3, xvYCC709 | 0-1<br>Optional | "601" – ITU Recommendation BT.601, Studio encoding parameters of digital television for standard 4:3 and wide screen 16:9 aspect ratios http://www.itu.int/rec/R-REC-BT.601/en<br>"709" – ITU Recommendation BT.709, Parameter values for the HDTV standards for production and international program exchange. http://www.itu.int/rec/R-REC-BT.709/en<br>"2020" – ITU Recommendation BT.2020, Parameter values for ultra-high definition television systems for production and international program exchange. http://www.itu.int/rec/R-REC-BT.2020/en<br>"P3" – SMPTE PR 431-2:2011 D-Cinema Quality – Reference Projector and Environment. This is also referred to as DCI-P3 or P3.<br>"xvYCC709" – Colorimetry for use with Rec.709 primaries defined in [IEC61966-2-4] |
| Type3D | Controlled vocabulary: IMAX, RealD, etc. | 0-1<br>Optional | Describes type of 3D picture. Required if ThreeD is true. |

Sample XML for the Picture element:

```
<md:Picture>
  <md:AspectRatio>1:1</md:AspectRatio>
  <md:FrameRate>24</md:FrameRate>
</md:Picture>
```

### 3.10.10 CARDSET LIST DETAILS

A cardset is the collection of static text or graphics separate from the work itself that appear at the beginning or end of the video. Cardsets are typically specific to a market and include distributor logos and anti-piracy warnings. Cardsets may be embedded in video (i.e., burned in) or overlaid on video via a subtitle.

The following fields are found in a CardsetList element:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `Type` | Controlled Vocabulary:<br>`Theatrical`, `Broadcast`, `Hospitality`, `Rental`, `EST` | 0-1<br>Optional | The intended general usage of the cardset list. Based on md:string-Subtitle-Format. |
| `Region` | Enumeration | 0-1<br>Optional | This describes the region(s) for which the cardset was made. The values can be Domestic, International or an ISO 3166-1 alpha 2, two-character code. |
| `Cardset` | md:DigitalAssetCardset-type | 1<br>Required | Description of the cardset. See immediately below. |

The following fields are found in a Cardset element:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `Type` | Controlled Vocabulary:<br>`AntiPiracy`, `DistributionLogo`, `Rating`, `DubbingCredit`, `Intermission`, `EditNotice`, `Health`, `Other` | 0-∞<br>Optional | The intended general usage of the cardset list. This is identical to md:string-Cardset-Type. |
| `Description` | xs:string of 1-128 characters | 0-1<br>Optional | Description of cardset (human readable). |
| `Sequence` | xs:positiveInteger | 0-1<br>Optional | Order of display for this cardset. A higher number represents later display. Cardsets with the same sequence must not overlap Region. |

### 3.10.11 SUBTITLE TRACK DETAILS

The following fields are found in a Subtitle element:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `Format` | {Controlled Vocabulary:<br>`Text`, `Image`, `Combined`, `SDImage` of xs:boolean, `HDImage` of xs:boolean } | 0-1<br>Optional | Format for subtitles that are in separate components from the video. Based on md:string-Subtitle-Format.<br>SDImage Are subtitle images targeted towards SD included? “true” means yes, “false” or absent means no. This only applies if Format is “Image” or “Combined”<br>HDImage Are subtitle images targeted towards HD included? “true” means yes, “false” or absent means no. This only applies if Format is “Image” or “Combined” |
| `Description` | {xs:string of 1-128 characters, `lang` of xs:language} | 0-1<br>Optional | Explanation of what the subtitle is/why it exists, etc. Description is in the language of the Description text. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| Type | Controlled Vocabulary:<br>normal, SDH, large, forced, noforced, commentary, easyreader, singalong, other | 1-8<br>Required | Subtitle purpose. If the track has more than one intended use, then include multiple instances of Type. Based on md:string-Subtitle-Type.<br>normal – typically used for the actors' dialogue<br>SDH – for the hearing impaired<br>large – for the visually impaired<br>forced – subtitles are always shown (regardless of whether the user has enabled subtitles)<br>noforced – indicates subtitles do not contain forced subtitles. Must be used with another Type, but not 'forced'. For example, a subtitle with Type of 'normal' and 'noforced' would contain all language subtitles except forced subtitles.<br>easyreader – complying with US Federal requirements [47CFR9.103(c)(9)]<br>singalong – Timed text is used primarly to show words that go with song for the purpose of singing along. This should only be usd if distinct from SDH. |
| FormatType | Controlled Vocabulary:<br>3GPP, Blu-ray, CAP, DCI, DVB, DVD, DXFP, SMPTE 21052-1 Timed Text, SCC, SRT, STL, TTML, ITT, CFF-TT, IMSC1, WebVTT | 0-8<br>Optional | Subtitle format. If the track has more than one intended use, then include multiple instances of Type. The most common value is simply normal. Based on md:string-Subtitle-FormatType. |
| Language | xs:language | 1<br>Required | Language of the subtitle. |
| CardSetList | md:DigitalAssetCardsetList-type | 0-∞<br>Optional | See "Cardset List Details". |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| TrackReference | 1-64 character xs:string | 0-1<br>Optional | Track cross-reference to be used in conjunction with container-specific metadata. See explanation under . |
| Private | md:PrivateData-type | 0-1<br>Optional | See the "Private Details" section below. |

Sample XML for the Subtitle element:

```
<md:Subtitle>
  <md:Format HDImage="false" SDImage="false">Text</md:Format>
  <md:Type>normal</md:Type>
  <md:FormatType>SMPTE 2052-1 Timed Text</md:FormatType>
  <md:Language>en</md:Language>
</md:Subtitle>
```

### 3.10.12 INTERACTIVE TRACK DETAILS

The following fields are found in an Interactive element:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| Type | Controlled vocabulary | 1<br>Required | Describes purpose of the track.<br>Menu – Menu system for navigating settings, value added material and other options.<br>Mixed-Media – Mixed Media Experience, such as Cross-Platform Extras (CPE) or iTunes Extras package<br>Standalone Game – Playable game that runs independently of audio or video material<br>Overlay Game – Game synchronized to audio or video material<br>Skins – Information that customizes appearance<br>Interactivity – Ability to choose settings, value added material and other options outside of menus. For example, pop-ups.<br>Image – Identifies the special case where the interactive application is an image. This supports the case where no other application Type is playable. This is typically used in conjunction with Encoding/RuntimeEnvironment='Default'<br>Commerce – Commerce Experience<br>Location – Location or Mapping application<br>Live – Live Data feed<br>Comic – Digital Comic<br>VR – Virtual Reality Experience.<br>AR – Augmented Reality Experience<br>MR – Mixed Reality Experience<br>360 – Linear 360-degree video experience. This covers 360-degree experiences not encoded as a single linear video. Typically, it will fall in this category if playback requires a player not currently assumed in Common Metadata.<br>Other – None of the above. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| FormatType | Controlled vocabulary:<br>`text`, `executable`, `metadata` | 0-1<br>Optional | Describes the format of the track.<br>Text – Instructive text.<br>Executable – Software that is executable through a runtime environment such as those described in "Interactive Encoding Details" RuntimeEnvironment.<br>Metadata – Declarative data that describes behavior to a runtime environment |
| Language | {xs:language, `dubbed` Boolean attribute} | 0-1<br>Optional | The language of this Track. Dubbed is false for subtitles. |
| Encoding | md:DigitalAssetInteractiveEncoding-type | 0-1<br>Optional | See "Interactive Encoding Details" below. |
| TrackReference | xs:string of 1-128 characters | 0-1<br>Optional | Track cross-reference to be used in conjunction with container-specific metadata. (Based on md:string-TrackReference.) |
| Private | md:PrivateData-type | 0-1<br>Optional | See the "Private Details" section above. |

### 3.10.13 INTERACTIVE ENCODING DETAILS

This describes the interactive encoding details. Equivalent to md:DigitalAssetInteractiveEncoding-type.

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| RuntimeEnvironment | Enumeration | 1<br>Required | The execution runtime environment for the interactive content:<br>CMX – Connected Media Experience<br>Flash – Adobe Flash<br>BD-J – Blu-ray Java<br>MHEG – MHEG-5, or more formally ISO/IEC 13522-5.<br>HTML5 – W3C HTML5<br>Android – Android operating system native app<br>iOS – Apple iOS operating system native app<br>tvOS – Apple tvOS<br>MacOS – Apple MacOS native app<br>Windows – Microsoft Windows native app<br>BrightScript – Roku BrightScript native app<br>Linux – Linux native app<br>Default – Represents an application that can be played if nothing else can. This is typically an image.<br>Other – may be used when there is not a type convention. |
| FirstVersion | xs:string of 1-64 characters | 0-1<br>Optional | Earliest version of RuntimeEnvironment in which this encoding will play. If it plays in all versions, or all versions less than or equal to LastVersion, this element may be omitted. |
| LastVersion | xs:string of 1-64 characters | 0-1<br>Optional | Last version of RuntimeEnvironment in which this encoding will play. If it plays in all versions, or all versions after FirstVersion, this element may be omitted. |

## 3.1 DIGITAL MANIFESTATION CONTAINERS

A Container element may contain the following:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `Type` | Enumeration | 1<br>Required | Type of Container. For example:<br>CFF – Common File Format (UltraViolet).<br>MP4 - MPEG-4 Part 14, ISO/IEC 14496-14:2003 |
| `Track` | md:ContainerTrackMetadata-type | 1-∞<br>Required | Track metadata. See details below. |
| `Hash` | {xs:string, `method` of md:Hash-type such as `MD5`} | 0-∞<br>Optional | Hash of the Container and the method used to generate it. The methods from md:Hash-type are as follows.<br>Message Digest: `MD2`, `MD4`, `MD5`, `C4`.<br>Secure Hash: `SHA-0`, `SHA-1`, `SHA-2`, `SHA-3`<br>Cyclic Redundancy Check: `CRC16`, `CRC32`, `CRC64` |
| `Size` | xs:positiveInteger | 0-1<br>Optional | Size of container in bytes (octets). |
| `ContainerReference` | xs:string of 1-128 characters | 0-1<br>Optional | Cross-reference to be used if this Container is used in some other Container in this or another Manifestation. (Analogous to TrackReference for Tracks) |
| `ContainerSpecificMetadata` | md:ContainerSpecific-type | 0-1<br>Optional | Additional information about the content and structure of the Container. See details below. |

A Container Track element must contain one and only one of the following:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `ExternalTrackReference` | {EIDR content ID, `namespace` attribute, `location` attribute, `trackReference` attribute of 128 characters} | 0-1 Conditionally Required | Used to specify the inclusion of a Track defined in some structure other than the one that contains the current Track. The reference may be to a standalone Track or part of another Container. If part of a Container, the trackReference attribute should point to the Digital Track in the other Container.<br><br>Required if InternalTrackReference is not provided |
| `InternalTrackReference` | xs:string of 0-128 characters | 0-1 Conditionally Required | Reference to a Track that is internal to the Container. This is used when it is preferred to refer to Track by IDs rather than metadata.<br>A Track may not contain an empty InternalTrackReference unless it is the only Track, in which case it means that the Container implicitly includes all of the other Tracks and Containers from the containing Manifestation.<br><br>Required if ExternalTrackReference is not provided |

This describes the ContainerSpecificMetadata elements:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| EncodingAgent | partyDOIType | 0-1 Optional | For the EIDR Party that created this Container or Track, or is otherwise associated with it. Informational only, and not used for access control. |
| Description | xs:string of 1-128 characters | 0-1 Optional | Description of the Container. |

Here is sample XML for a Digital element:

```
<Digital>
  <Container>
    <md:Type>CFF</md:Type>
    <md:Track><md:InternalTrackReference></md:InternalTrackReference></md:Track>
  </Container>
  <Track>
    <md:Video>
      <md:Type>primary</md:Type>
      <md:Encoding>
        <md:Codec>H.264</md:Codec>
        <md:CodecType>IANA:h.264</md:CodecType>
        <md:BitrateMax>1600000</md:BitrateMax>
      </md:Encoding>
      <md:Picture>
        <md:AspectRatio>1:1</md:AspectRatio>
        <md:FrameRate>24</md:FrameRate>
      </md:Picture>
    </md:Video>
  </Track>
  <Track>
    <md:Audio>
      <md:Type>primary</md:Type>
      <md:Encoding>
        <md:Codec>AAC</md:Codec>
        <md:BitrateMax>192000</md:BitrateMax>
        <md:SampleRate>48000</md:SampleRate>
        <md:SampleBitDepth>16</md:SampleBitDepth>
      </md:Encoding>
      <md:Language dubbed="false">en</md:Language>
      <md:Channels>2</md:Channels>
    </md:Audio>
  </Track>
  <Track>
    <md:Audio>
      <md:Type>primary</md:Type>
      <md:Encoding>
        <md:Codec>DTS-HRA</md:Codec>
        <md:BitrateMax>192000</md:BitrateMax>
        <md:SampleRate>48000</md:SampleRate>
```

```
          <md:SampleBitDepth>24</md:SampleBitDepth>
        </md:Encoding>
        <md:Language dubbed="false">en</md:Language>
        <md:Channels>6</md:Channels>
      </md:Audio>
    </Track>
    <Track>
      <md:Subtitle>
        <md:Format HDImage="false" SDImage="false">Text</md:Format>
        <md:Type>normal</md:Type>
        <md:FormatType>SMPTE 2052-1 Timed Text</md:FormatType>
        <md:Language>en</md:Language>
      </md:Subtitle>
    </Track>
    <Track>
      <md:Subtitle>
        <md:Format HDImage="false" SDImage="false">Text</md:Format>
        <md:Type>normal</md:Type>
        <md:FormatType>SMPTE 2052-1 Timed Text</md:FormatType>
        <md:Language>en</md:Language>
      </md:Subtitle>
    </Track>
  </Digital>
```

# 4 OTHER RELATIONSHIPS

EIDR supports four optional lightweight relationships, in addition to the relationships implicit in Derived Types:

- IsAlternateContentFor – for alternate or additional content that in synchronized to the main asset, such as audio or an alternate camera angle. (This should not be used for translations, which are handled by Manifestations.)
- IsPackagingOf – for creating a collection of assets that are released together.
- IsPromotionFor – for promotional objects such as trailers.
- IsSupplementTo – for ancillary material that might be bundled with other assets, such as outtakes or behind-the-scenes featurette.

These have two purposes:

- To aid in locating related assets.
- To guide disambiguation.

These relationships are called “lightweight” because they do not support data inheritance between the source of the relationship and its target.

In general, these are applied to Abstraction records. So, for example, an Abstraction record for a trailer would have an IsPromotionOf relationship to the Abstraction record for the feature film it promotes, but the trailer’s child Edits and Manifestations would not have any relationships to the feature.[20]

All of them have two required fields: an ID for the target of the relationship and an enumerated descriptor (a relationship-specific class element), both of which can be queried by value. These relationships can also be modified and deleted as described in the ***Registry Technical Overview***.

[20] There would still be implicit inheritance relationships between the Manifestation and the Edit, and between the Edit and the trailer Title record. Traversing these links would eventually lead to the promoted feature film’s Title record.

## 4.1 ALTERNATE CONTENT

This can be applied to all Referent Types except Series and Season and can point to any EIDR Content record.

The Extra Object Metadata for an IsAlternateContentFor Relationship is contained within `AlternateContentInfo`:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `ID` | EIDR Content ID: e.g., `10.5240/B5FE-987F-3A25-0DC9-F56E-9`<br><br>`<xs:element name="ID" type="eidr:assetDOIType"/>` | 1<br>Required | The EIDR Content ID of the target of the relationship. |
| `AlternateContentClass` | Enumeration: `Descriptive Audio, Camera Angle, Alternate Scene, Parental Control, Censored, Commentary (Director), Commentary (Other), Sing Along, Trivia Track, Other`<br><br>`<xs:element name="AlternateContentClass" type="eidr:alternateContentClassType"/>` | 1<br>Required | The type of Alternate Content. |

Here is sample XML for the Extra Object Metadata for an Alternate Content relationship:

```
<ExtraObjectMetadata>
      …
  <AlternateContentInfo>
    <ID>10.5240/B5FE-987F-3A25-0DC9-F56E-9</ID>
    <AlternateContentClass>Descriptive Audio</AlternateContentClass>
  </AlternateContentInfo>
      …
<ExtraObjectMetadata>
```

## 4.2 PACKAGING

The Extra Object Metadata for an IsPackagingOf Relationship is contained within `PackagingInfo`:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `ID` | EIDR Content ID: e.g., `10.5240/E334-70A8-9B50-4084-6F8C-0`<br><br>`<xs:element name="ID" type="eidr:assetDOIType"/>` | 1<br>Required | The EIDR Content ID of the target of the relationship. |
| `PackagingClass` | Enumeration: `DVD, BD, HD, SD, Streaming, Streaming (Web), Streaming (Mobile), Download (Web), Download (Mobile), VOD, Broadcast, Digital Cinema, Other`<br><br>`<xs:element name="PackagingClass" type="eidr:packagingClassType"/>` | 1<br>Required | The type of Packaging. |

Here is sample XML for the Extra Object Metadata for a Packaging relationship:

```
<ExtraObjectMetadata>
      …
  <PackagingInfo>
    <ID>10.5240/E334-70A8-9B50-4084-6F8C-0</ID>
    <PackagingClass>Streaming</PackagingClass>
  </PackagingInfo>
      …
</ExtraObjectMetadata>
```

## 4.3 PROMOTION

The Extra Object Metadata for an IsPromotionFor is contained within `PromotionInfo`:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `ID` | EIDR Content ID: e.g., `10.5240/E334-70A8-9B50-4084-6F8C-0`<br><br>`<xs:element name="ID" type="eidr:assetDOIType"/>` | 1<br>Required | The EIDR Content ID of the target of the relationship. |
| `PromotionClass` | Enumeration: `Broadcast Ad, Theatrical Trailer, Infomercial, EPK, DVD Trailer, Web, Mobile, UGC Site, Radio Spot, Preview, Sizzle Reel, Teaser, Other`<br><br>`<xs:element name="PromotionClass" type="eidr:promotionClassType"/>` | 1<br>Required | The type of Promotion. |

Here is sample XML for the Extra Object Metadata for a Promotion relationship:

```
<ExtraObjectMetadata>
      …
  <PromotionInfo>
    <ID>10.5240/1212-3434-5656-7878-0000-Q</ID>
    <PromotionClass>Theatrical Trailer</PromotionClass>
  </PromotionInfo>
      …
</ExtraObjectMetadata>
```

## 4.4 SUPPLEMENTAL

This can be applied to all Referent Types except Series and Season and can point to any EIDR Content record.

The Extra Object Metadata for an IsSupplementTo Relationship is contained within `SupplementalInfo`:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `ID` | EIDR Content ID: e.g., `10.5240/0CFA-101D-A652-ABDE-02FA-T`<br><br>`<xs:element name="ID" type="eidr:assetDOIType"/>` | 1<br>Required | The EIDR Content ID of the target of the relationship. |
| `SupplementalContentClass` | Enumeration: `Interactivity, Outtake, Making Of, Interview, Music, Music Video, Deleted Scene, Behind the scenes, B-roll, Featurette, Selected Clips, Screen Test, Other`<br><br>`<xs:element name="SupplementalContentClass" type="eidr:supplementalContentClassType"/>` | 1<br>Required | The type of Supplemental Content. |

Here is sample XML for the Extra Object Metadata for a Supplemental relationship:

```
<ExtraObjectMetadata>
      …
  <SupplementalContentInfo>
    <ID>10.5240/0CFA-101D-A652-ABDE-02FA-T</ID>
    <SupplementalContentClass>Outtake</SupplementalContentClass>
  </SupplementalContentInfo>
      …
</ExtraObjectMetadata>
```

# 5 PROVENANCE DATA

In addition to user-defined data, EIDR records have a number of system-defined fields. For Content records, the foremost of these is the EIDR Content ID itself. In addition, there is a resolution format option called Provenance that collects information about the history of a record. This is a read-only record structure. It cannot be registered or edited directly by a user.

The Provenance Data for is contained within `ProvenanceMetadata`:

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| `ID` | EIDR Content ID: e.g., `10.5240/3222-CFD8-DB21-9DA8-00B6-9`<br><br>`<xs:element name="ID" type="eidr:assetDOIType"/>` | 1<br>Required | The EIDR Content ID of the associated record. |
| `IssueNumber` | A positive integer: e.g., `7`<br><br>`<xs:element name="IssueNumber" type="xs:integer"/>` | 1<br>Required | The version number of the record. The initial registration is 1. Each modify increments the number by one. |
| `Status` | Enumeration: `valid`, `in development`, `alias`<br><br>`<xs:element name="Status" type="eidr:statusType"/>` | 1<br>Required | This is similar to the Status field in BaseObjectData, but it is available even when the object is deleted.[21]<br><br>For details on Provenance Status, see ***Registry Technical Overview***. |

[21] Records are never deleted in EIDR. Instead, they are aliased to the Tombstone record, 10.5240/0000-0000-0000-0000-0000-X.

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| Administrators | <xs:element name="Administrators" type="eidr:administratorsInfoType"/> | 1<br>Required | The record's Registrant and Metadata Authorities.<br><br>Administrators is a complex type where all data are recorded in child elements.<br>See Base Object Type "<br>Administrators Details" above. |
| /Registrant | The EIDR Party ID of the entity that created the record: e.g., 10.5237/F012-89FD<br><br><xs:element name="Registrant" type="eidr:registrantType"/> | 1<br>Required | The record's original Registrant. |
| /MetadataAuthority | The EIDR Party ID of the entity that created the record: e.g.: 10.5237/F012-89FD<br><br><xs:element maxOccurs="4" minOccurs="0" name="MetadataAuthority" type="eidr:metadataAuthorityType"/> | 0-4<br>Optional | The record's Metadata Authorities. |
| CreatedBy | The EIDR User ID of the person or automated system that created the record: e.g., 10.5238/mklei<br><br><xs:element minOccurs="0" name="CreatedBy" type="eidr:userDOIType"/> | 0-1<br>Optional | EIDR username that created the record.<br><br>**NOTE:** This field is not visible to users who are not on the record's ACL (Access Control List).<br><br>For details on the ACL see the ***Registry Technical Overview***. |
| CreationDate | A full date and time in the format yyyy-mm-ddThh-mm-ssZ: e.g., 2013-10-22T22:52:17Z<br><br><xs:element name="CreationDate" type="xs:dateTime"/> | 1<br>Required | Record creation timestamp in UTC based on receipt by the Registry. |

| Field Name | Type | Cardinality | Explanatory Notes |
|---|---|---|---|
| LastModifiedBy | The EIDR User ID of the person or automated system that last modified the record: e.g., 10.5238/rkroon-superparty<br><br><xs:element minOccurs="0" name="LastModifiedBy" type="eidr:userDOIType"/> | 0-1<br>Optional | EIDR username that last modified the record. When a record is first created (IssueNumber = 1), CreatedBy and LastModifiedBy are the same.<br><br>**NOTE:** This field is not visible to users who are not on the record's ACL (Access Control List).<br><br>For details on the ACL see the ***Registry Technical Overview***. |
| LastModificationDate | A full date and time in the format yyyy-mm-ddThh-mm-ssZ: e.g., 2016-01-01T04:02:41Z<br><br><xs:element name="LastModificationDate" type="xs:dateTime"/> | 1<br>Required | Last modification timestamp in UTC based on receipt by the Registry. When a record is first created (IssueNumber = 1), CreationDate and LastModificationDate are the same. |
| PublicationDate | A full date and time in the format yyyy-mm-ddThh-mm-sssZ: e.g., 2016-01-01T04:07:50.558Z<br><br><xs:element minOccurs="0" name="PublicationDate" type="xs:dateTime"/> | 0<br>Optional | Publication timestamp with milliseconds in UTC based on when the record was finally processed and made available in the Registry (following Registry validation and De-Duplication review).<br><br>**NOTE:** Older records do not have a Publication Date, only Creation and Modification Dates. When it is present, this is always > the Last Modification Date. |

**NOTE:** If the user is not on a particular record's ACL (Access Control List), then the CreatedBy and LastModifiedBy fields will not be visible.

Here is sample XML for the Provenance Metadata for a record that has been modified seven times:

```
<ProvenanceMetadata xmlns="http://www.eidr.org/schema">
  <ID>10.5240/3222-CFD8-DB21-9DA8-00B6-9</ID>
  <IssueNumber>7</IssueNumber>
  <Status>valid</Status>
```

```
  <Administrators>
    <Registrant>10.5237/F012-89FD</Registrant>
    <MetadataAuthority>10.5237/F012-89FD</MetadataAuthority>
  </Administrators>
  <CreatedBy>10.5238/mklei</CreatedBy>
  <CreationDate>2013-10-22T22:52:17Z</CreationDate>
  <LastModifiedBy>10.5238/rkroon-superparty</LastModifiedBy>
  <LastModificationDate>2016-01-01T04:02:41Z</LastModificationDate>
  <PublicationDate>2016-01-01T04:07:50.558Z</PublicationDate>
</ProvenanceMetadata>
```

## APPENDIX I: FIELDS THAT HAVE ASCII EQUIVALENTS

The Registry generates ASCII equivalents for many fields with values that use diacritical characters in Latin scripts (such as u for ü and l for ł). The mapping is based on Unicode NFKD decomposition plus the Latin supplement (Latin-ASCII.xml) from the Unicode Common Locale Data Repository. This applies to the following fields:

```
BaseObjectData/ResourceName
BaseObjectData/AlternateResourceName
BaseObjectData/AssociatedOrg/DisplayName
BaseObjectData/AssociatedOrg/AlternateName
BaseObjectData/Credits/Director/DisplayName
BaseObjectData/Credits/Actor/DisplayName
BaseObjectData/Description
ExtraObjectMetadata/CompilationInfo/Entry/DisplayName
ExtraObjectMetadata/CompositeInfo/Element/Description
ExtraObjectMetadata/ManifestationInfo/…/Description
```

**NOTE:** These fields are automatically whitespace normalized[22] by the Registry. This has no effect on searching or de-duplication, but makes display values more consistent.

**NOTE:** In addition to enhancing Registry operations so consistent results are returned if one user applies accent marks and another does not, there is also a key Registry data validation implication. Since the Registry ignores diacritical marks, accented and un-accented characters are equivalent for Registry validation, search, and de-duplication. Given the choice, always use the accented version when registering or modifying a record since that tends to be the more correct representation of local language use.

[22] Tabs, carriage returns, non-breaking spaces, etc. are replaced with spaces, multiple spaces in a row are replaced with a single space, and leading and trailing spaces are removed.

## APPENDIX II: DOI RESOLUTION

While EIDR records will usually be resolved in a native EIDR format, some interoperable applications may choose to use the DOI format. This format maps the EIDR content fields to the DOI standard kernelMetadata fields as described below. Note that some of the mappings are not always precise (such as referentCreation character for films without dialog that have a musical score). For more information on the DOI Resolution format, see ***EIDR – DOI Mapping Table***.

Below is a sample XML response to a resolution request for the DOIKernel view for an EIDR Season record:

```
<?xml version="1.0" encoding="UTF-8"?>
<kernelMetadata xmlns="http://www.doi.org/2010/DOISchema">
 <referentDoiName>10.5240/B94E-F500-7164-57DB-82F5-6</referentDoiName>
 <primaryReferentType>Creation</primaryReferentType>
 <registrationAgencyDoiName>10.1000/ra-5</registrationAgencyDoiName>
 <issueDate>2015-01-07</issueDate>
 <issueNumber>7</issueNumber>
 <referentCreation>
  <name primaryLanguage="en">
   <value>Mysterious Journeys: Season 1</value>
   <type>Title</type>
  </name>
  <identifier>
   <nonUriValue>10.5240/B94E-F500-7164-57DB-82F5-6</nonUriValue>
   <uri returnType="text/html">https://ui.eidr.org/view/content?id=10.5240/B94E-F500-7164-57DB-82F5-6</uri>
   <uri returnType="application/xml">https://doi.org/10.5240/B94E-F500-7164-57DB-82F5-6</uri>
   <type>EidrContentID</type>
  </identifier>
  <identifier>
   <nonUriValue>1069705</nonUriValue>
   <type validNamespace="spe.sony.com/ProductID">ProprietaryIdentifier</type>
</identifier>
  <identifier>
 <nonUriValue>X7754402</nonUriValue>
   <type validNamespace="spe.sony.com/MPM">ProprietaryIdentifier</type>
</identifier>
<structuralType>Abstraction</structuralType>
<mode>Audio</mode><mode>Visual</mode>
<character>Language</character><character>Image</character>
<type>Season</type>
<principalAgent>
```

```
 <name>
  <value>mike mathis productions</value>
  <type>Name</type>
 </name>
 <identifier>
  <value>10.5237/8696-318E</value><type>EIDRPartyID</type>
 </identifier>
 <role>CorporateCreator</role>
</principalAgent>
<principalAgent><name><value>Ron Zimmerman</value><type>Name</type></name><role>Director</role></principalAgent>
<principalAgent><name><value>Erik Todd Dellums</value><type>Name</type></name><role>Actor</role></principalAgent>
<principalAgent><name><value>Blake Clark</value><type>Name</type></name><role>Actor</role></principalAgent>
<linkedCreation>
 <identifier>
  <nonUriValue>10.5240/BFC3-3DCA-7BEF-A4B6-E16B-Z</nonUriValue>
  <uri returnType="text/html">https://ui.eidr.org/view/content?id=10.5240/BFC3-3DCA-7BEF-A4B6-E16B-Z</uri>
  <uri returnType="application/xml">https://doi.org/10.5240/BFC3-3DCA-7BEF-A4B6-E16B-Z</uri>
  <type>EidrContentID</type>
 </identifier>
 <referentCreationRole>Season</referentCreationRole>
 <referentCreationSequenceIdentifier>
  <value>1</value>
  <type userDefinedType="SequenceNumber">ProprietaryIdentifier</type>
 </referentCreationSequenceIdentifier>
</linkedCreation>
<linkedCreation>
 <identifier><nonUriValue>10.5240/40F2-A02E-6132-8F82-A2DE-P</nonUriValue>
  <uri returnType="text/html">https://ui.eidr.org/view/content?id=10.5240/40F2-A02E-6132-8F82-A2DE-P</uri>
  <uri returnType="application/xml">https://doi.org/10.5240/40F2-A02E-6132-8F82-A2DE-P</uri>
  <type>EidrContentID</type>
 </identifier>
 <linkedCreationRole>Episode</linkedCreationRole>
</linkedCreation>
<linkedCreation>
 <identifier>
  <nonUriValue>10.5240/20DF-9454-66B9-E9E7-7D41-S</nonUriValue>
  <uri returnType="text/html">https://ui.eidr.org/view/content?id=10.5240/20DF-9454-66B9-E9E7-7D41-S</uri>
  <uri returnType="application/xml">https://doi.org/10.5240/20DF-9454-66B9-E9E7-7D41-S</uri>
  <type>EidrContentID</type>
 </identifier>
 <linkedCreationRole>Episode</linkedCreationRole>
```

```
</linkedCreation>
<linkedCreation>
 <identifier>
  <nonUriValue>10.5240/AB2D-6075-8A0A-1969-2887-H</nonUriValue>
  <uri returnType="text/html">https://ui.eidr.org/view/content?id=10.5240/AB2D-6075-8A0A-1969-2887-H</uri>
  <uri returnType="application/xml">https://doi.org/10.5240/AB2D-6075-8A0A-1969-2887-H</uri>
  <type>EidrContentID</type>
 </identifier>
 <linkedCreationRole>Episode</linkedCreationRole>
</linkedCreation>
<linkedCreation>
 <identifier>
  <nonUriValue>10.5240/A8E3-7701-0B2F-15B4-C878-P</nonUriValue>
  <uri returnType="text/html">https://ui.eidr.org/view/content?id=10.5240/A8E3-7701-0B2F-15B4-C878-P</uri>
  <uri returnType="application/xml">https://doi.org/10.5240/A8E3-7701-0B2F-15B4-C878-P</uri>
  <type>EidrContentID</type>
 </identifier>
 <linkedCreationRole>Episode</linkedCreationRole>
</linkedCreation>
 </referentCreation>
</kernelMetadata>
```

# APPENDIX III: DATA VALIDATION RULES

When EIDR records are matched, created or modified, the data is validated in two ways:

1. The data must first conform to the EIDR schema.
2. The EIDR Registry then performs a number of additional validation tests that cannot be expressed in an XML schema.

This section summarizes the content validation tests. The rules are specified here from the perspective of each of the API functions (and not how the metadata record is eventually serialized or disseminated from the Registry). Note that the Match API skips those rules marked with an asterisk (*) below. Validation rules are included in the field descriptions in Sections 2 and 0, above.

Terminology (as used in tables below for each type of API method or operation: create, modify, etc.):

- Fixed: Implies the value set for the field is a controlled vocabulary.
- Fixed and conditional: Implies the value set for the field is a controlled vocabulary, but the actual values from the set depend on some other condition.
- Conditional: The actual values from the set depend on some other condition.
- Must be specified: Implies the value for the field must exist. The schema will enforce the format of the value.
- Must be absent: Implies the field must not exist.
- Enforced by schema: Implies no additional rule exists for the field besides what the schema already enforces. For certain field-type combinations, additional rules besides what the schema enforces are required. For those cases where additional rules are not required, this phrase would be used (in order to be thorough).
- Inherited from nearest ancestor if not specified: Implies the value for the field is inherited from its parent record if not Self-Defined in the current record.
- Not Applicable or blank rule: Implies no rule exists for the field regardless of whether the schema enforces or not.

## CREATE VALIDATION

### BASE OBJECT METADATA BY CREATION TYPE:

| Field | Basic | Series | Season | Episode | Manifestation | Edit |
|---|---|---|---|---|---|---|
| **Referent Type** | Fixed: One of TV, Movie, Short, Web, Supplemental. | Fixed: Series | Fixed: Season | Fixed: One of TV, Movie, Short, Web, Supplemental. | Inherited from nearest ancestor if not specified.<br>If specified, it must be one of TV, Movie, Short, Web, Supplemental, Interctive Material. | Inherited from nearest ancestor if not specified.<br>If specified, it must be one of TV, Movie, Short, Web, Supplemental, Interactive Material. |
| **Structural Type** | Fixed: Abstraction | Fixed: Abstraction | Fixed: Abstraction | Fixed: Abstraction | Inherited from nearest ancestor if not specified.<br>It must be one of Performance, Digital, Physical | Fixed: Performance |
| **Mode** | If AudioVisual, ReleaseDate must be after 1893; if Visual, "mode" attribute of OriginalLanguage or VersionLanguage must not be Audio | | | | | |
| **Resource Name** | May not be empty. | May not be empty. | Conditional: If parent's OriginalTitleRequired is true, must be specified. May not be empty.<br>Must not be identical to the ResourceName of the parent series. | Conditional: If parent's OriginalTitleRequired is true, must be specified. May not be empty. | Inherited from nearest ancestor if not specified. If specified, may not be empty. | Inherited from nearest ancestor if not specified. If specified, may not be empty. |

| Field | Basic | Series | Season | Episode | Manifestation | Edit |
|---|---|---|---|---|---|---|
| **Alternate Resource Name** | Must not duplicate the Resource Name or another Alternate. | | | | | |
| **Original Languages** | Enforced by schema. | Enforced by schema. | Enforced by schema. | Enforced by schema. | Must be absent. | Must be absent. |
| **Version Languages** | Must be absent. | Must be absent. | Must be absent. | Must be absent. | Each Version Language must be distinct. The “type” and “mode” attributes are taken into account. If ManifestationClass is "Version Language", a VersionLanguage must be present. | Each Version Language must be distinct. The “type” and “mode” attributes are taken into account. |
| **Associated Org** | Must not duplicate both Display Name and role.<br>If organizationID is provided, idType must also be provided.<br>If no organizationID or idType is ISNI, DisplayName is required.<br>If idType is EIDRPartyID, org must be a valid EIDR Party ID with the AssociatedOrg role. | | | | | |

| Field | Basic | Series | Season | Episode | Manifestation | Edit |
|---|---|---|---|---|---|---|
| **Release Date** | Cannot be more than 20 years in the future.<br>All records must be >1877. If longer than 40 minutes and OriginalLanguage has mode Audio, must be >= 1927-10-06. TV Referent Type must be >1927. | Cannot be more than 20 years in the future or later than EndDate.<br>All records must be >1877. If longer than 40 minutes and OriginalLanguage has mode Audio, must be >= 1927-10-06. | Conditional: If parent's DateRequired is true, the full date must be specified.<br>All records must be >1877. If longer than 40 minutes and OriginalLanguage has mode Audio, must be >= 1927-10-06.<br>Conditional: SequenceNumbers of sibling seasons must be in date order.<br>Cannot be more than 20 years in the future or later than its EndDate. Unless SeasonClass Recut, cannot be outside the time period defined by the Release and EndDate of its parent Series. | Must be specified.<br>All records must be >1877. If longer than 40 minutes and OriginalLanguage has mode Audio, must be >= 1927-10-06.<br>TV Referent Type must be >1927.<br>Conditional: If parent's DateRequired is true, the full date must be specified.<br>Cannot be more than 20 years in the future. Unless EpisodeClass Pilot or Special, cannot be outside the time period defined by the Release and EndDate of its parent. | All records must be >1877. If longer than 40 minutes and OriginalLanguage has mode Audio, must be >= 1927-10-06. Inherited from nearest ancestor if not specified.<br>Must be at least the ReleaseDate of the parent. | Must be specified.<br>Cannot be more than 20 years in the future.<br>All records must be >1877. If longer than 40 minutes and OriginalLanguage has mode Audio, must be >= 1927-10-06. TV Referent Type must be >1927.<br>Must be at least the ReleaseDate of the parent. |
| **Country of Origin** | Must not duplicate another value. | | | | | |

| Field | Basic | Series | Season | Episode | Manifestation | Edit |
|---|---|---|---|---|---|---|
| **Approximate Length** | Cannot be zero.<br><br>Short cannot be more than 1 hour.<br>Movie must be more than 30 minutes. | Enforced by schema. | Enforced by schema. | Inherited from nearest ancestor if not specified. Cannot be zero.<br><br>Short cannot be more than 1 hour.<br>Movie must be more than 30 minutes. | Inherited from nearest ancestor if not specified. Cannot be zero. | Must be specified. Cannot be zero unless ReferentType is Interactive Material. |
| **Alternate ID** | The same record cannot have an identical ID twice. Cannot be empty or zero. | | | | | |
| **Registrant** | Must match the Party ID used in Authorization. | | | | | |
| | | | | | | |

Base Object Metadata by Creation Type (continued):

| Field | Clip | Compilation | Composite |
|---|---|---|---|
| **Referent Type** | Inherited from nearest ancestor if not specified.<br>If specified, it must be one of TV, Movie, Short, Web, Supplemental | Fixed: Compilation | Fixed: One of TV, Movie, Short, Web, Supplemental. |
| **Structural Type** | Fixed: Performance | Fixed: Abstraction, Performance, or Digital | Enforced by schema. |

| Field | Clip | Compilation | Composite |
|---|---|---|---|
| **Mode** | | If AudioVisual, ReleaseDate must be after 1893; if Visual, "mode" attribute of OriginalLanguage or VersionLanguage must not be Audio | |
| **Resource Name** | Inherited from nearest ancestor if not specified. | Inherited from nearest ancestor if not specified. | Must not be empty. |
| **Original Language** | Must be absent. | Enforced by schema. | Enforced by schema. |
| **Version Language** | Enforced by schema. | Must be absent. | Must be absent. |
| **Associated Org** | Must not duplicate both Display Name and role.<br>If organizationID is provided, idType must also be provided.<br>If no organizationID or idType is ISNI, DisplayName is required.<br>If idType is EIDRPartyID, org must be a valid EIDR Party ID with the AssociatedOrg role. | | |

| Field | Clip | Compilation | Composite |
|---|---|---|---|
| **Release Date** | Inherited from nearest ancestor if not specified.<br>All records must be >1877. If longer than 40 minutes and OriginalLanguage has mode Audio, must be >= 1927-10-06. TV Referent Type must be >1927.<br><br>Must be at least the ReleaseDate of the parent. | All records must be >1877. If longer than 40 minutes and OriginalLanguage has mode Audio, must be >= 1927-10-06. | All records must be >1877. If longer than 40 minutes and OriginalLanguage has mode Audio, must be >= 1927-10-06. TV Referent Type must be >1927. |
| **Approximate Length** | Must be specified. Cannot be zero. | Enforced by schema. | Must be specified. Cannot be zero. |
| **Alternate ID** | The same record cannot have an identical ID twice. | | |
| **Registrant** | Must match the Party ID used in Authorization. | | |
| | | | |

## EXTRA OBJECT METADATA BY CREATION TYPE:

Note that a Series must include at least one its Extra Object Metadata fields.

| Field | Season | Episode | Edit | Manifestation | Clip | Compilation | Composite |
|---|---|---|---|---|---|---|---|

| Field | Season | Episode | Edit | Manifestation | Clip | Compilation | Composite |
|---|---|---|---|---|---|---|---|
| **Sequence Number** | Conditional: If parent's NumberRequired is true, must be specified.<br>Cannot duplicate another Sequence Number and Season Class among the parent's Seasons.* | | | | | | |
| **Distribution Number** | | Unless EpisodeClass Pilot or Special, must not be 0.<br><br>Conditional: If parent's NumberRequired is true, must be specified.<br>Cannot duplicate another number and domain among the parent's Episodes.* | | | | | |

| Field | Season | Episode | Edit | Manifestation | Clip | Compilation | Composite |
|---|---|---|---|---|---|---|---|
| **House Number** | | Cannot duplicate another House number and domain among the parent's Episodes. | | | | | |
| | | | | | | | |
| **EndDate** | Must be later than the asset's ReleaseDate. Unless SeasonClass Recut, cannot be outside the time period defined by the Release and EndDate of its parent Series. | | | | | | |
| | | | | | | | |
| **ExternalTrackReference ID** | | | | If specified, must be a content ID that has isManifestationOf as one of its relationships.<br>Status should not be "in development" when source is "valid". | | | |

| Field | Season | Episode | Edit | Manifestation | Clip | Compilation | Composite |
|---|---|---|---|---|---|---|---|
| **Edit Class** | | | Must be unique across the supplied multiples. | | | | |
| **Made For Region** | | | Must be unique across the supplied multiples. | | | | |
| **Track/Language** | | | | Each Version Language must be distinct. The "type" and "mode" attributes are taken into account. | | | |
| **Track/Hash** | | | | Only one Hash of a particular type in a record that contains hashes (i.e., if more than one Hash is present, each one must have a different has method.) | | | |

| Field | Season | Episode | Edit | Manifestation | Clip | Compilation | Composite |
|---|---|---|---|---|---|---|---|
| **CodecType** | | | | Only a single CodecType element is allowed per namespace. That is, if more than one is present, they must be from different namespaces. | | | |
| **Entry/ ContentID** | | | | | | All non-Compilation Entries for EIDR records must share the same Structural Type.<br>Every ContentID in a Compilation must be unique.<br>Status should not be “in development” when source is “valid”.<br>If no Entry, the Compilation must specify hasOtherInclusions="true" | |

| Field | Season | Episode | Edit | Manifestation | Clip | Compilation | Composite |
|---|---|---|---|---|---|---|---|
| **Composite Element** | | | | | | | Every Element in a Composite must be different. For example, if two elements use the same ID, they must have different start/duration or ComponentsMode. |
| **Composite Element ID** | | | | | | | Must be a non-aliased ID.<br>Status should not be "in development" when source is "valid". |

## GRAPH COMPATIBILITY OF PARENT BY CHILD CREATE TYPE:

| Parent Field | Season | Episode | Manifestation | Edit | Clip |
|---|---|---|---|---|---|
| **Referent Type** | Series | Series or Season | | One of TV, Movie, Short, Web, Supplemental. | One of TV, Movie, Short, Web, Supplemental. |

| Parent Field | Season | Episode | Manifestation | Edit | Clip |
|---|---|---|---|---|---|
| **Structural Type** | | | Unless the Manifestation specifies its own StructuralType, must be one of Performance, Digital, Physical. | | One of Performance, Digital, Physical. |
| **Status** | Cannot be in development, if Child status is valid. | Cannot be in development, if Child status is valid. | Cannot be in development, if Child status is valid. | Cannot be in development, if Child status is valid. | Cannot be in development, if Child status is valid. |
| **Extra Object Metadata Relationships** | | | | Parent must not have this relationship with any object: isManifestation. | Parent must not have this relationship with any object: isManifestation. |

## MODIFY VALIDATION

Note that the following fields cannot be modified for any content record:

- ID (this is a system-defined field)
- Status (use the Promote API to change this field)
- Registrant.

For Series and Seasons, the following additional rules apply:

| Field | Series | Season |
|---|---|---|
| **Referent Type** | Cannot be modified (must remain Series) | Cannot be modified (must remain Season) |
| **NumberRequired** | Conditional: if set to true, all children must specify SequenceNumber (if Season) or DistributionNumber (if Episode). | Conditional: if set to true, all children must specify DistributionNumber. |
| **DateRequired** | Conditional: if set to true, all children must specify the full ReleaseDate. | Conditional: if set to true, all children must specify the full ReleaseDate. |
| **OriginalTitleRequired** | Conditional: if set to true, all children must define a Resource Name. | Conditional: if set to true, all children must define a Resource Name. |

The graph compatibility is that the defining relationship for child objects cannot be changed (including removed) using the Modify API. This applies to: Season (isSeasonOf), Episode (isEpisodeOf), Edit (isEditOf), Clip (isClipOf), Composite (isCompositeOf), Manifestation (isManifestationOf).

## RELATIONSHIP API VALIDATION

Add Relationship API by Creation Type:

| Field | Composite | Alternate Content Info | Packaging Info | Promotion Info | Supplement Content Info |
|---|---|---|---|---|---|
| **ID** | Must be a non-aliased ID.<br>Status should not be “in development” when source is “valid”. | | | | |
| **Referent Type** | Fixed: One of TV, Movie, Short, Supplemental, Web. | Fixed: One of TV, Movie, Short, Supplemental, Web, Interactive Material | | Fixed: One of TV, Movie, Short, Supplemental, Web, Interactive Material, Series, Season | Fixed: One of TV, Movie, Short, Web, Supplemental, Interactive Material |
| **Parent:** | | | | | |
| **ID (target)** | The Composite Element ID must be a non-aliased ID. | Must be a non-aliased ID. | Must be a non-aliased ID. | Must be a non-aliased ID. | Must be a non-aliased ID. |
| **Graph compatibility** | The target must not be the same as ID.<br>The object, if at all, has only these pre-existing relationships: isEpisode, isPromotion, isSupplement, isAlternate, isPackaging. | The target must not be the same as ID.<br>The ID must not already have the same relationship with the target of the same relationship Class. | The target must not be the same as ID.<br>The ID must not already have the same relationship with the target of the same relationship Class. | The target must not be the same as ID.<br>The ID must not already have the same relationship with the target of the same relationship Class. | The target must not be the same as ID.<br>The ID must not already have the same relationship with the target of the same relationship Class. |

Remove Relationship API by Creation Type:

| Field | Composite | Alternate Content Info | Packaging Info | Promotion Info | Supplement Content Info |
|---|---|---|---|---|---|
| **ID** | | | | | |
| **ID (target)** | Must be absent. | Conditional: If specified, must be the target of isAlternate relationship. | Conditional: If specified, must be the target of isPackaging relationship. | Conditional: If specified, must be the target of isPromotion relationship | Conditional: If specified, must be the target of isSupplement relationship. |
| **Graph compatibility** | The ID must already have this relationship with the target. | The ID must already have this relationship with the target. | The ID must already have this relationship with the target. | The ID must already have this relationship with the target. | The ID must already have this relationship with the target. |

For the Replace Relationship API, the rules from both Remove Relationship and Add Relationship apply.

## PROMOTE API VALIDATION

Promote API rules:

| Field | Rule |
|---|---|
| **ID** | Must be a non-aliased ID. |
| **Status** | Fixed: in development. |
| **Graph compatibility** | Parent's Status, if any, must not be in development. |

## ALIAS & DELETE API VALIDATION

### ALIAS API RULES:

| Field | Rule |
|---|---|
| **ID** | Must be a non-aliased ID. |
| **ID (target)** | Must be a non-aliased ID. |
| **Status** | Fixed: valid or in development. |
| **Graph compatibility** | Must not be the target of relationships: isSeason, isEpisode, isEdit, isClip, isCompilation, isComposite, isManifestation, isPromotion, isSupplement, isAlternate, isPackaging.<br>Must not be the target of a Compilation ContentID, a Composite Element ID, or Manifestation ExternalTrackReference.<br>If the Referent Type of the source record is Series or Season, the target record must not have any of these relationships: isEpisode, isEdit, isClip, isCompilation, isComposite. isManifestation.<br>The target must not be part of a chain of aliases, where the length of the chain starting from target is greater than 5.<br>The source must not be part of the chain. |

### DELETE API RULES:

| Field | Rule |
|---|---|
| **ID** | Must be a non-aliased ID. |
| **Status** | Fixed: valid or in development. |
| **Graph compatibility** | Must not be the target of relationships: isSeason, isEpisode, isEdit, isClip, isCompilation, isComposite, isManifestation, isPromotion, isSupplement, isAlternate, isPackaging.<br>Must not be the target of a Compilation ContentID, a Composite Element ID, or Manifestation ExternalTrackReference. |