IPTC XML Schema Style Book – WORK DOCUMENT r2

Document history				[Document URN: urn:iptc:workdoc:sta:0408:2]
Revision	Issue Date	Pages	Author (revised by)	Remark
1	2004-11-12	3	Michael Steidl	Initial work document, based on postings to the Yahoo group.
2	2004-12-10	3	Michael Steidl	Update reflecting the discussion - changes to: 1.1, 3.3 - added: 3.5, 5.2

The "XML Schema Style" Working Group of the Standards Committee aims to define a common style for the development and maintenance of IPTC governed XML Schemas. The work comprised style regarding documentation, versioning and the notation, further guidelines for IPTC specific XML element types and about building specifications from modules.

Comment on this WORK DOCUMENT:
- This document is intended to reflect the ongoing discussion of XML Schema style issues at the IPTC. After having achieved agreement at the level of this ad-hoc working groups as represented by the members of the "iptc-xmlschema-style" Yahoo group this document will be forwarded as draft to the IPTC Standards Committee seeking final endorsement.
- Outline/structure:
  As this document is intended as reference for discussions all items are numbered – even currently "empty" items. This allows referring to these items in comments.
- Typographical conventions:
  Comments of the editor of this document relating to the discussion of specific styles are in orange.

1   Documentation in the specification file

1.1   Documentation notation

Documentation will be added by employing xs:annotation and xs:documentation elements of the XML Schema specification.
OPEN: text markup in the xs:documentation elements ??
(r2) OPEN: any additional style which might be required for a certain documentation system. We would have to decide for a specific system first – and consider all the implications doing this.

2   Versioning of specification particles

Versioning information is added to each XML element specified in an XML Schema. This versioning information comprises:
- Number of the version of the related IPTC standard this element was introduced first
- Number of the version of the related IPTC standard this element was changed (introduction has to be considered as a change)
- Number of the version of the related IPTC standard this element was deprecated.
- a comment on the reason for the change or deprecation
- an optional "by-line"
This set of information takes this XML format:

```
<iptcxss:versioninfo firstversion="1" changedversion="2"
deprecatedversion="0" by="Johan Lindgren" comment="Changed the type"/>
```

IPTC XML Schema Support Namespace URI:
"iptcxss" = urn:iptc:std:iptcxmlschemasupport:1:xmlns

OPEN: consider modules that can be included by several IPTC standards: break down version numbering to modules? Refers to IPTC standardisation process: approval of modules?

3   Notation style of XML elements and attributes

"To CamelBack or not to camelback."

3.1   XML namespace prefixes

Style rule 1: should be short, not more than ?? characters
Style rule 2: all lowercase, no camel back.
Examples, nml, iptc4xmpcore

3.2   XML element names

Style rule 1: could be built from concatenated words/terms
Style rule 2: lower camel case, uppercase for the first characters of words
Examples: myElement, firstCreatedDateTime

3.3   XML attribute names and attribute groups

Style rule 1: could be built from concatenated words/terms
~~Style rule 2: upper camel case, uppercase for the first characters of words~~ (r2)
Style rule 2: all lower case
Examples: MyAttribute, FormalName

3.4   Common styles

Subsections of names:
No punctuation characters like "-" or "."

3.5   Namespace prefixes for XML Schema elements

a) IPTC uses namespace prefix for XML Schema elements
b) IPTC uses the "xs" namespace prefix for XML Schema elements

4   IPTC XML Schema file

Beyond the declarations required to produce valid XML Schema notation these comments (see 1.1 for details) have to be included:
- copyright notice for the IPTC: "© YEAR IPTC, all rights reserved"
- current contact information for the IPTC
- name and version of the standard, or module
- a document URN for this XML Schema file
- trademark notice, depending on standard
- a notice regarding the requirement implementers of this standard have to comply with this specification

5 Specific XML element types

This section provides guidelines for adopting certain element types for IPTC XML Schemas.

5.1 Dates and Times

OPTION A
Use the standard XML Schema type.
Don't expect validation of values at the XML Schema level

OPTION B
Use the IPTC date-time type "iptcDateTime"
This type provides format and value validation at the XML Schema level.

5.2 Dates (only)

The date of a day without a time section.
(Format issues are the same as in 5.1)

6 Modules

This section provides guidelines on modules for IPTC XML Schemas and how to build a full IPTC standard's spec XML Schema from modules.

6.1 Concepts

Modules are portions of XML Schema declarations that can be included into a comprehensive standard specification by the XML Schema "include" declaration.

Modules can be defined
- to specify XML elements not only pertaining to a single IPTC standards
- to specify value constraints to certain XML elements and thus can be considered as externally updateable controlled vocabulary to an element.

6.2 Formal outline of an "element-module"

6.3 Formal outline of a "value-constraint-module"

7 Controlled vocabularies

This section provides guidelines how to express controlled vocabularies in XML Schema.

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