Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB <sup>1</sup>	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	Office Open XML Overview	-	ge	The document is not listed as part of the ECMA 376 standard in the foreword to Part I (Fundamentals) and its status (normative? Informative?) is not explicitly stated	Clarify the status of the overview document. If it is merely a promotional whitepaper about ECMA 376, it has no place in the public standard.	
	OfficeOpenX ML- DrawingMLG eometries.zi p	-	ge	There is no explicit indication given as to whether this annex is informative or normative. See ISO Directives, Part 2, section 5.2.6	Clarify the status of this annex	
	OfficeOpenX ML- DrawingMLG eometries.zi p	-	ge	This annex was not provided in a humanly- readable format as required by JTC1 Directives 8.3.5 and Annex H	The annex should be provided in a humanly readable, lined-numbered format so it can be referenced and cited. Additionally, an electronic machine readable version can be provided according to Annex H	
	OfficeOpenX ML- RELAXNG.zi p	-	ge	There is no explicit indication given as to whether this annex is informative or normative. See ISO Directives, Part 2, section 5.2.6	Clarify the status of this annex	
	OfficeOpenX ML- RELAXNG.zi p	-	ge	This annex was not provided in a humanly- readable format as required by JTC1 Directives 8.3.5 and Annex H	The annex should be provided in a humanly readable, lined-numbered format so it can be referenced and cited. Additionally, an electronic machine readable version can be provided according to Annex H	
	OfficeOpenX ML- Spreadsheet MLStyles.zip	-	ge	There is no explicit indication given as to whether this annex is informative or normative. See ISO Directives, Part 2, section 5.2.6	Clarify the status of this annex	
	OfficeOpenX ML- Spreadsheet MLStyles.zip	-	ge	This annex was not provided in a humanly- readable format as required by JTC1 Directives 8.3.5 and Annex H	The annex should be provided in a humanly readable, lined-numbered format so it can be referenced and cited. Additionally, an electronic machine readable version can be provided according to Annex H	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

2 Type of comment: ge = general te = technical ed = editorial

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB1	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	OfficeOpenX ML- XMLSchema. zip	-	ge	There is no explicit indication given as to whether this annex is informative or normative. See ISO Directives, Part 2, section 5.2.6	Clarify the status of this annex	
	OfficeOpenX ML- XMLSchema. zip	-	ge	This annex was not provided in a humanly- readable format as required by JTC1 Directives 8.3.5 and Annex H	The annex should be provided in a humanly readable, lined-numbered format so it can be referenced and cited. Additionally, an electronic machine readable version can be provided according to Annex H	
	OpenPackag ingConventi ons- RELAXNG.zi p	-	ge	There is no explicit indication given as to whether this annex is informative or normative. See ISO Directives, Part 2, section 5.2.6	Clarify the status of this annex	
	OpenPackag ingConventi ons- RELAXNG.zi p	-	ge	This annex was not provided in a humanly- readable format as required by JTC1 Directives 8.3.5 and Annex H	The annex should be provided in a humanly readable, lined-numbered format so it can be referenced and cited. Additionally, an electronic machine readable version can be provided according to Annex H	
	OpenPackag ingConventi ons- XMLSchema. zip	-	ge	There is no explicit indication given as to whether this annex is informative or normative. See ISO Directives, Part 2, section 5.2.6	Clarify the status of this annex	
	OpenPackag ingConventi ons- XMLSchema. zip	-	ge	This annex was not provided in a humanly- readable format as required by JTC1 Directives 8.3.5 and Annex H	The annex should be provided in a humanly readable, lined-numbered format so it can be referenced and cited. Additionally, an electronic machine readable version can be provided according to Annex H	
	Office Open XML Overview	§1, p. 1	ge	It is not the purpose of an open standard to establish backward compatibility to particular versions of particular products of particular	Remove any references to pre-existing products that don't implement this standard.	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

2 Type of comment: ge = general te = technical ed = editorial

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB <sup>1</sup>	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
				vendors. Therefor, the standard should not aim at being compatible with any documents, spreadsheets or presentations created by products of the Microsoft corporation. While particular products implementing the standart might have place for backward compatibility, a standard should not.		
	Part 1, Appendix	-	te	The specification references a zip format specification but does not provide a version or date to identify the specific zip format specification which is referenced.	References should be made to a particular dated and labeled version.	
	Part 1, Forward	line 2	ed	DIS 29500 is a multi-part document, not a multi- part Standard, i.e., the individual parts of this Standard are not themselves standards.	Correct the terminology to correctly reflect the status of DIS 29500.	
	Part 1, Section 8.6.2	§8.6.2	te	The specification discourages the use of VML in implementations in favor of DrawingML. However, Part 3 §2.3.1 explicitly states that "All background information in a WordprocessingML document is stored in VML syntax"	Clarify this contradiction	
	Part 1, Section 10.1.2	line 20	te	This part of the specification references Part 5, Clause 12. Although a clause for that number does exist, it does not contain the material 10.1.2 refers to. Additionally, the referenced clause is not normative.	Correct the reference to point to the correct clause	
	Part 1, Section 11.3.1	lines 15 – 17	te	This is requiring that a conforming OOXML consumer also be able to understand a specified list of other document formats, including proprietary ones such as MHTML and RTF, and for conforming producers to understand how to convert these formats to OOXML.	Change lines 3-5 to read, "An alternative format import part allows content specified in an application-defined alternate format to be embedded directly in a WordprocessingML document"	
	Part 1, Section 12.3.5	-	te	This part of the specification defines a binary part which is to be used for the storage of arbitrary user-defined data. However, the action the user	Fully define the custom property part	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

2 Type of comment: ge = general te = technical ed = editorial

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB <sup>1</sup>	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
				would perform to use this data is undefined. Thus, interoperability on this feature is not possible.		
	Part 1, Section 15.2.12	-	te	The specification references a TrueType specification but does not provide a version or date to identify the specific TrueType or OpenType specification which is referenced. Also, in case of a difference between TrueType and OpenType, there ought to be different ways to refer to them, rather than just calling them both "application/x-font-ttf"	References should be made to a particular dated and labeled version. Both TrueType and OpenType should be referenced.	
	Part 1, Section 15.2.14	-	te	The DEVMODE structure, referred to in this section, is specific to the Microsoft Windows operating system. This makes it harder to implement the saving and restoring of printer settings on Non-Microsoft operating systems. Also, the specification proposes a memory dump written to disk here, which is a major security concern.	Microsoft provides a specification for expressing printer settings in XML: PrintTicket markup. According to the specification, "The PrintTicket is XML that provides print settings in a consistent, accessible, and extensible manner." This is preferable to binary storage in an XML based open format.	
	Part 1, Section 15.2.15	-	te	For there to be interoperability of this feature, it must either specify what size the thumbnail should be or state that the application will scale the image as needed.	Clarify what size the thumbnails should be, or that the images are scaled.	
	Part 1, Section 15.2.6	-	te	The definition "This part shall have no contents" is ambiguous. Shall there be an empty zip file with the declared name? Or rather a zero-byte file? Or something else?	Clarify the meaning.	
	Part 1, Section 15.2.8	-	ed	The examples given are rendered useless by the predominance of the VML in the markup.	Make a more succinct and clear example by concentrating on the control persistence.	
	Part 1, Section 2.1 "Goal"	-	ge	There are no normative statements in this clause, though Section 2 is indicated to be normative	Mark clause as informative using one of the mechanisms of Section 7	
	Part 1,	-	ge	There are no normative statements in this clause,	Mark clause as informative using one of the	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB1	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	Section 2.2 "Issues"			though Section 2 is indicated to be normative	mechanisms of Section 7	
	Part 1, Section 2.3	line 14	ed	Are additional syntactic constraints only normative when the cannot be feasibly expressed in the schema language? Who judges this? The use of the word "whenever" is ambiguous. Is this a condition under which such statements are normative or an explanation of why such statements exist?	What may be meant is that the additional syntactic constraints are normative, period. Clarify this sentence, perhaps by omitting the editorial explanation about why such additional constraints are not in the schema.	
	Part 1, Section 2.3	line 16	ed	The use of the word "element" is ambiguous. Is this to mean XML elements (but not attributes, character content, etc.)? Or does this mean an element of the Standard, in the usage of ISO Directives, Part 2?	Clarify the use of the word "element" perhaps by saying "XML element" if that is what is meant.	
	Part 1, Section 2.4	line 22	te	This line refers to an "Unicode standard" without specifying a version. XML 1.0 specifies Unicode 2.0, while the informative appendix A ISO XML Part 1 lists Unicode 4.0. Which one is it?	References should be made to a particular dated and labeled version.	
	Part 1, Section 2.6	-	ed	The use of the word "element" is ambiguous. Is this to mean XML elements (but not attributes, character content, etc.)? Or does this mean an element of the Standard, in the usage of ISO Directives, Part 2?	Clarify the use of the word "element" perhaps by saying "XML element" if that is what is meant.	
	Part 1, Section 2.6	line 15	ed	Obviously the Standard anticipates such behavior since it explicitly contains the present example describing this behavior and calls it conforming.	Perhaps it is meant to say, "this Standard does not recommend this behavior".	
	Part 1, Section 2.6	lines 33-34	ed	Is this recommending that a non-public, internal- only, work-for-hire application author create "publicly available documentation" on what subset of the standard it supports? The business relationship between the software author and his customer should not be a concern of this standard.	Change to read, "a software application should be accompanied by documentation"	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**ge** = general **te** = technical **ed** = editorial

**NOTE** Columns 1, 2, 4, 5 are compulsory.

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB <sup>1</sup>	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	Part 1, Section 4 "Definitions"	behavior, implement ation- defined	te	"application-specific", at least in common standards use, is not the same as application- defined, viz. ANSI C Programming Language	Use "application-defined" consistently where the intent is for applications to document their behavior.	
	Part 1, Section 4 "Definitions"	behavior, unspecified	ed	This definition doesn't work, since the Standard, in defining compliance in Section 2, says that "compliance is purely syntactic". So no behaviors are required. Therefore, by this definition, all behaviors are unspecified? Surely this is not what is meant.	Clarify this definition. Perhaps it is meant to say, "Behavior for which this Standard does not make a recommendation"?	
	Part 1, Section 4 "Definitions"	Office Open XML Document	ed	This definition doesn't hold together. Are these two different definitions? Or two clause of which either will define the term? Or both together define the term?	Clarify the definition	
	Part 1, Section 9.1.1	-	te	ASCII requires a normal reference since there are several national variations.	It is suggested that ISO/IEC 646:1983 or ANSI X3.4-1986 be referred to.	
	Part 1, Section 9.1.5	-	te	This sub clause negates a provision of the more detailed OPC specification in Part 2, but will most likely escape the implementors since it is placed in the introductory material.	If interleaving is not permitted, this sub clause should be placed in Part 2 instead of a description of interleaving.	
	Part 1, Section 9.1.7	line 10	ed	The naming convention giving is incorrect. H is a hexadecimal digit, not a hexadecimal value.	Follow correct usage pattern as established earlier in 9.1.1.	
	Part 1, Section 9.1.9	line 25	ed	Incorrect subject. A producer qua producer does not round trip.	Should say, "Conforming producers that are also consumers should"	
	Part 1, Section 9.2	page 18, line 8	ed	Extra period following "explicit."	Remove extraneous punctuation.	
	Part 2	-	ge	Part 2 defines Open Packaging Conventions (OPC) in terms that, according to Part 1, Section 9.1	Part 2 should be amended either by: a) referencing an established standard (in	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB1	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
				Constraints on Office Open XML's Use of OPC, are more general than needed for the purpose of OOXML. This is due to bring confusion, and should be resolved.	which case placing documented constraints upon its use in OOXML would be fine), or else b) tightening Part 2 contents so as to keep it focused on OOXML related matters, or else c) submit OPC as a separate packaging-focused standard and, provided that it is accepted as a standard, apply option a) to it.	
	Part 2, Section 1. Scope	page 1, line 9	ed	The 'well-defined naming guidelines' expression is an oxymoron in the context of a standard. This is reinforced in the case of OOXML proposal by the fact that 'guidance' parts of the text are explicitly meant to be informative only (as opposed to normative).	Replace 'guidelines' with 'rules'.	
	Part 2, Section 3. Definitions	page 4, line 20	te	This definition of 'package model' is not compatible with the prior definition given in Part 2, Section 1. Scope, page 1, line 5.	Define 'package model' in unambiguous terms and use the resulting definition consistently throughout the OOXML text.	
	Part 4, Foreword	page vi, line 2	ed	DIS 29500 is a multi-part document, not a multi- part Standard, i.e., the individual parts of this Standard are not themselves standards.	Correct the terminology to correctly reflect the status of DIS 29500.	
	Part 4, Foreword	page vi, line 9	ed	Explicitly references annexes that are not provided in a humanly-readable format, whereas a human- readable format is required by JTC1 Directives 8.3.5 and Annex H	Annexes should be provided in a humanly readable, lined-numbered format so it can be referenced and cited. The reference to electronic form only annexes should be removed.	
	Part 4, Introduction	page vii, line 7	te	Full compatibility of the proposed OOXML with any existing application is demonstrably unreachable (because the proposed OOXML explicitly gives up describing parts of what it aims to describe, e.g. Part 4 page 1378 lines 12-17).	Rephrase the compatibility goal so as to make it realistic.	
	Part 4, Introduction	page vii, line 8	te	An XML markup cannot be "fully compatible" with an "investment"	Remove the phrase from the introduction	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

2 Type of comment: ge = general te = technical ed = editorial

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB1	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	Part 4, Section 1. Part Overview	page 1	ed	The use of 'Part' for different things is confusing. Line 1 (title) it refers to Part 4 as a subpart of OOXML. Line 3 it implicitly refers to WordprocessingML, SpreadsheetML, etc.	Use another word like 'subpart' when referencing WordprocessingML etc., or else use their full names.	
	Part 4, Section 1.1 Wordprocess ingML Part Summary	page 1, line 5	ed	Table row 'Alternative Format Import' is deemed to have no root element and no reference. The value of this row is unclear.	Clarify the table purpose.	
	Part 4, Section 1.2 Spreadsheet ML Part Summary	page 1, line 6	ed	Table row 'Custom Property' is deemed to have no root element and no reference. The value of this row is unclear.	Clarify the table purpose.	
	Part 4, Section 1.5 Shared Part Summary	page 3, line 1	ed	Eleven table rows are deemed to have no root element and no reference. The value of these rows is unclear.	Clarify the table purpose.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: image can be positioned absolutely within a frame	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: an option to rotate the text by 90 or 270 degrees.	Include this feature in WordProcessingML in order to improve interoperability.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: any number of rows can be selected for repeating Heading	Include this feature in WordProcessingML in order to improve interoperability.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks	Include this feature in WordProcessingML in order to improve interoperability.	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**ge** = general **te** = technical **ed** = editorial

**NOTE** Columns 1, 2, 4, 5 are compulsory.

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB <sup>1</sup>	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
				the following feature: allow 8192 table columns rather than OOXML's 63		
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: Background Image in Tables background image can be defined for an entire table, a row or an individual cell. This image is automatically resized when modifying the table.	Include this feature in WordProcessingML in order to improve interoperability.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: Contents in a multi-column section can be evenly distributed resulting in balanced columns	Include this feature in WordProcessingML in order to improve interoperability.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: ability to set arbitrary Text background color	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: Before/After text around foot notes references	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: Copy Heading while splitting Table	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: Table Shadowing Style	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: vertical numbering in list items	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**te** = technical **ed** = editorial

**NOTE** Columns 1, 2, 4, 5 are compulsory.

2 Type of comment:

**ge** = general

Date:

Document:

1	2	(3)	4	5	(6)	(7)
ΜB <sup>1</sup>	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: 'Leading' line spacing in a paragraph	Include this feature in WordProcessingML in order to improve interoperability.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: a 'May Break Between Rows' attribute so as not to split a table	Include this feature in WordProcessingML in order to improve interoperability.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: an option to specify "Numbers of lines" for widow or orphans lines	Include this feature in WordProcessingML in order to improve interoperability.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: 'Manual' and 'From left' alignment in tables	Include this feature in WordProcessingML in order to improve interoperability.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: Last line alignment in justified paragraph (provision that we can change the last line of the paragraph as Left, Center and Justify)	Include this feature in WordProcessingML in order to improve interoperability.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: allow entire sections to be marked as hidden	Include this feature in WordProcessingML in order to improve interoperability.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: Tabs fill character of a paragraph	Include this feature in WordProcessingML in order to improve interoperability.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks	Include this feature in WordProcessingML in order to improve interoperability.	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**ge** = general **te** = technical **ed** = editorial

**NOTE** Columns 1, 2, 4, 5 are compulsory.

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB <sup>1</sup>	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
				the following feature: 'Title' and 'lowercase' style options		
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: table can have 'keep with next paragraph' set	Include this feature in WordProcessingML in order to improve interoperability.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: ability to set each image border with different properties	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: font weights beyond just 'normal' and 'bold'.	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: Table of content protection against manual changes	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: Background opacity	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: 'auto' option when application decide if a page break should be	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: shadow distance, and a color of shadow other than black	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks	Include this feature in WordProcessingML in order to improve interoperability.	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**ge** = general **te** = technical **ed** = editorial

**NOTE** Columns 1, 2, 4, 5 are compulsory.

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB1	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
				the following feature: Table cell protection		
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: Text blinking	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: Column separator attributes : width, color, height, vertical-align.	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: text-box can define the vertical alignment of text (top, center, bottom)	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: Notes embedded in text- boxes	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: ability to assign different page colors throughout the document	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: Columns for frames/text- boxes	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2	-	te	It is desired to have improved interoperability between ODF and OOXML. However, OOXML lacks the following feature: Keep ratio feature for frames	Include support for this feature from ISO ODF in order to improve interoperability between the two formats.	
	Part 4, Section 2.15.1.28	-	te	This section specifies that document protection "shall be enforced", meaning that it is obligatory. However, it then goes on to state that the protection "may be ignored".	Clarify this contradiction	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**te** = technical **ed** = editorial

**NOTE** Columns 1, 2, 4, 5 are compulsory.

2 Type of comment:

**ge** = general

Date:

Document:

1	2	(3)	4	5	(6)	(7)
ΜB <sup>1</sup>	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	Part 4, Section 2.15.1.28	-	te	This section specifies a known weak hash algorithm to be used in OOXML documents. If a hashing algorithm is supposed to be used, it should be a state of the art algorithm, such as SHA2.	Use a standard, FIPS-180 compliant hash algorithm as the default. Legacy algorithms could be supported as extensions.	
	Part 4, Section 2.15.1.28	line 13	te	The encoding for the password is not specified. It is most likely supposed to be a Unicode encoding, but in what format? UTF-8? UTF-16? Big or little endian? Since the specified algorithm operates on a byte level, endianness of the input data does matter and must be specified.	The encoding and byte ordering should be made explicit for both entering the password and calculating the hash (Since those steps could actually take place on machines with a different byte order).	
	Part 4, Section 2.15.1.28	line 15	te	What if the entered password is shorter than 15 characters? Do we truncate to the actual length? Or fill with 0 bytes? Or something else?	Clarify this processing step.	
	Part 4, Section 2.15.1.28	page 1159, lines 6 – 9	te	The operations specified in the hashing algorithm are dependent on the machine's byte order (especially the left and right shift). It also matters whether the values are treated as signed or unsigned.	Describe the algorithm with references to byte order and signedness, in order to make it platform independent	
	Part 4, Section 2.15.1.29	-	te	This element allows the classification of the document into one of three types: "letter", "email" or "general". Although the description says that this feature can be used by, "hosting applications to facilitate customized user interface and/or automatic formatting behaviors based on the 'type' of a given WordprocessingML document", the taxonomy provided is so weak as to be practically useless.	Either provide a reasonable document type taxonomy, or loosen the type to an xsd:string to allow applications to provide their own.	
	Part 4, Section 2.15.1.86	-	te	This style display filter is configured via bit masks rather than a set of boolean types. This makes XSLT processing impossible.	Redraft the sub clause to use boolean XML declarations rather than bit masks	
	Part 4,	-	te	This style display sorting algorithm is configured	Redraft the sub clause to use boolean XML	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB <sup>1</sup>	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	Section 2.15.1.87			via bit masks rather than a set of boolean types. This makes XSLT processing impossible.	declarations rather than bit masks	
	Part 4, Section 2.15.2.32	-	te	The definition of this feature ignores browsers other than the Internet Explorer. Since the specification requests that "all settings which are not compatible with the target web browser shall be disabled", it is impossible to use open formats such as SVG, MathML, PNG etc.	The concept of optimization for a single browser appears to be unsuitable in this form, as it only enables the writer of the Office application to force his choices upon the end user. The concept should be rethought and rephrased in an application and platform neutral way.	
	Part 4, Section 2.15.3	-	te	None of the specified compatibility settings solve a general problem. Thus, they are application specific and should use the extension mechanism.	Remove the compatibility settings from the standard.	
	Part 4, Section 2.15.3.26	-	te	The "footnoteLayoutLikeWW8" element is supposed to reproduce behavior of a prior version of Microsoft Word. However, there is no description of the specific behavior to be reproduced.	Define the intended behavior.	
	Part 4, Section 2.15.3.31	-	te	The "lineWrapLikeWord6" element is supposed to reproduce behavior of a prior version of Microsoft Word. However, there is no description of the specific behavior to be reproduced.	Define the intended behavior.	
	Part 4, Section 2.15.3.32	-	te	The "mwSmallCaps" element is supposed to reproduce behavior of a prior version of Microsoft Word. However, there is no description of the specific behavior to be reproduced.	Define the intended behavior.	
	Part 4, Section 2.15.3.41	-	te	The "shapeLayoutLikeWW8" element is supposed to reproduce behavior of a prior version of Microsoft Word. However, there is no description of the specific behavior to be reproduced.	Define the intended behavior.	
	Part 4, Section 2.15.3.51	-	te	The "suppressTopSpacingWP" element is supposed to reproduce behavior of a prior version of Microsoft Word. However, there is no description of the specific behavior to be reproduced.	Define the intended behavior.	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**ge** = general **te** = technical **ed** = editorial

**NOTE** Columns 1, 2, 4, 5 are compulsory.

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB <sup>1</sup>	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	Part 4, Section 2.15.3.54	-	te	The "uiCompat97To2003" element is supposed to "Disable UI functionality that is not compatible with Word 97-2003". What functionality shall be disabled on other products, such as OpenOffice.org?	Redefine the element in an application neutral way, or, if it is really specific to Microsoft Word, remove it from the standard.	
	Part 4, Section 2.15.3.54	-	te	The "truncateFontHeightsLikeWP6" element is supposed to reproduce behavior of a prior version of Microsoft Word. However, there is no description of the specific behavior to be reproduced.	Define the intended behavior.	
	Part 4, Section 2.15.3.6	-	te	The "autospaceLikeWord95" element is supposed to reproduce behavior of a prior version of Microsoft Word. However, there is no description of the specific behavior to be reproduced.	Define the intended behavior.	
	Part 4, Section 2.15.3.63	-	te	The "useWord2002TableStyleRules" element is supposed to reproduce behavior of a prior version of Microsoft Word. However, there is no description of the specific behavior to be reproduced.	Define the intended behavior.	
	Part 4, Section 2.15.3.64	-	te	The "useWord97LineBreakRules" element is supposed to reproduce behavior of a prior version of Microsoft Word. However, there is no description of the specific behavior to be reproduced.	Define the intended behavior.	
	Part 4, Section 2.15.3.65	-	te	The "wpJustification" element is supposed to reproduce behavior of a prior version of Microsoft Word. However, there is no description of the specific behavior to be reproduced.	Define the intended behavior.	
	Part 4, Section 2.15.3.66	-	te	The "wpSpaceWidth" element is supposed to reproduce behavior of a prior version of Microsoft Word. However, there is no description of the specific behavior to be reproduced.	Define the intended behavior.	
	Part 4, Section 2.16.4.3	page 1501	te	The definition for BATHTEXT references 'the given Thai format', which makes no sense in the context of that definition. What "given Thai format"?	Clarify the definition of "BATHTEXT"	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**ge** = general **te** = technical **ed** = editorial

**NOTE** Columns 1, 2, 4, 5 are compulsory.

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB <sup>1</sup>	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	Part 4, Section 2.16.5.33	-	te	The section does not define the naming rules of an image file. An URI might be possible, but the example uses a MS-DOS file path, which is not portable.	Define naming schemes for pictures.	
	Part 4, Section 2.16.5.33	-	te	The section does not define the different picture formats to be supported.	There should be at least a small set of interoperable image formats.	
	Part 4, Section 2.16.5.34	-	te	The section does not define the naming schemes of a document file. An URI might be possible, but the example uses a MSD-DOS file path, which is not portable.	Define naming schemes for documents.	
	Part 4, Section 2.16.5.34	-	te	The section does not define different document formats to be supported.	There should be at least a small set of interoperable formats.	
	Part 4, Section 2.16.5.34	-	te	The specification references an XSLT transformation to be applied to included documents using the \t flag, but does not provide a version or date to identify the specific zip format specification which is referenced.	References should be made to a particular dated and labeled version.	
	Part 4, Section 2.16.5.40	page 1543, line 12&13	te	The definition for "LISTNUM" is built upon the concepts of "current" or "specific" or "next series", which are not defined in this context (a backward search on "series" shades no light on this). Those concepts should be defined in the text, and their definition should either be copied or referenced in the context of the definition for "LISTNUM".	Expand or reference the definition for "series", and/or clarify the definition for "LISTNUM" by any appropriate means.	
	Part 4, Section 2.16.5.41	-	te	The section defines a MACROBUTTON field in order to run specific macros, but fails to provide a list of supported programming languages or APIs.	Describe this feature in a way which permits cross-platform and cross-application interoperability.	
	Part 4, Section	page 1512, lines 11-12	te	The text states that the TONUM field is deprecated. If so, it shouldn't be part of a new	Remove all references to TONUM from the OOXML specification.	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**ge** = general **te** = technical **ed** = editorial

**NOTE** Columns 1, 2, 4, 5 are compulsory.

Date:

Document:

1	2	(3)	4	5	(6)	(7)
ΜB <sup>1</sup>	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	2.16.5.5			standard.		
	Part 4, Section 2.16.5.77	-	te	The example that illustrates USERINITIALS section instead shows USERNAME.	Correct the example.	
	Part 4, Section 2.18.106	-	te	Length is said to be "exactly 1 character". This is inconsistent with the earlier language and the schema fragment given which defines it as being 1 octet long or two characters.	Clarify the definition. In particular note that xsd:hexBinary measure length in octets, not characters.	
	Part 4, Section 2.18.4	-	te	Instead of defining the diagrams that can be produced, this section shows example diagrams in a very poor image quality.	Provide full normative definitions for the diagram formats. If example diagrams should be included for informative purposes, they should appear in a scalable graphic format, such as SVG.	
	Part 4, Section 2.18.4	-	te	There is no definition of a mechanism to extend the set of art borders, and the provided art borders are very western oriented. There should be a way for an application to define more custom art borders in a regional flavor.	Provide an interface or extension mechanism for authors and application writers to specify their own art borders.	
	Part 4, Section 2.18.45	-	te	While the text specifies a length of "exactly 3 characters", the example shows 6.	Clarify the definition, keep in mind that xsd:hexBinary measures length in octets rather than characters.	
	Part 4, Section 2.18.51	-	te	The standard defines 255 new country codes, in violation of ISO 639-1. This means that the overhead of converting into a different format is increased, as a country code mapping table has to be used.	Drop the use of ST_LangCode in favor of ISO 639-1 codes.	
	Part 4, Section 2.18.51	line 22	ed	Double quotes used incorrectly, with two sets of close quotes.	XML examples should be given using straight quotes.	
	Part 4, Section	-	te	This type is defined as containing, "a two digit hexadecimal language code". It is further stated	Reconcile the description of the type with the enumerated values.	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB1	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	2.18.52			that, "This simple type's contents must have a length of exactly 2 characters". However, two hex digits can count up to 255 and the values enumerated in this clause go far beyond that.		
	Part 4, Section 2.18.57	-	te	The description of this type says it contains four hexadecimal digits, four hexadecimal octets and exactly four characters. These definitions are not compatible. A hexadecimal octet is two hexadecimal digits.	Clarify the definition. In particular note that xsd:hexBinary measure length in octets, not characters.	
	Part 4, Section 2.18.66	-	te	The described numeration format excludes support for other numerations which are in use today, such as Armenian, Tamil, Greek alphabetic, Ethiopic or Khmer.	Use a more flexible numeration approach, such as for example the xsl:number format in the W3C XSLT standard	
	Part 4, Section 2.18.66	-	te	The section does not normatively define anything except for some enumeration values, which are, however, not assigned any meaning.	References should be made to a particular dated and labeled version of a normative standard.	
	Part 4, Section 2.18.66	"chicago"	te	The section refers to the "Chicago Manual of Style", but no specific edition nor pages are referenced.	Either include the definition in the standard, or provide proper external references.	
	Part 4, Section 2.18.66	"decimalEn closedFulls top"	te	The example given does not show enclosed characters and so contradicts the normative text.	Reconcile the text and the example.	
	Part 4, Section 2.18.66	"decimalFu llwidth" etc.	te	This section refers to several single and multi byte Arabic numbering schemes. However, since the OOXML specification mandates UTF-8 or UTF-16 as an encoding, no other encodings should be mentioned.	Remove the references to other encodings.	
	Part 4, Section 2.18.66	"lowerLette r" etc.	te	There are several definitions of counting systems using the letters of the alphabet, but there is no mention of the desired behavior upon exhaustion of the letters of the alphabet.	Add explicit coverage of this case to the section.	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**ge** = general **te** = technical **ed** = editorial

**NOTE** Columns 1, 2, 4, 5 are compulsory.

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB <sup>1</sup>	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	Part 4, Section 2.18.66	"numberln Dash" etc.	te	This format makes use of a "dash" to surround the numbers, but makes no mention of the type of dash to be used: en-dash, em-dash, hyphen- minus, figure-dash, quotation-dash, etc.	Specify the intended dash explicitly.	
	Part 4, Section 2.18.72	-	te	The section refers to a "Panose-1 classification" of a font, but no such classification is provided, nor are any references given.	Provide proper normative external references for the classification.	
	Part 4, Section 2.18.72	-	te	Length is said to be "exactly 10 characters". This is inconsistent with the example given which has a length of 20 characters.	Clarify the definition. In particular note that xsd:hexBinary measure length in octets, not characters.	
	Part 4, Section 2.18.85	-	te	No definition of the fill pattern is provided. The illustrations are not sufficient to provide an adequate definition of required behavior.	Provide full normative definitions of these graphics.	
	Part 4, Section 2.18.86	-	te	The description of this type says it contains two hexadecimal digits, two hexadecimal octets and exactly two characters. These definitions are not compatible. A hexadecimal octet is two hexadecimal digits.	Clarify the definition. In particular note that xsd:hexBinary measure length in octets, not characters.	
	Part 4, Section 2.2 Main Document Story	page 26, lines 24&27	te	These lines define the contents of an OOXML document of type Wordprocessing in terms that are not compatible with the definition of OOXML documents given in Part 1, Section 4. Definitions, page 7, lines 1 to 3. Note that Section 2.2 as a whole is affected by that inconsistency.	Rewrite or remove Section 2.2. May consider explaining what a OOXML story would be in terms of documents renditions by applications.	
	Part 4, Section 2.2 Main Document Story	page 26, lines 27&28	te	The definition of 'story' is inappropriate. We shouldn't be defining a markup standard in application terms. We should be defining markup in markup terms. Where the user can type is immaterial.	Clarify the definition of 'story'.	
	Part 4, Section 2.2.1	page 28	te	The reference to the urn:schemas-microsoft- com:vml namespace references VML, which is considered as deprecated (Part 4, page 4343, lines	Remove all references to VML from the OOXML text, hence remove the reference to the urn:schemas-microsoft-com:vml	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**ge** = general **te** = technical **ed** = editorial

**NOTE** Columns 1, 2, 4, 5 are compulsory.

Date:

Document:

1	2	(3)	4	5	(6)	(7)
МВ <sup>1</sup>	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
				11&12). A new standard should not contain deprecated parts.	namespace here.	
	Part 4, Section 2.2.1	page 28	te	Child elements of background are described using deprecated features only. Accordingly, the background element should either be described in terms of current OOXML elements or deprecated.	Describe the background element in terms of non-deprecated elements or remove it.	
	Part 4, Section 2.2.1	page 28	te	The sentence "or auto to allow a consumer to automatically determine the background color as appropriate." does not define the appropriate behavior of the consumer, whereas the definition of the corresponding simple type, found in Part 4, page 1737, explicitly states that 'This value shall be used to specify an automatically determined color value, the meaning of which is interpreted based on the context of the parent XML element.'	Define the characteristics of the auto value for the color attribute of the background element properly.	
	Part 4, Section 2.2.1	page 29	te	There are several instances of the word 'border' that are meaningless in this context (the text is supposed to describe the 'background' element at that location and no "border" has been defined).	Clarify which border the text refers to (if any notion of border must be introduced here) or else rewrite the text so that it makes sense.	
	Part 4, Section 2.2.1 background (Document Background)	page 27, lines 1&2	te	Assuming that background be referring to the background of the document defined by one of its enclosing elements, assuming that the notion of document page and the notion of displaying be properly defined and that their definitions match commonly accepted ones, then the 'This background shall be displayed on all pages of the document, behind all other document content.' sentence makes unclear whether the total surface of a page must be filled with the background, or else how the subpart of the said surface can be determined.	Clarify the definition of "background".	
	Part 4, Section	page 27, lines 8&21	te	Contradicting use of accent3 and accent5 – the text says one thing, but the example says another.	Fix the contradiction.	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**te** = technical **ed** = editorial

**NOTE** Columns 1, 2, 4, 5 are compulsory.

2 Type of comment:

ge = general

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB1	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	2.2.1 background (Document Background)					
	Part 4, Section 2.3.1.8	-	te	The conditional formatting properties of this paragraph are expressed through bit masks rather than a set of boolean types. This makes XSLT processing impossible.	Redraft the sub clause to use boolean XML declarations rather than bit masks	
	Part 4, Section 2.3.3.19	-	te	This paragraph demands that the properties of this embedded object are specified in VML syntax. However, Part 1, Section 8.2.6 explicitly states that the use of VML is deprecated in favor of DrawingML. Certainly, a newly created document should not use the deprecated VML syntax.	Use DrawingML to define the layout properties of embedded objects rather than to mandate the deprecated VML format.	
	Part 4, Section 2.4.51	-	te	These table style formatting properties are configured via bit masks rather than a set of boolean types. This makes XSLT processing impossible.	Redraft the sub clause to use boolean XML declarations rather than bit masks	
	Part 4, Section 2.4.52	-	te	These table style formatting exceptions are configured via bit masks rather than a set of boolean types. This makes XSLT processing impossible.	Redraft the sub clause to use boolean XML declarations rather than bit masks	
	Part 4, Section 2.4.7	-	te	These table cell formatting rules are configured via bit masks rather than a set of boolean types. This makes XSLT processing impossible.	Redraft the sub clause to use boolean XML declarations rather than bit masks	
	Part 4, Section 2.4.8	-	te	These table row formatting rules are configured via bit masks rather than a set of boolean types. This makes XSLT processing impossible.	Redraft the sub clause to use boolean XML declarations rather than bit masks	
	Part 4, Section 2.8.2.16	-	te	These code page support flags are configured via bit masks rather than a set of boolean types. This makes XSLT processing impossible.	Redraft the sub clause to use boolean XML declarations rather than bit masks	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB1	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	Part 4, Section 3.17.4.1	-	te	The restriction to the date bases of 1900 and 1904 is arbitrary and only based on the vendor's applications. There are other reasonable date bases (such as 1970), and there should be a way to define earlier values for historical dates.	Allow a range of vendor-declared date bases, or explicitly allow negative date serial values to express dates prior to 1900.	
	Part 4, Section 3.17.4.1	-	te	There is no reason to support and even mandate an incorrect date calculation for 1900 in the 1900 date basis. An ISO standard should not mandate to infringe on another well-established standard, such as the Gregorian calendar, in order to standardize the bugs of a single vendor specific application.	If this incorrect date calculation is needed for legacy reasons, add a vendor extension like for the Word misbehaviors, such as "addFebruary29th1900LikeExcel".	
	Part 4, Section 3.17.4.1	page 2522, lines 14 – 18	te	The specification introduces two different date bases, 1900 and 1904. While there is no advantage of having two bases, it adds a significant cost of conversion between the two formats to the application.	Choose and keep a single date base.	
	Part 4, Section 3.17.4.1	page 2522, lines 16-18	te	The upper limit of the serial date is described as 9999-12-31 00:00:00, while one would expect the upper limit to be 9999-12-31 23:59:59.	Clarify the upper limits.	
	Part 4, Section 3.17.4.1	page 2522, line 19	te	The proposed date system does not take dates before 1900-01-01 into account.	Propose a better date system.	
	Part 4, Section 3.17.4.2	-	te	The proposed time stamp format does not take time zone and daylight saving times into account. Thus, it is ambiguous two times a year at least, and may cause further problems with interoperability between different time zones.	Either add a notion of time zones to the time stamp format or force it to be calculated from UTC internally and stored as UTC time stamps in the serialized form.	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB <sup>1</sup>	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	Part 4, Section 3.17.4.3	-	te	The "combined date and time representation" does not take time zone and daylight saving times into account. Thus, it is ambiguous two times a year at least, and may cause further problems with interoperability between different time zones.	Either add a notion of time zones to the "combined date and time representation" or force it to be calculated from UTC internally and stored as UTC time stamps in the serialized form.	
	Part 4, Section 3.17.7.341	-	te	The described function mandates incorrect week days for certain days in the year 1900.	Remove the text that mandates incorrect week day calculations.	
	Part 4, Section 3.18.86	-	te	Length is said to be "exactly 4 characters". This is inconsistent with the schema fragment given which defines it as being 4 octets long or 8 characters.	Clarify the definition. In particular note that xsd:hexBinary measure length in octets, not characters.	
	Part 4, Section 3.18.87	-	te	Length is said to be "exactly 2 characters". This is inconsistent with the schema fragment given which defines it as being 2 octets long or 4 characters.	Clarify the definition. In particular note that xsd:hexBinary measure length in octets, not characters.	
	Part 4, Section 3.2.29	-	te	This section specifies a known weak hash algorithm to be used in OOXML documents. If a hashing algorithm is supposed to be used, it should be a state of the art algorithm, such as SHA2.	Use a standard, FIPS-180 compliant hash algorithm as the default. Legacy algorithms could be supported as extensions.	
	Part 4, Section 3.2.29	pages 1917 – 1922	te	The exact definition of the password hashing algorithm is missing, so no interoperability is possible on this feature. There is an example algorithm in an informative section, but its execution is machine dependent, and therefor it can't serve as a normative definition.	Provide a normative hashing algorithm, or a normative reference to one.	
	Part 4, Section 3.2.29	page 1916	te	Apparently, a password which is entered in a script that does not consist of western characters, will be replaced by a single byte containing 0x3F, rendering the password protection useless.	Refactor the algorithm used so it operates on Unicode passwords.	
	Part 4,	page 1916	te	The encoding for the password is not specified. It	The encoding and byte ordering should be	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**ge** = general **te** = technical **ed** = editorial

**NOTE** Columns 1, 2, 4, 5 are compulsory.

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB1	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	Section 3.2.29			is most likely supposed to be a Unicode encoding, but in what format? UTF-8? UTF-16? Big or little endian? Since the specified algorithm operates on a byte level, endianness of the input data does matter and must be specified.	made explicit for both entering the password and calculating the hash (Since those steps could actually take place on machines with a different byte order).	
	Part 4, Section 3.2.29	page 1916	te	The conversion of the password to a single byte string is ambiguous. If different scripts are used, such as Chinese and Korean, will the unmapped characters just be replaced with 0x3F? And which DBCS code page would be used in that case?	Clarify this processing, especially for the case of multiple scripts from different DBCS code pages.	
	Part 4, Section 3.3.1.61	-	te	The definition of the pageSize attribute doesn't include all valid page sizes described in ISO 216, ANSI Y14.1 and the DIN and JIS standards.	Record the dimensions of the paper rather than a normative name which requires to maintain a database of paper size norms.	
	Part 4, Section 3.3.1.69	-	te	The exact definition of the password hashing algorithm is missing, so no interoperability is possible on this feature. There is an example algorithm in an informative section, but its execution is machine dependent, and therefor it can't serve as a normative definition.	Provide a normative hashing algorithm, or a normative reference to one.	
	Part 4, Section 3.3.1.69	-	te	The securityDescriptor attribute is defined as "user accounts who may edit this range without providing a password to access the range ". However, there is no definition of how these user accounts shall be described or delimited.	Fully define this attribute (e.g. as a LDAP DN, delimited by semicolons).	
	Part 4, Section 3.3.1.69	-	te	This section specifies a known weak hash algorithm to be used in OOXML documents. If a hashing algorithm is supposed to be used, it should be a state of the art algorithm, such as SHA2.	Use a standard, FIPS-180 compliant hash algorithm as the default. Legacy algorithms could be supported as extensions.	
	Part 4, Section 5.1.12.28	-	te	This section defines a ST_HexBinary3 type which is only used in 2 occasions, 5.1.2.2.32 and 5.1.2.2.33. In both occasions, it serves as a RGB	Use the ST_HexColorRGB type and remove the definition of ST_HexBinary3.	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**ge** = general **te** = technical **ed** = editorial

**NOTE** Columns 1, 2, 4, 5 are compulsory.

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB1	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
				color value. Thus, the already defined ST_HexColorRGB type should be used.		
	Part 4, Section 5.1.12.28	-	te	Length is said to be "exactly 3 characters". This is inconsistent with the schema fragment given which defines it as being 3 octets long or 6 characters.	Clarify the definition. In particular note that xsd:hexBinary measure length in octets, not characters.	
	Part 4, Section 5.1.12.37	-	te	The text refers to the "Panose setting" of a font, which is not defined as a term anywhere.	Provide a proper external normative reference to this term.	
	Part 4, Section 5.1.12.37	-	te	The text defines that the Panose value should be used "so that generating applications using this Office Open XML standard may determine the closest font type if necessary". However, no font distance metric or font matching heuristic is described.	Describe the intended font matching algorithm.	
	Part 4, Section 5.1.12.37	-	ge	Two definitions of the Panose value are provided, both actually being identical.	Provide one single definition of a Panose value rather than to describe it in both the Word Processing ML and the Drawing ML module.	
	Part 4, Section 5.1.12.37	-	te	Length is said to be "exactly 10 characters". This is inconsistent with the schema fragment given which defines it as being 10 octets long.	Clarify the definition. In particular note that xsd:hexBinary measure length in octets, not characters.	
	Part 4, Section 5.1.3.2	-	te	No mention is made of what audio formats or codecs are permitted.	An interoperable set of formats should be specified.	
	Part 4, Section 5.1.3.4	-	te	The definition of embedding a QuickTime object into a presentation does not include references to versions and specific codecs of the QuickTime format that shall be supported.	Provide external references to the version as well as interoperable codecs that shall be supported.	
	Part 4, Section 6	-	te	This section describes the VML (Vector Markup Language) format which is declared in Section 6.1	Remove the VML definition and all references to it from the specification.	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**NOTE** Columns 1, 2, 4, 5 are compulsory.

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB1	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
				as deprecated in favor of the new and richer DrawingML format. However, the VML declaration is as long as 600 pages, and if it is deprecated, it should be removed from the specification. If it is specified, it must be supported by all vendors, which means a greatly increased expense in implementation.		
	Part 4, Section 6.1	page 4343, line 5	ed	The relationship of 'Other VML namespaces' to the OOXML proposal is unclear.	If the said other namespaces are related to OOXML, clarify the relationship, else remove the reference to them from the text.	
	Part 4, Section 6.1	page 4343, line 8	te	The reference to "millions of documents" is an unsupported assertion. Furthermore, it is irrelevant in the context of a standard proposal.	Remove the assertion from the standard.	
	Part 4, Section 6.1	page 4343, line 9	ed	The reference to the specific commercial product "Office 2000" brings no value to the proposal.	Remove the reference to Office 2000.	
	Part 4, Section 6.1	page 4343, lines 4-5	ed	What does "This namespace" refer to? There is no obvious namespace in the context of that sentence.	Clarify which namespace is referred to.	
	Part 4, Section 6.1.2.19	page 4653, "equationx ml"	te	This section describes the equationxml attribute of "shape" elements, "used to rehydrate an equation using the Office Open XML syntax". However, the "actual format of the contents of this attribute are application-defined", which makes them impossible to be exchanged between applications.	Use the new markup in its elemental form, rather than in an attribute value, and define equations in an interoperable way. Or, even better, use the existing MathML.	
	Part 4, Section 6.1.2.19	page 4655, "gfxdata"	te	This section describes the gfxdata attribute of "shape" elements, containing "DrawingML content" that is "base-64 encoded". However, the "contents of this package are application-defined", so even though they "shall use the Parts defined by this Standard whenever possible", there is not enough information to read and display the "DrawingML content" in this attribute.	Use the new markup in its elemental form, rather than in an attribute value, and define equations in an interoperable way. Or, even better, use the existing SVG format.	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**ge** = general **te** = technical **ed** = editorial

**NOTE** Columns 1, 2, 4, 5 are compulsory.

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB <sup>1</sup>	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	Part 4, Section 6.1.2.7	page 4444, "tableprop erties"	te	These VML table properties are configured via bit masks rather than a set of boolean types. This makes XSLT processing impossible.	Redraft the sub clause to use boolean XML declarations rather than bit masks	
	Part 4, Section 6.2.2.14	-	te	This is a description of an "ink" element, which stores "ink annotations in an application-defined format". This probably refers to hand-written annotations to documents done using a tablet input device. However, most of the time, these annotations are very important to the entirety of the document, and OOXML does not define a format to store them. (So OOXML doesn't specify anything that could possibly be put into the ink element.)	Specify the "ink" format or remove the element from the OOXML specification and turn it into an extension.	
	Part 4, Section 6.4.2.10	-	te	This is a "general-use element for objects that use an image representation, such as OLE objects, embedded controls, cameras and signature lines". None of the referred formats (EMF, WMF, etc.) are defined or referred to in this specification though.	Provide a proper external normative reference for the allowed formats containable within this element.	
	Part 4, Section 6.4.3.1	-	te	The values permitted in this enumeration are Windows specific formats, whose use is restricted to users of the Windows operating system. The Free Desktop Specification, implemented by the majority of Open Source based operating systems, uses the free PNG format to interchange between applications and the clipboard.	Also allow freely available formats to be used as values in this enumeration.	
	Part 4, Section 7.1	-	te	This section specifies the Office Open Math Markup Language, which describes mathematical equations. Thus, it solves the same problems as MathML, a long existing W3C standard which is undergoing constant development to reflect latest requirements of mathematics.	Remove this section from the OOXML specification and reference and use the MathML specification instead.	
	Part 4, Section	-	te	The XML specification forbids the insertion of non- XML characters, be it escaped or unescaped. Thus,	Remove the bstr type from the OOXML specification.	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

**ge** = general **te** = technical **ed** = editorial

**NOTE** Columns 1, 2, 4, 5 are compulsory.

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB1	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	7.4.2.4			the presence and use of the bstr data type breaks interoperability with standard compliant XML processing tools, and the compliance to the standard itself.		
	Part 4, Section 7.4.2.4	-	te	The definition of the mechanism for escaping Unicode characters which are impermissible in XML documents lacks a definition for escaping the escape sequence. So, if one wants to escape already escaped sequences, there is no standard compliant way.	Complete the definition by adding a definition of escaping the escape code.	
	Part 4, Section 7.4.2.5	-	te	Representing a string as a NULL terminated character sequence with base-64 encoding is orthogonal to using XML. Documents written this way will not be easily convertible using XSLT style sheets.	The clipboard data representation should be redesigned by the proposers with the interoperability that XML offers in mind, rather than designed around the specific implementation of one ECMA member.	
	Part 4, Section 7.4.2.5	-	te	The format for neither the GUID nor the FMTID identifiers are specified.	Specify it so interoperability may be achieved.	
	Part 4, Section 7.4.2.5	-	te	This element defines values for use on Windows and Macintosh platforms, but not for Linux or any other operating system.	Several options here, but the desire is to allow cross platform interoperability.	
	Part 4, Section 7.4.2.5	-	te	Even within a single platform, there is not enough information given to achieve interoperability. For example, what are the allowed values and meanings for a "built-in Windows clipboard format value"?	Specify this so interoperability may be achieved.	
	Throughout	-	te	The name "Office Open XML" is often confused and pronounced or written "Open Office XML", implying a connection to the "OpenOffice.org" project which does not exist. Since "Open Office" is a preexisting name by 6 years, the ECMA should consider choosing a different name for their standard.	Change the name of "Office Open XML" to something which is less easily confused with "OpenOffice.org".	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

2 Type of comment: ge = general te = technical ed = editorial

Date:

Document:

1	2	(3)	4	5	(6)	(7)
MB1	Clause No./ Subclause No./ Annex (e.g. 3.1)	Paragraph/ Figure/Tabl e/Note (e.g. Table 1)	Type of com- ment 2	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	Throughout	-	te	From the standard proposal, it is clear that Office Open XML is a new standard written from scratch, in ignorance of the preexisting ISO standard for document representation in XML, ISO/IEC 26300:2006 (ODF 1.0). There is no reason for a complete rewrite, and since unneeded differences are harmful, we suggest to rewrite the OOXML proposal as an extension to the existing standard.	Rewrite OOXML starting from ISO/IEC 26300:2006 (ODF 1.0).	
	Throughout	-	te	More than 10% of all XML examples contain errors and/or are not valid XML.	Correct all affected examples.	
	Throughout	-	ge	There is no proven working implementation of the specification yet. Microsoft Office 2007 only implements a derivative set of rules but not the full OOXML specification.	Modify the OOXML implementation of Microsoft Office 2007 to comply to this specification.	
	Throughout	-	ge	This specification was not developed as a consensus of the combined knowledge and experience of producers, sellers, consumers and regulators, but only as the idea of one single entity, Microsoft.	Redraft the standard as a public hearing model.	
	Throughout	-	ge	While Microsoft has promised not to sue implementors of the specification, a large fraction of it is nevertheless covered by patents owned by Microsoft. Since Microsoft still holds these patents and has not done anything to make them legally invalid for Open Source use, it is unclear whether this promise is trustworthy. It is at least not trustworthy enough to build a business on.	Force Microsoft to publish an implementation of code infringing on the affected patents, or even their entire OOXML implementation, under a free reusable license, such as the Lesser GPL (LGPL). This gives Open Source and other implementors the irrevokable right to implement the OOXML specification.	

1 MB = Member body (enter the ISO 3166 two-letter country code, e.g. CN for China; comments from the ISO/CS editing unit are identified by \*\*)

2 Type of comment: ge = general te = technical ed = editorial