Matched Requirements

Revision history

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AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
10047			10397	DRM shall allow for
DRM shall allow for			The REL shall support	distribution and
distribution and			free access to digital	management of free
management of free			objects.	digital objects.
digital objects with the				
same level of				
management as fee				
digital objects. [1]				
10048		10265	10397.6	The REL shall support
DRM shall enable		Tiered Models	The REL shall support	specifying conditions
expression and		The REL shall support	discounting schemes	(such as different
enforcement of rights		specifying conditions	(e.g., discounting	pricing levels) based on
and rules which may		(such as different	applied once tiered	the number of copies of
vary depending on the		pricing levels) based on	volumes are purchased).	a work requested.
number of copies sold of		the quantity of a work		
a given digital object.		requested.		
[5]		Example: Pay \$10 for		
		each copy up to 10		
		copies, and \$8 for each		
		copy over 10 copies.		
		10265.1		
		<u>Tiered Models</u>		
		The REL shall support		
		specifying conditions		
		(such as different		
		pricing levels) based on		
		the quality of different		
		versions of a same work		
		offered.		
10048.1			10312	DRM shall enable

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
DRM shall enable			Where rights	expression and
expression and			expressions can be	enforcement of rights
enforcement of rights			applied at various levels	and rules which may
and rules which may			within a nested data	vary according to the
vary depending on the			structure, well-defined	relationships between
order of navigation			syntax shall exist to	and/or navigation
through a collection of			specify which rights	through a collection of
digital objects that			apply to data at various	digital objects that
combine to comprise a			points within the	combine to comprise a
larger digital object. [5]			hierarchy. Where	larger digital object.
			conflicts arise, policies	
			would need to be specified in the rights	
			expression to resolve	
			them.	
10048.2		10265.2	[10354]	The REL shall support
DRM shall enable		Tiered Models	[10334]	specifying conditions
expression and		The REL shall support		(such as different
enforcement of rights		specifying conditions		pricing levels) based on
and rules which may		(such as different		the length of time to use
vary depending on the		pricing levels) based on		a work.
usage time of a given		the the length of time to		a work.
digital object. [5]		use a work.		
digital object. [5]		use a work.		
10050		10266	10397.1	DRM shall support
DRM shall support the		Pay Per View or Use	The REL shall support	payment of a fee for
expression and		The REL shall support	Pay-Per-Interaction.	each use of a digital
enforcement of rights		specifying a simple fee		object either online or
and rules associated		charged every time that		offline.
with digital objects on a		a right is exercised.		
pay per use basis in an				
online setting. [3]	_			
10050.1				
DRM shall support the				
expression and				
enforcement of rights				
and rules associated				
with digital objects on a				
pay per use basis in an offline setting. [3]				
offine setting. [3]			10397.3	
			The REL shall support	
			Pay-per-Interaction up	
			to a limit and then	
			switch to free access for	
			allowed Interactions	
			("rent-to-own").	
10051	10114	10231	10370	DRM shall support a
DRM shall support the	DRM shall allow and	The REL shall provide	Data streams are to be	combination of Digital
aggregation of content	protect digital objects	mechanisms to specify	treated as Digital	Objects where the
into any combination of	that include content in a	composite Digital	Objects in their own	Digital Objects can be
digital objects and to	variety of media,	Objects as well as	right.	of different media types,
enforce the rights and	including sound,	component parts of the		including sound,
rules associated with	animation, and video.	composite Digital		animation, video and

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
any and/or all of their	_	Object.	_	electronic text. Digital
combinations. [1]				rights and rules can be
				applied and enforced for
				the entire set of objects
				and/or for specific
				objects within the set.
10052				
DRM shall support				
changing between				
pricing models that are				
allowed by the rights				
and rules enforced. (If a				
need arises later for				
switching between				
usage rules, more				
discussion is necessary.)				
[3]				
10052.1		10267		<u>Subscription</u>
DRM shall support		The REL shall support		DRM shall support
controlled access to		specifying subscription-		subscription-based
content on a		based pricing.		pricing and access to
subscription basis. [1]				content.
			10397.4	
			The REL shall support	
			the consumer's payment	
			of a minimum up-front	
			charge on a subscription	
			basis. The subscription	
			expires when either a	
			time limit expires or a	
			permitted number of	
			uses or amount of usage	
			time is exceeded.	
			Subsequent uses incur	
			separate per-use	
			charges.	

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
10053	[EMEA]	10252	10400	Territory Based
DRM shall support	10456	The REL shall support	It shall be possible to	Conditions
enforcement of rights	DRM systems shall be	industry standard	specify predicate	The REL shall support
and rules associated	able to identify territory	mechanisms to reference	expressions in	industry standard
with digital objects	with respect to	territory information in	geographic terms	mechanisms to reference
based on locale, region,	copyright jurisdictions	order to	according to any	physical regions, areas
or territory. [1]	in order to support the	 support 	established taxonomy of	and locations as well as
	legitimate interests of	limiting rights	geography.	digital domains,
	copyright owners.	to certain		networks and systems.
		physical		
		regions, areas		
		and locations.		
		• support to		
		restricting		
		rights to certain		
		digital		
		domains, (sub-		
)networks and		
		systems 10268	10401	
		The REL shall support	The REL shall allow for	
		specifying territory	the specification of	
		information to enable	acceptable methods for	
		regional pricing, and to	determining the	
		offer publishers control	geographic location of a	
		over where Digital	user.	
		Object can be	usci.	
		purchased.		
		Parentagea.		
10055				
DRM shall support the				
combining of different				
pricing options for				
rights and rules				
associated with digital				
objects.				

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
10056		10246	10341	Time Based Conditions
DRM shall support		The REL shall provide	By default all Rights	The REL shall support
time-based rights and rules.[2]		mechanisms to specify time periods over which	and Obligations expressions shall persist	unambiguous specifications of time to
14103.[2]		rights are granted in	indefinitely. However,	allow for commerce
		order to express time	it shall be possible for	across time zones and
		limits that govern when	Rights and Obligations	rights expression based
		rights become available	to be given bounded	on time specifications
		and when they cease to	lifetimes, where	such as specific times,
		be available, express the categories of time	required, beyond which the rules are no longer	fixed intervals, sliding intervals and metered
		blocks that are useful for	applicable. Such	intervals.
		governing commercial	specifications should be	
		and non-commercial use	possible at the macro	
		of digital works,	level such that they	
		describe contiguous periods of time, periods	apply to all Rights and Obligations clauses	
		of time that do not start	contained within a set.	
		until a work is first used,	Volume William William William	
		accumulative amounts	10399	
		of time that need not be	Rights and Obligations	
		contiguous, and recurring time intervals	may change according	
		that a work can be used	to the current time of day. This shall be	
		repeatedly in a regular	expressible in the REL.	
		fashion, provide	empressione in the REE.	
		unambiguous		
		specifications suitable		
		for international commerce and use		
		across time zones.		
		The REL shall support		
		the following time		
		specifications: Fixed intervals, sliding		
		intervals, metered		
		intervals		
10056.1				
DRM shall support				
time-based pricing rules for digital objects.[2]				
10057			[10354]	
DRM shall support			[1,000,1]	
metered pricing.				
10060			10324	DRM shall allow for the
DRM shall allow for the			The REL shall allow	bundling of digital
bundling of digital objects (for pricing or			rules to be defined around data classes and	objects (for pricing or rights purposes)
rights purposes)			content attributes in	independent of the
independent of the			such a manner that,	channel, delivery
delivery method or time			where appropriate, the	method, or time frame.
frame. [1]			rules can be made	
			independent of the	

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
			channel or mode of	
100/1	F.CD. H.3		delivery of the content.	DD1 (1 II
DRM shall support expression and enforcement of rights and rules on a user grouping basis, where individual user rights may differ from those granted to a group of users. [2]	[CNI] 10466 DRM shall support permissions based on group membership.		The REL shall allow for Rights and Obligations expressions to be written and evaluated with respect to roles, department structures, categories of users, and other attributes of members within an organisation.	DRM shall support rights expressions for different individual users or for different groups of users. Individual user rights may differ from those granted to a group of users.
		The REL shall support user-based pricing levels for different individual users or for different groups of users.		
10062			10397.5 The REL shall support sponsored charging models (where charges are applied to a different organisational unit than that causing the charge).	
DRM shall support the expression and enforcement of rights and rules associated with the capabilities of specific reading systems. [3] [Note: see 10077]			It shall be possible within the REL to nominate applications to be used for interacting with a Digital Object. For example, only the official Adobe Acrobat Reader is allowed to render this PDF file.	DRM shall support the expression and enforcement of rights and rules associated with the capabilities of specific reading systems or other applications.
10065 DRM shall allow consumers to obtain additional rights for a digital object for which they already have certain rights either individually or through a group association.[2]			Provision shall be made in the REL to specify in rights expressions how rights may be obtained through such mechanisms as licence purchase via an ecommerce site. The provision should also allow for the context to determine the location of the source of rights and the terms and conditions of supply.	DRM shall allow consumers to obtain additional rights for a digital object for which they already have certain rights (or none at all) either individually or through a group association. Support shall be provided in the REL for specifying how licences are thus obtained, with additional support for context-based variations.
10065.1 DRM shall provide	10120 DRM shall provide		10363 It shall be possible to	Accounting Information Collection

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
means for rights holders to obtain payment related information.[1]	means for distributors and sellers to account to publishers for sales of digital objects.		specify in the REL the required levels of financial reporting on downstream value chain participants.	DRM shall support collection of accounting information throughout the value chain for commercial and noncommercial distribution.
DRM shall allow for the expression and enforcement of payment rules for digital objects. For example – payment shall be made to rights holders within 30 days.[1]			10373 The REL shall make provision for rules specifying when particular actions must be completed.	The REL shall make provision for rules specifying when particular actions must be completed. For example – payment shall be made to rights holders within 30 days.
10066 DRM shall support adding and changing rights and rules at any time. [1] [Note: see 10065]		The REL shall provide mechanisms to express how rights expressions (including conditions and obligations) can be changed over time and how rights expressions (including conditions and obligations) can be changed or modified in other rights expressions derived from them. Rights change should be under control of the original rightsholder or a designated agent and would include the ability to designate authorized parties for alteration and referral of or to information contained in a rights expression.	Support shall be given for mechanisms by which Rights and Obligations may be updated during their lifetime.	Changing or Adding Rights The REL shall provide mechanisms that express under what conditions rights expressions can be altered or augmented. EXAMPLES: 1) Rightsholder may want to change price. 2) Retailer needs to add markup to Distributor's price. 3) Consumer may want to buy additional rights to Digital Object.
DRM shall allow for the lending of digital objects among individuals. If an individual lends a digital object to another individual, he or she shall be unable to access the digital object. Lending shall not require that the digital object actually transfer to the new recipient.[2]	DRM shall allow end users to lend digital objects to other end users.	[CMU Library] 10425 DRM shall allow purchasers of digital objects to loan them (single-user loan, analogous to printed books), without paying a fee to the copyright holder or breaking any laws. [first sale principle]	The REL shall provide mechanisms to express transport rights in order to distinguish between rights for moving works, describe controlled loaning of works, support a range of distribution models (including superdistribution, and enable the specification of how rights change on new copies of works.	DRM shall allow an end user who has purchased a digital object to lend it to another end user. During the period of the loan, the lender shall not have access to the digital object.

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
			[Jonathan Hahn] 10040 DRM shall allow an end user to lend a publication to a friend. The lender will not have access during the period of the loan.	
DRM shall support the giving of digital objects. When an individual gives a digital object he or she relinquishes all rights to access and/or use the digital object.	DRM shall allow end users to give digital objects to other end users.	See 10239		DRM shall allow an end user who has acquired a digital object to give it to another end user. The giver shall relinquish all rights to access and use of the digital object.
[2] 10070 DRM shall allow users to distribute digital objects controlled by DRM, whereby recipients will be able to purchase the full set or a subset of the original rights associated with the digital object, irrespective of the reading device being used.[1]	10124 DRM shall accommodate superdistribution of digital objects.	10275 The REL shall support superdistribution of Digital Objects in terms of associating same or different sets of rights, conditions, and obligations for the superdistributed Digital Objects.		DRM shall support Superdistribution to enable recipients of Digital Objects to purchase or legally obtain a license for the object. The license can be for any set of rights that the content owner chooses to grant.
10071 DRM shall support the delegation and enforcement of rights and rules associated with digital objects. [1]	DRM shall provide means for publishers to give distributors and sellers the right to sell digital objects to sellers, libraries, and end users.			DRM shall support the delegation and enforcement of rights and rules associated with digital objects. For example, DRM will provide means for publishers to give distributors and sellers the right to sell digital objects to sellers, libraries, and end users.
10071.1 DRM shall support the enforcement of limits associated with delegation of rights, where a third party could only grant rights to individuals according to limits established by				Total City and City and City

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
the rights holder during				
the initial acquisition of				
the digital object by that				
third party. [1]				
DRM shall support the				
ability to make copies of				
the digital object. DRM				
shall allow the rights				
holder to establish rules				
that are specific to				
copies made. [1]				
10073			10381	DRM shall allow the
DRM shall allow the			The REL shall include	rights holder to control
rights holder to control			expressions to define	whether a digital object
whether a digital object			terms and conditions	can be combined in any
can be combined in any			(Rights and Obligations)	way (for example, by a
with other digital			for a third party	third party content
objects. [1]			aggregating content	aggregator) with and
			within a larger content	into other digital objects.
10075		10241	offering.	Derivative Rights
DRM shall allow the		The REL shall provide	It shall be possible	The REL shall provide
rights holder to control		mechanisms to express	within the REL to	mechanisms to allow the
whether derivative		derivative work rights in	describe limitations on	rights holder to control
works can be created		order to make it possible	how (meta)data may be	whether and how
from a digital object. [1]		for the rights owner to	derived from a Digital	derivative works can be
		pre-arrange fees and	Object and to describe a	created from a digital
		conditions governing	set of maximal rights	object.
		subsequent use of the	and minimal obligations	
		material in derivative	that can be expressed	
		works, to express	about derived data by	
		whether communication	the party creating it.	
		for notification or		
		authorization is required before a derivative work		
		right can be exercised,		
		to ensure that all		
		information about		
		authorship, identity,		
		Digital Objects, and		
		rights is controlled or		
		preserved in the		
		derivative work, enable		
		a rights owner to		
		determine whether		
		derivative works can		
		incorporate selected		
		portions of a work, or		
		whether the original work must be		
		incorporated in total.		
10076		10240		Print Rights
DRM shall allow the		The REL shall provide		The REL shall provide
	1		ı	provide

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
expression and enforcement of rights and rules that control whether the digital object can be printed in whole or in part. [1]		mechanisms to express render rights in order to distinguish between rights for displaying content and rights for making long-lasting copies such as printouts; provide a means of distinguishing different kinds of viewers, players and printers for digital works; and provide a controlled means for creating unencumbered digital copies outside of a trusted system.		mechanisms to express print rights relative to all or a portion of the digital object.
DRM shall support the expression and enforcement of rights and rules associated with the capabilities of specific printing devices. [Note: see 10062]		See 10240		
		10240.1 Display Rights The REL shall provide mechanisms to express display rights relative to all or a portion of the digital object.		
DRM shall allow rights holders to control whether or not authorized users can make unprotected/unmanaged copies of originally protected/managed digital objects. 10079 DRM shall allow the creation and granting of subordinate rights to the		See 10240		
ones originally associated with a digital object. [Note: see 10066 and 10071] 10083 DRM shall enable	10144 DRM shall ensure that	10233 The REL shall provide	10412 The REL shall support	DRM shall ensure that digital objects are not

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
consumers to determine the authenticity of the digital object. [1]	digital objects are not tampered with or modified after they are published.	mechanisms to reference authentication schemes. These mechanisms help ensure integrity of Digital Objects and detect whether the Digital Objects have been altered in an unauthorized manner.	the definition of constraints for downstream handling of Digital Objects in order to preserve the integrity of the Digital Objects. For example: Use of tamperresistant distribution channels. Use of mechanisms by which consumers can verify the integrity of Digital Objects.	tampered with or altered after they are published, except insofar as the rights holder allows modification.
DRM shall allow consumers to create backups of digital objects which have rights and rules enforced by the DRM. Each backup copy shall itself be controlled by the same rights and rules which pertain to the original digital object.	10140 DRM shall allow end users to archive (back up) digital objects.			DRM shall allow consumers to create backups of digital objects which have rights and rules enforced by the DRM. Each backup copy shall itself be controlled by the same rights and rules which pertain to the original digital object.
10085 DRM shall support the right to delete a digital object.			The REL shall provide the facility to describe rules about deleting Digital Objects in an unlimited variety of contexts and circumstances. The rules shall extend to the manner of destruction of the Object, which will include such requirements as caching a deleted Object within a retrieval area until a condition is met (timeout, flushing of the cache, etc).	DRM shall support the right to delete a digital object. The rules shall extend to the manner of destruction of the Object, which will include such requirements as caching a deleted Object within a retrieval area until a condition is met (timeout, flushing of the cache, etc).
10086 DRM shall allow consumers to restore backup copies of digital objects which have rights and rules enforced by the DRM. Each				

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
restored backup copy shall itself be controlled by the same rights and rules which pertain to the original digital object. [3]			•	
10087 DRM shall allow expression of rules and policies that would enable consumers to move digital objects across multiple reading systems. [1]	[CMU Library] 10421.1 DRM shall permit the borrower of a digital object from a library to transfer a copy of the digital object to another reading system on any devices that the borrower owns. Transfer may require converting	[CMU Library] 10425.1 DRM shall permit purchasers of digital objects to convert them to other formats for use with different devices, without paying a fee to the copyright holder or breaking any laws. [first sale principle]	[Richard Mahaffey] 10445 DRM shall permit end users to transfer digital objects to and view them on any reading devices and computers that the user owns.	DRM shall allow an end user to transfer a digital object to any reading system that the user owns and exercise all rights granted to the user on any such reading system. DRM shall allow any conversion of the digital object's content format that is
DRM shall allow expression of rights and rules that may come in effect when a digital object is moved from one reading system to another. [1]	the digital object to another format interoperable with the user's device.			necessary to transfer the digital object to and exercise rights on another reading system that the user owns.
10089 DRM shall support industry standard encryption algorithms which can be selected from when specifying the rights and rules pertaining to a digital object. [1] 10089.1	10149 DRM shall neither prescribe nor preclude any particular algorithm for encryption of the content of digital objects. [Note: see 10158]			DRM shall support specifying encryption algorithms for the encryption of Digital Objects. DRM shall not require specific algorithm(s), nor shall it preclude any particular algorithm.
DRM shall support determination of key length as part of defining rights and rules associated with a digital object. [1]				
DRM shall support multiple identification systems for digital objects when associating rights and rules with those digital objects. [1]	10159.1 Metadata for a digital object in the DRM context shall include one or more standard identifiers (such as ISBN or DOI).	The REL shall support uniform, flexible and interoperable mechanisms to identify Digital Objects and their types at a global scope according to international identification systems or schemes.	Provision shall be made for Digital Objects to be identified via any suitable identification scheme.	DRM shall use standard identifiers (such as ISBN and DOI) for digital objects.

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
DRM shall support enforcement of rights and rules associated with metadata pertaining to digital objects where parts or all of that metadata may be controlled by DRM. [1]		DRM shall provide mechanisms to reference Digital Object metadata as part of the REL, make reference to external content metadata, and include existing content metadata.		DRM shall provide mechanisms to reference metadata as part of the REL, make reference to external content metadata and include existing content metadata. It shall support the enforcement of metadata where all or part of the metadata may be controlled by DRM.
DRM shall support verification of authenticity of parts or all of metadata associated with a digital object. 10092.2 DRM shall protect the integrity of parts or all of metadata associated				
with a digital object. 10094 DRM shall support expression and enforcement of rights and rules independently from the binary format of the digital object, where rights and rules would apply to any given delivery format of that digital object. [1]	10134 DRM shall allow a reading system to access electronic publications from any publisher, regardless of content format. 10147 DRM shall protect digital objects regardless of their content format. 10148 DRM shall protect digital objects regardless of their container file format.			DRM shall protect digital objects and allow reading systems to access digital objects regardless of their content format.
10097 DRM shall support offline enforcement of rights and rules associated with digital objects.[1]				
10097.1 DRM shall support acquisition of rights to a digital object while offline with asynchronous clearance			See 10348	

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
of that transaction. [5] 10098 DRM shall support the delegation of perpetual rights associated with a digital object to a consumer. [1]			See 10397	
10099 DRM shall be capable of collecting usage metrics.	DRM shall provide means for publishers to collect data on characteristics of purchasers of digital objects.	The REL shall provide mechanisms to express how Digital Object usage should be tracked in order to record usage history for granting rights in future time. identify one or more tracking agencies and systems for keeping tracking information. express what	It shall be possible to specify in the REL the required levels of usage reporting on data supplied downstream within a value-chain.	Usage / Consumption Tracking The REL shall provide the mechanisms to express the requirement for usage tracking and the conditions that apply. DRM shall enforce the collection of usage metrics throughout a value chain.
10099.1 DRM shall support reporting of anonymous usage and market information.		information needed (and need not) to be tracked. • specify how often tracking has to happen. • specify what granulates tracking is based on. • support generation of reports for survey and business purposes.	[Jonathan Hahn] 10042 Authors (and other "creators") shall have a way of contacting their fans.	
DRM shall allow consumers to control dissemination of their private information where it pertains to the acquisition of rights and rules associated with a digital object.	DRM shall protect the privacy of records of end users' purchasing and borrowing of digital objects.		10413 The REL shall include hooks to make reference to privacy specification protocols such as P3P wherever possible.	DRM shall protect the privacy of end users. It shall allow the end user to control the dissemination of his private information and include hooks to make reference to privacy specification protocols such as P3P wherever possible. DRM shall allow end

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
DRM shall allow	10463	•	•	users to access the rights
consumers to access the	DRM shall allow end			and rules associated
rights and rules	users to access the rights			with a digital object.
associated with a digital	and rules associated			
object.	with a digital object.			
10102	10157			DRM shall support
DRM shall support	DRM shall not require			acquisition of rights and
acquisition of rights and	information that			rules associated with
rules associated with	identifies end users.			digital objects where the
digital objects where the				consumer's identity is
consumer's identity is				not required.
not known beyond the				
need for clearing the				
transaction. [3]				
	10110	10205		DRM shall support the
	DRM shall provide	The REL shall provide		transfer of a digital
	means for the sender	interoperability for the		object and its associated
	and receiver of a digital	management and		rights between
	object, regardless of	protection of rights		components made by
	their technology	associated with Digital		different technology
	providers, to	Objects across DRM		providers.
	interoperate with each other.	systems.		
[Ionothon Hohn]	10111	10234		DRM shall indicate the
[Jonathan Hahn] 10026	DRM shall have a trust			
Components shall have	architecture that enables	The REL shall support mechanisms to indicate		type and level of protection that each
levels of trust quantified	components to	types and levels of		component provides for
in an understandable	authenticate and	protection of Digital		digital objects and shall
manner.	determine the level of	Objects that rights		provide means for a
mamier.	protection offered by	expressions are		component to determine
	other components.	associated with. These		the type and level of
		mechanisms shall help		protection provided by
		ensure confidentiality of		another component.
		Digital Objects,		
		preventing unauthorized		
		access and use, and		
		assisting authorized		
		access and use without		
		adversely affecting the		
		user experience.		
	10113			
	DRM shall support self-			
	publishing by authors.			
	This support shall			
	include a range of			
	security options, among			
	which is the distribution			
	of unprotected works.			
	10115			
	DRM shall ensure that			
	an end user who			
	purchases one copy of a			
	digital object has rights			
	to use only one copy of			

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
•	the object at any time.	_	•	
	10123			
	DRM shall provide			
	means of distinguishing			
	versions of a literary			
	work.			
	10123.1			
	DRM shall provide			
	means of making			
	updated versions of a			
	literary work available			
	to end users.			
	10125			
	DRM shall allow			
	publishers to sell digital			
	objects to end users.			
[CMU Library]	10130	10274		DRM shall allow
10421	DRM shall allow	The REL shall support		libraries to lend digital
DRM shall allow	libraries to lend digital	specifying time-based		objects to end users and
libraries to lend digital	objects to end users.	lending and lending of		to designate the duration
objects to end users and		multiple copies subject		or expiration times of
designate loan periods.		to a pre-defined		the loans.
Loans may be analogous		condition.		
to loans of print books				
(i.e., the library can lend				
one copy of a digital				
object to only one				
person).				
[CMU Library]	[CNI]			When copyright expires
10422	10468			on a digital objects and
When copyright expires	DRM shall disable all			it legally moves into the
on a digital objects and	usage and replication			public domain, the
it legally moves into the	restrictions when a			digital object shall then
public domain, the	digital object enters the			be accessible by the
digital object shall then	public domain.			public. At this point,
be accessible by the				anyone shall be allowed
public. At this point,				to read, copy, and
anyone shall be allowed				convert the digital
to read, copy, and				object without paying a
convert the digital				fee to the (former)
object without paying a fee to the (former)				copyright holder, and without committing a
copyright holder, and				felony.
without committing a				iciony.
felony.				
[CMU Library]	10131	[EMEA]	[Jonathan Hahn]	DRM shall allow end
[CMO Library]	DRM shall allow end	10450.1	10031	users to make "fair use"
DRM shall allow end	users to make "fair use"	US and EU copyright	DRM shall comply with	of digital objects to the
users to copy, paste, and	of digital objects (as	law differs in relation to	the Digital Millennium	extent that "fair use" is
print small portions of	defined by U.S.	"fair use", and DRM	Copyright Act and allow	allowed by applicable
digital objects	copyright law).	shall not assume US fair	"fair use".	copyright laws. For
argitar objects	copyright law j.	shan not assume OB fall	rair asc .	copyright laws. Ful

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
commensurate with fair use of a printed book without paying a fee to the copyright holder. [fair use principle]		use provisions.	[CNI] 10465 DRM shall allow users to invoke fair use, perhaps with accountability to be able to obtain an unprotected version of a work for what they declare to be "fair use" purposes under copyright law, but perhaps with the requirement that they register with the rights holder that they have done so.	example, in some circumstances "fair use" may include copying and printing portions of a digital object, or it may include the right to obtain an unprotected version of the work upon completing a registration procedure.
[CMU Library] 10425.2 DRM shall support the "first sale" principle to the extent that "first sale" is supported by applicable copyright laws. For example, in some circumstances "first sale" may permit purchasers of digital objects to use them on multiple reading systems, resell them, lend them, or give them to others without paying a fee to the copyright holder or breaking any laws. [first sale principle]	[CNI] 10464 DRM shall allow digital works to function in the same way that physical works do (i.e., ability to loan, give away, resell, etc).			DRM shall support the "first sale" principle to the extent that "first sale" is supported by applicable copyright laws. For example, in some circumstances "first sale" may permit purchasers of digital objects to use them on multiple reading systems, resell them, lend them, or give them to others without paying a fee to the copyright holder or breaking any laws.
	DRM shall allow libraries to archive digital objects.	[CNI] 10469 DRM shall allow libraries and cultural heritage institutions to archive digital objects, if necessary bypassing usage and copying restrictions, and perhaps registering with the rights holder.		DRM shall allow libraries and cultural heritage institutions to archive digital objects.
	DRM shall make buying and borrowing electronic publications easier than buying and borrowing the			

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
	equivalent publications			
	in print.			
	10137		10372	DRM shall be
	DRM shall have		Consideration shall be	sufficiently efficient that
	sufficient performance		given to the efficiency	performance does not
	that buying and		of rights expressions.	have noticeable delays
	borrowing electronic			for end users and time-
	publications do not have			critical machine
	noticeable delays for the end user.			processing is not impaired.
	10141			impaned.
	DRM shall provide that			
	future versions are			
	backward compatible			
	with older versions.			
[MarkAny]	10145	10264		Preview or Promotional
10443	DRM shall provide	The REL shall support		<u>Models</u>
DRM shall support free	means for end users to	free preview of some		The REL shall support
preview of some portion	preview digital objects	portion of Digital		preview of the Digital
of a digital object.	before buying them.	Objects.		Object, in whole or in
				part, free or for
	10146			compensation.
	DRM shall provide			
	means for end users to			
	obtain refunds for			
	digital objects they			
	purchase, subject to			
	sellers' refund policies.			
	10151			
	The DRM trust			
	architecture shall not			
	require identification of			
	technology providers in			
	the specified data structures and protocols.			
	10152.2			
	Servers and clients shall			
	use public-key			
	infrastructure to			
	negotiate trust. Each			
	component shall present			
	a digital certificate,			
	which is part of a			
	certificate chain leading			
	to a trusted root certificate authority.			
	10153			
	DRM shall neither			
	preclude nor prescribe			
	specific public key			
	encryption algorithms			
	for creating or verifying			
	digital signatures used			

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
-	as authentication			
	certificates.			
	10155			
	Each component in the			
	exchange of a digital			
	object shall have a			
	certificate that identifies			
	the component's maximum level of trust.			
	10156		10325	Default semantics are
	Each component in the exchange of a digital object shall deny rights for the digital object unless the rights are explicitly granted.		Default semantics are required in the case when no Rights and Obligations expressions are currently applicable to a Digital Object. A mechanism to over-ride the default shall be made available in the REL.	required in the case when no Rights and Obligations expressions are currently applicable to a Digital Object. For example, each component in the exchange of a digital object shall deny rights for the digital object unless the rights are explicitly granted. A mechanism to overrride the default should be
[EMEA]	10158			made available in the REL. DRM shall not require
10453 DRM shall only mandate DRM technology which can be exported freely from one country to another.	DRM shall not require levels of encryption strength that would prevent components from being legally exported or imported.			levels of encryption strength or other technology that would prevent components from being legally exported from one country to another.
	Metadata for a digital object in the DRM context shall unambiguously identify a work for both supplier and recipient in a transaction.			
	Metadata for a digital object in the DRM context shall include at least the title and originator of the work.			
	Metadata for a digital object in the DRM context shall include enough information to allow a component that			

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
	receives the object to			
	process it correctly. For			
	a reading system for			
	electronic publications,			
	this information			
	includes the work's			
	content format and			
	information about how			
	the work is encrypted,			
	such as encryption			
	algorithm, method, and			
	key length.			
	10161		See 10372	
	Metadata that resides in			
	the license or voucher			
	for a digital object shall			
	be limited in size to			
	allow for efficient			
	transactions.			
	10162			
	DRM shall provide			
	means for associating a			
	digital object with large			
	bodies of metadata			
	about the object.			
	doodt the object.	10200, 10201	10330	The REL shall support
		The REL shall support	It shall be possible	the articulation of roles
		the articulation of roles	within the REL to	undertaken by Users.
		undertaken by Users.	identify users according	Example: User may be
		Example: An identified	to a role that they fulfill.	associated with the role
		User may be associated	to a role that they fulfill.	of "Illustrator" for an
		with the role of		identified Digital
		"Illustrator" for an		Object.
		identified Digital		Object.
		Object.		
		10202		
		The REL shall support		
		an open standard		
		identification system for		
		entities in the model.		
		Example: ISO TC46		
		SC9 identification		
		systems, open standards		
		based on the URI		
		standard (RFC2396)		
		10203, 10216		
		Creation Types		
		The REL shall support		
		the description of rights		
		associated with all types		
		of creations.		
		Note: This includes		
		abstractions,		
		expressions,		

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
-		manifestations and	-	
		artifacts.		
		Example: To support the		
		description of rights in		
		musical works,		
		performances of musical		
		works, sound recordings and physical sound		
		carriers.		
		10204	10419	Support Digital Object
		The REL shall enable	If the REL is to include	Usage/Business Models
		the description of rights,	business model	The REL shall enable
		permissions, conditions	definitions then it shall	the description of rights,
		and obligations to	accommodate all	permissions, conditions
		support existing usage	possible B2B business	and obligations to
		and business models and	models and	support existing usage
		shall not constrain	requirements.	and business models and
		future models.		shall not constrain
		10007	10202	future models.
		10207	10392	The REL shall support
		The REL shall support	Provision shall be made in the REL for	expression of permission by contract,
		expression of permission by contract,	contractual terms and	in a chosen language of
		which is not defined by	conditions to be	contract, which may be
		the copyright law.	specifiable according to	a formal XML-based
		Expression of rights,	a chosen language of	standard or informal
		which are not granted	contract (which may be	natural language.
		protection under	a formal XML-based	initial initiguage.
		copyright law, but are	standard or informal	
		granted protection under	natural language).	
		other laws, shall also be		
		supported. Example: In		
		order to take a picture of		
		an ancient artistic work,		
		authorization must be		
		given by the owner of		
		the work. Ownership of an ancient artistic work		
		with expired copyright		
		shall be described.		
		10208		
		<u>Definition of Terms</u>		
		The REL shall support		
		the separation of the		
		semantics from any		
		syntactical encodings.		
		Terms can be defined		
		with a formal definition,		
		name, comment and		
		usage notes.		
		Modeling of Dictionary		
		Terms		
		The REL shall allow		
<u> </u>	<u>I</u>	Dian will th	I	Ī.

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
		definition of abstract		
		and concrete elements		
		and shall allow for a		
		hierarchy of elements.		
		10211		
		Narrowing of Rights		
		The REL shall support		
		the expression of		
		narrowing of rights.		
		10212		
		Exclusive Rights		
		The REL shall support		
		the expression of		
		exclusive rights.		
		10213		
		Exceptions of Rights		
		The REL shall support		
		the expression of		
		exceptions to rights.		
		10214	[CNI]	The REL shall allow for
		Accessibility The DEL 1 House	10467	alternative usage
		The REL shall allow for	DRM shall	permissions or
		alternative usage	accommodate people	constraints for digital
		permissions or	with disabilities through	objects to meet the
		constraints for digital	such means as speech	needs of communities
		objects to meet the	synthesis and control	with special needs.
		needs of communities	over fonts and layout.	
		with special needs.		
		Machine Readable The REL shall be		
		machine-readable.		
		10199	10303	The REL shall be
		Extensible Model	Extensibility shall be	extensible and allow
		The REL shall provide	supported throughout	alternative schemas
		an extensible model that	the REL. Hooks shall	wherever sensible to
		clearly identifies how	be provided in the REL	meet the future needs of
		the core entities are	for the use of alternative	the digital content
		related.	schemas wherever	industry.
		10219	sensible, with suitable	
		The REL shall be	attributes to allow the	
		extensible to meet the	scheme to be identified.	
		future needs of the		
		digital content industry.		
		10220		
		Customizability		
		The REL shall be		
		customizable for		
		specialized applications		
		within the current		
		version of the language.		
		10221		
		<u>Interoperability</u>		
		The REL shall support		
	1	compression	l .	1

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
		interoperable DRM		
		services, such as		
		clearinghouse rights		
		authentication,		
		transactions processing,		
		and secure storage.		
		10222, 10228	10315	The REL shall provide
		The REL shall provide	The REL shall allow for	mechanisms to
		mechanisms to	Rights and Obligations	unambiguously and
		unambiguously and	expressions to be treated	universally identify
		universally identify	as Digital Objects in	rights expressions
		rights expressions	their own right.	written in the language
		written in the language,	_	and allow these
		as well as supply		expressions to be treated
		metadata information		as Digital Objects in
		about these rights		their own right.
		expressions.		
		10223		
		Authentication of Rights		
		Expressions		
		The REL shall allow for		
		authentication of		
		expressions and		
		documents written in the		
		language.		
		10224		
		Written in Open,		
		Standard Meta-		
		Language		
		The REL shall be		
		defined in an open,		
		standard meta-language.		
		10225		
		Well-Defined Semantics		
		The REL shall have		
		useful, concise,		
		unambiguous, and easily		
		understandable		
		semantics and		
		predictable effects.		
		10226		
		Governance		
		The REL shall be		
		specified, documented,		
		and otherwise managed		
		in a way that meets		
		general coordination		
		requirements of industry		
		standards.		
		10232		
		Digital Object		
		Collections		
		The REL shall provide		
		mechanisms to reference		

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
		collections of Digital		
		Objects.		
		10235		
		Digital Object		
		Availability		
		The REL shall support		
		standard mechanisms to		
		indicate where Digital		
		Objects are available for		
		retrieval or access.		
		10206, 10218	10388	The REL shall provide a
		Life Cycle of Digital	The REL shall provide a	set of default
		Objects	rich set of enumerations	mechanisms to express
		The REL shall support	(supported where	all essential types and
			` 11	
		all operations	necessary by structure in	modes of usage and
		throughout the entire	the REL) to describe	consumption of digital
		life cycle of digital	how Digital Objects	objects throughout their
		objects including	may be handled for	life cycles, including
		creation, publishing,	purposes such as	creation, publishing,
		distribution,	distribution and	distribution,
		consumption, and	consumption.	consumption, and
		invalidation/disposal.		invalidation/disposal.
		10236		
		Usage Rights expressed		
		in the REL shall cover		
		all essential types and		
		modes of operations and		
		activities that may		
		happen to Digital		
		Objects during their life		
		cycles. This shall		
		include at least the		
		following usage rights:		
		access, view, play, print,		
		copy, edit, loan, and		
		delete.		
		10237		
		Categorization of Rights		
		The REL shall enable		
		the organization of		
		Rights into categories.		
		10242		
		File Management Rights		
		The REL shall provide		
		mechanisms to express		
		file management Rights		
		to Digital Objects in		
		order to govern their use		
		across repositories or		
		directories. Examples		
		include: Delete, Verify,		
		Backup, Restore.		
		10243		
		Configuration Rights		

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
		The REL shall provide		
		mechanisms to express		
		configuration Rights for		
		the loading of software.		
		Examples: Install and		
		Uninstall.		
		10247	See 10354	
		Count Based Usage		
		The REL shall provide		
		mechanisms to specify		
		conditions based on the		
		number of times a right		
		can be exercised.		
		10248		
		Fee Based Usage		
		The REL shall support		
		the specification of fees		
		in industry standard		
		terms.		

The REL shall provide mechanisms to specify access control policies for users with proper credentials, identifiable systems and target devices in order to: Specify access control policies based on digital identities or certificates Specify access control policies based on defined roles of users, systems and devices. Specify access control policies based on possession of valid digital credentials
(e.g., certificates, receipts or tickets), which contain predetermined conditions

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
AAF Kequirement	E.BA Kequirement	Specify access control policies based on certified levels of security arrangement of repositories. Specify different access control policies for different rights on a work. Specify different access control policies for individual repositories, when exercising a right involves two or more repositories.	It shall be possible in the REL to identify users by the possession of a Token (or set of Tokens).	Onlinea Kequirement
		The REL shall provide mechanisms to specify information about portions of Digital Objects in order to support limiting rights to these certain portions.	It shall be possible to express rules about subcomponents of a Digital Object using both specific and general terms of reference such as any paragraph of text or specified fractions of the Object.	Portion Based Usage The REL shall provide mechanisms to specify information about portions of digital objects, including both identified portions and generic portions (such as "any 5 pages"), in order to support limiting rights to these certain portions.
		10255 Specification of Conditions Common to Different Rights The REL shall provide mechanisms to bundle		

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
		conditions and reference		
		the bundle as a single		
		entity.		
		10257		
		Specification of		
		<u>Obligations</u>		
		The REL shall provide		
		mechanisms to express a		
		set of obligations in		
		order to support		
		building and deploying		
		DRM solutions, systems		
		and services.		
		Examples are:		
		Watermarking, Usage		
FM and Amed		Tracking, Legal Notices		Wednesday
[MarkAny]		10259		Watermarking The PEL shell provide
10444 The system that		The REL shall provide		The REL shall provide
The system that		mechanisms to specify		mechanisms to specify
specifies rights shall provide watermarking		Digital Object watermarking		the application of a watermark to a Digital
information in		information in order to		Object.
multimedia content.		specify what		Object.
mutimedia content.		information is		
		to be embedded		
		in a watermark.		
		embed into		
		watermarks		
		information		
		known when a		
		work is		
		published (e.g.		
		title and		
		author) as well		
		as information		
		known only		
		when a work is		
		rendered (e.g.		
		user name or		
		printer name).		
		• specify the		
		types of		
		watermarks		
		that are		
		consistent with		
		Digital Object		
		media types.		
		Specification of Obligations Common to		
		Different Rights The REL shall provide		
		mechanisms to bundle		
		obligations and		
	1	Tourganous and	l .	

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
		reference the bundle as a		
		single entity		
		10262	10397.2	The REL shall support
		Unlimited usage (Pay an	The REL shall support a	specifying a price,
		<u>Upfront Fee)</u>	consumer's outright	including a price of
		The REL shall support	payment for unlimited	"free", for unlimited
		specifying a price,	allowed interactions.	usage of a digital object.
		including a price of		
		"free", for unlimited		
		usage, both in terms of		
		conditions and		
		obligations, and in terms		
		of a predetermined set		
		of rights.		
		10269		
		Component Based		
		Model The DEL shall support		
		The REL shall support		
		specifying different		
		rights, conditions and		
		obligations to individual components of a		
		composite work, as well		
		as to the entire		
		composite work.		
		10271		
		Site Licensing		
		The REL shall support		
		Digital Object access		
		and use under a site		
		license.		
		10276		
		Distributor Copies		
		The REL shall support		
		specifying a maximum		
		number of copies that a		
		distributor can make of		
		a work for further		
		transmission or sale.		
		10278		
		Nested Revenue Models		
		The REL shall support		
		specifying payments for		
		Digital Object usage in		
		terms of percentages of		
		previous transactions.		
		Example: Pay to B 2%		
		of how much is paid to		
		A.		
[Accessibility]				
10427				
ePublications shall				
enable any individual to				
exercise any rights				

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
granted regardless of				
ability or disability.				
Example: A user has the				
right to read an				
ePublication, but the				
reading system allows				
only rendering on a				
screen. A user who				
cannot read text on				
screen cannot exercise				
this right and must have				
access to an alternate				
means of reading				
(without broadening the				
right beyond reading).				
[Accessibility]				
10428				
DRM shall enable				
access technologies used				
by persons with				
disabilities to render				
content with a level of				
usability comparable to				
that provided to				
nondisabled end users.				
DRM shall not prevent				
the use of such				
technologies by persons				
with disabilities to				
exercise rights granted				
for an ePublication.				
[Accessibility]				
10430				
Persons with disabilities				
shall pay the same price				
for the same rights as				
persons without				
disabilities.				
[Accessibility]				
10435				
DRM shall allow trusted				
agencies to modify				
existing content for the				
purpose of enabling				
persons with disabilities				
to exercise the rights				
granted. Example: An				
agency might need to				
alter an audio				
publication to provide				
additional navigational				
features such as track				
announcements, page				
numbers, the				

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
bibliography, or the	EDA Requirement	CO Requirement	Redict's Requirement	omned Requirement
index.				
[MarkAny]				
10440				
DRM shall accept				
requirements from				
standardization				
activities, including				
MPEG IPMP, DOI,				
INDEC, W3C, cIDf, and				
others.				
[MarkAny]				
10441				
When two end users				
exchange a digital				
object, the rights to the				
digital object shall be				
exchanged along with the content.				
[MarkAny]				
10442				
DRM shall support end-				
user trades of digital				
objects and shall require				
users to identify				
themselves for tracking				
purposes.				
[EMEA] 10450				
DRM shall take into				
account recent EU				
legislation, specifically				
the "EU Directive on				
Certain Aspects of				
Copyright and Related				
Rights in an Information				
Society" (known				
generally as "the EU				
Copyright Directive"				
http://eurorights.org/				
eudmca/				
CopyrightDirective.html				
).				
[EMEA]				
10451				
DRM shall take into				
account the EU				
legislation on Data				
Protection, as given in				
the European Directive				
on Data Protection.				
[EMEA]				
10452				
DRM shall take into				
	I .	1	1	1

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
account the EU rules on			•	•
distance selling, as				
given in the Directive on				
the Protection of				
Consumers in respect of				
Distance Contracts. In				
the UK, this was				
enacted as the				
Consumer Protection				
(Distance Selling)				
Regulations 2000				
(http://www.hmso.gov.u				
k/				
si/si2000/20002334.htm				
). The Act specifies				
what has to be said				
about any product that is				
sold online, and the				
rights of the consumer				
to cancel the contract of				
purchase and be				
reimbursed.				
[EMEA]				
10454				
DRM systems shall not				
innately favor one				
national jurisdiction				
over another.				
[EMEA]				
10455				
DRM systems shall be				
able to identify content				
with sufficient precision				
in order to enable				
national laws on				
content, including laws				
protecting minors, to be enforced.				
enforced.			10300	
			The REL shall define a	
			minimal core set of	
			primitive constructs from which all other	
			expressions can be constructed or derived.	
			For example, instead of	
			defining per-per-view,	
			rent-to-own, and other	
			such models, the core	
			should provide the	
			fundamental building	
			blocks to link	
			obligations (e.g.,	
			payment) to actions, to	
<u> </u>	<u> </u>		payment, to actions, to	

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
			allow obligations to	
			repeat according to	
			various criteria, provide	
			metering syntax, etc.	
			[DJP: the whole	
			example above can	
			come out, as long as	
			those reading the	
			remaining requirement	
			can understand what we	
			need. I'm not sure they	
			can, so I've left it in for	
			now].	
			10301	
			The REL shall be	
			defined in terms of an	
			extensible core and a	
			default schema which	
			may be extended or	
			overridden on a local	
			basis.	
			10302	
			The core REL shall	
			contain only abstract	
			terms, with concrete	
			enumerations placed in	
			either the default or	
			alternative schemas.	
		??	10308	
			The REL shall allow for	
			the specification of a set	
			of Obligations that are a	
			consequence of	
			exercising a Right (or	
			set of Rights).	
		??	10309	
			The REL shall allow for	
			the specification of a set	
			of conditions that must	
			be fulfilled before a	
			Right (or set of Rights)	
			can be exercised.	
			10310	
			The REL shall allow for	
			the specification of a set	
			of obligations that must	
			be fulfilled in order.	
			10311	
			The REL shall allow for	
			the specification of a set	
			of rights that exist	
			according to a total or	
			partial sequence.	
			Transition between	
	1	1	Transition octwooli	

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
			rights in the sequence	
			may be triggered by	
			time-based or other	
			events.	
			10313	
			Rights expressions shall	
			allow for the	
			specification of	
			inheritance semantics to	
			define how rights are	
			transferred between	
			associated digital	
			objects.	
			10314	
			The REL shall be	
			sufficiently extensible to	
			allow for the description	
			of all possible models of	
			Rights and Obligations	
			transfer between Digital	
			Objects.	
			10316	
			Digital Objects shall	
			include all data types	
			both passive and	
			dynamic, including	
			infinite data streams and	
			application program	
			interfaces.	
			10321	
			An electronic contract	
			may wish to bind	
			together numerous	
			rights and data entities	
			in a relational manner.	
			Provision shall exist in	
			the REL to support this.	
			10322	
			It shall be possible to	
			construct a single rights	
			expression to apply to a	
			class of Digital Objects.	
			The REL shall therefore	
			support class-definitions	
			and affiliations.	
			10323	
			It shall be possible to	
			identify Digital Objects	
			according to their	
			attributes.	
			10326	
			Default semantics are	
			required in the case	
			when Rights and	

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
			Obligations expressions	
			are in conflict. A	
			mechanism for globally	
			over-riding the default	
			conflict-resolution	
			scheme shall also be	
			provided.	
			10328	
			It shall be possible in	
			the REL to identify	
			Digital Objects	
			according to fuzzy	
			matching criteria such	
			as "looks like" (with	
			respect to image data),	
			"sounds like" (with	
			respect to audio data),	
			etc. The Default	
			schema shall contain an	
			initial set of definitions	
			and enumerations of	
			such criteria.	
			10331	
			Provision shall be made	
			in the REL for the	
			formation of rights	
			expressions in terms of	
			attributes of the context	
			in which the Interaction	
			between users and	
			Digital Objects is taking	
			place.	
			10350	
			It shall be possible to	
			specify in the REL	
			alternative behaviors	
			that may be required of	
			user Interactions with	
			Digital Objects	
			according to the Context	
			of the Interaction.	
			Transition rules from	
			one behaviour to the	
			next may be predicated	
			upon the Context of the	
			Interaction (i.e.,	
			multiple paths should be	
			specifiable with the	
			actual transition path	
			determined	
			dynamically).	
			10333	
			The REL shall support	

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
			(possibly via	
			extensibility	
			mechanisms) arbitrarily	
			complex predicate logic.	
			10334	
			For full-flexibility, it	
			shall be possible to	
			specify in the REL	
			alternative predicate	
			expressions as per a	
			rule-based system.	
			10335	
			The REL shall support	
			the concept of	
			namespaces in all areas	
			where extensibility	
			might lead to name or	
			syntax clashes.	
			10336	
			A hierarchy of Data	
			Dictionary terms shall	
			be supported such that	
			local definitions may be	
			referenced within closed	
			communities. Default	
			and user-specified	
			augmentation and over-	
			ride semantics are	
			required.	
			10337	
			The REL shall provide	
			facilities to reference	
			Data Dictionary	
			definitions from any	
			source including	
			dynamic sources such as	
			LDAP directories and	
			relational databases	
			which may require	
			dynamic resolution.	
			10339	
			Data Dictionaries are	
			Digital Objects and shall	
			therefore be subject to	
			Rights and Obligations	
			constraints.	
			10342	
			Support shall be given	
			for mechanisms by	
			which Rights and	
			Obligations may be	
			revoked during their	
			lifetime.	
			10343	
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AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
			Support shall be given	
			for mechanisms by	
			which Rights and	
			Obligations may be	
			updated during their	
			lifetime.	
			10344	
			Support shall be given	
			for mechanisms by	
			which Rights and	
			Obligations may be	
			renewed once their	
			lifetime has expired (or	
			have been otherwise	
			revoked).	
			10345	
			The REL shall provide	
			for cases where Rights	
			and Obligations require	
			update or renegotiation	
			when specified trigger	
			conditions are met.	
			10346	
			The REL shall provide a	
			means for indicating	
			that a Rights and	
			Obligations expression	
			should be validated by a	
			dynamic (online)	
			mechanism.	
			10347	
			In addition to temporal	
			constraints on the	
			lifetime of rights and	
			obligations expressions,	
			arbitrary trigger	
			conditions shall be	
			allowed to expire an	
			expression.	
			10349	
			If a rights set denies	
			access to one class of	
			data, the REL shall	
			allow a publisher to	
			specify another class of	
			data to which the rights	
			apply. The REL shall	
			support metadata for	
			processing by rendering	
			tools, or rights	
			enforcement engines.	
			10351	<u> </u>
			The REL shall provide a	
			mechanism for	
			mechanism 101	<u> </u>

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
			specifying that the	
			details of Rights and	
			Obligations expressions	
			are private and	
			exclusive to the subjects	
			of those expressions.	
			10352, 10414	
			The REL shall provide a	
			mechanism for defining	
			the Obligations	
			incumbent upon value	
			chain participants with	
			respect to their	
			maintaining the privacy	
			of terms and conditions.	
			10353	
			The REL shall make it	
			possible for specific	
			Expression Evaluation	
			Services to be	
			nominated for the	
			evaluation of Rights and	
			Obligations expressions.	
			10354	
			It shall be possible to	
			define stateful as well as	
			stateless Rights and	
			Obligations expressions. 10355	
			The REL shall allow the	
			specification of	
			minimum levels of	
			Quality of Service to be	
			met by downstream	
			distributors of content.	
			10356	
			It shall be possible to	
			specify a minimum level	
			of trust to be established	
			between a distributor of	
			content and a consumer	
			before the distributor is	
			permitted to deliver the	
			content to the consumer.	
			10357	
			The REL shall provide	
			syntax via which	
			publishers can insist that	
			data delivered to a	
			recipient at any stage in	
			a distribution chain be	
			marked in some manner	
			to identify the recipient.	
			10359	

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
			Limitations on	
			intermediate caching	
			servers shall be	
			specifiable in the REL.	
			10360	
			It shall be possible to	
			specify in the REL the	
			manner in which content	
			is to be used, such as by	
			the application of style	
			guides and templates to	
			define "look and feel".	
			10361, 10408	
			It shall be possible to	
			specify in the REL a	
			particular mechanism	
			for determining whether	
			or not an application is	
			trustworthy.	
			10364	
			The REL shall make	
			provision to describe	
			requirements on	
			distributors and other	
			value-chain participant	
			for branding content.	
			Metadata constructs for	
			describing the branding	
			material (e.g., logos etc)	
			are required.	
			10365	
			The REL shall allow for	
			required	
			acknowledgements to be	
			specified as a	
			consequence of using	
			data.	
			10366	
			The REL shall make	
			provision to describe	
			requirements on all	
			participants in the value	
			chain (including	
			rendering tools used by	
			the end-consumer) on	
			the placement of legal	
			notices alongside	
			content.	
			10367, 10368, 10398	
			Provision shall be made	
			in the REL so that	
			content originators can	
			specify on their	
			downstream partners the	

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
			requirement for fair	
			delivery schedules,	
			including time windows	
			for delivery or release of	
			content at specific times.	
			10369	
			It shall be possible to	
			specify in the REL	
			minimum bandwidth to	
			be operated by	
			downstream distributors	
			and channel partners	
			when they are	
			responsible for	
			downstream real-time	
			data delivery.	
			<u> </u>	
			10371	
			It shall be possible to	
			identify Digital Objects	
			within data streams	
			according to attributes	
			of the content within the	
			stream.	
			10374	
			It shall be possible to	
			express restrictions on	
			the formation of queries	
			according to the age of	
			data being retrieved	
			from historical data	
			sources.	
			10375	
			It shall be possible to	
			express restrictions on	
			the execution of queries	
			according to the load	
			imposed on a server.	
			10376	
			It shall be possible to	
			express restrictions on	
			records retrieved from	
			an interface according to	
			attributes of the records	
			being returned.	
			10377	
			It shall be possible to	
			express restrictions on	
			what data elements may	
			be retrieved from an	
			interface.	
			10378	
			The REL shall support	
			the specification of	
			allowed (or disallowed)	

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
			media via which content	
			may be delivered.	
			10379	
			The REL shall provide	
			syntax via which a	
			publisher can contract	
			with consumers to limit	
			the purpose for which	
			(and "real world"	
			context in which) the	
			content may be	
			consumed.	
			10380	
			It shall be possible	
			within the REL to	
			describe liability	
			incumbent upon value	
			chain participants if they	
			agree to Interact with	
			Digital Objects in a	
			particular fashion.	
			10383	
			The REL shall provide	
			syntax for rules defining	
			how Agents may alter	
			Digital Objects	
			subsequent to	
			publication.	
			10384	
			The REL shall allow for	
			rules governing the	
			manner in which	
			annotations may be	
			added to an original	
			Object. It shall be	
			possible for the rules to	
			describe how	
			annotations are	
			presented and	
			distinguished from the	
			original content.	
			10386	
			It shall be possible to	
			state in the REL rules	
			for how a Digital Object	
			may be retained for	
			future use. The access	
			context may be different	
			for a Digital Object	
			accessed directly from	
			an authorised supply	
			mechanism than it is for	
			the same object	
			accessed from an	

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
			Agent's local store. The	
			context may alter	
			merely because the	
			Object is retained in a	
			local store or be	
			dependent upon criteria	
			such as the number of	
			accesses previously	
			made to the retained	
			object or the time for	
			which it is retained.	
			10390	
			It shall be possible	
			within the REL to	
			specify rules regarding	
			how a Digital Object	
			may be referenced by	
			other Digital Objects.	
			10391	
			The REL shall provide	
			syntax for the	
			expression of Rights and	
			Obligations describing	
			which parties may	
			converse with each	
			other within a	
			transactional (or other)	
			system (the system	
			being identified as a	
			Digital Object), and	
			limitations on the nature	
			of the conversations.	
			10393	
			The REL shall provide	
			syntax for specifying	
			that (and the method by	
			which) a publisher	
			requires explicit	
			acknowledgement of	
			contractual terms before	
			access to an Object is	
			granted.	
			10394	
			The REL shall make it	
			possible to list explicit	
			contractual terms (i.e.,	
			Rights and Obligations)	
			that each require explicit	
			acknowledgement.	
			10395	
			The REL shall make	
			provision for multi-party	
			contracts.	
			10396	
			10390	

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
			A special case of	
			contract establishment is	
			one which requires a	
			value-chain participant	
			to seek explicit	
			permission for each and	
			every use of a Digital	
			Object. The REL shall	
			provide a method for	
			describing this case and	
			all its attributes.	
			10402	
			It shall be possible	
			within the REL to	
			predicate expressions on	
			any environmental	
			elements and attributes	
			that can be uniquely	
			identified within the	
			syntax and definitions of	
			the REL.	
			10404	
			It shall be possible to	
			specify a trusted entity	
			by reference to a trusted	
			third party according to	
			some established path or	
			chain of trust. The	
			standard shall not	
			assume any particular	
			technology or method	
			for specifying chains of	
			trust.	
			10405, 10406	
			It shall be possible to	
			specify that time-based	
			constraints within a	
			rights expression can be	
			satisfied <i>only if</i> a trusted	
			time-service is used to	
			validate the current date	
			and time and to specify	
			what constitutes a	
			trusted time-service.	
			10409	
			It shall be possible	
			within the REL to	
			specify a trusted	
			environment within	
			which both trusted and	
			untrusted applications	
			are allowed to interact	
			with Digital Objects.	
			10410	

AAP Requirement	EBX Requirement	CG Requirement	Reuters Requirement	Unified Requirement
			The REL shall allow	
			stakeholders to be able	
			to specify how	
			downstream	
			stakeholders construct	
			audit trails.	
			10411	
			The methods by which	
			stakeholders	
			authenticate shall be	
			specifiable as	
			constraints within the	
			REL.	
			10415, 10416, 10417	
			The REL shall make it	
			possible to specify	
			confidentiality clauses	
			that require downstream	
			contributors to respect	
			the confidentiality of the	
			source of the content or	
			of organizations.	