Mr. Pedro Ortún

Director

Directorate I: Basics & Design Industries, Tourism, IDABC

Directorate General Enterprise

European Commission

15 February 2005

Re: European Interoperability Framework

Dear Mr. Ortún:

The Business Software Alliance (BSA) respectfully invites you to consider its responses to the European Interoperability Framework for Pan-European eGovernment Services (EIF).

BSA strongly supports the Commission's efforts to bring the benefits of eGovernment to European citizens and shares its goals of promoting interoperability across government agencies. BSA has substantial concerns, however, that the EIF's definition of "open standards", if adopted as proposed, would exclude many critical and well-established technologies that are implemented on the basis of accepted open standards. These include standards such as **ebXML** (an XML specification for e-commerce, maintained by OASIS), **GSM** (maintained by ETSI), **SNMPv3** (an updated version of the widely deployed Simple Network Management Protocol, maintained by IETF), **802.1X** (a leading wireless network access control specification, maintained by IEEE), and **DHCP** (Dynamic Host Configuration Protocol, for transferring information on network, maintained by IETF), as well as countless other leading standards that are incorporated into IT products on the market today.[1]

BSA also believes the EIF confuses the distinct concepts of open standards and open-source software and could be read to support procurement preferences for such software.

[1] Attachment A summarizes key provisions of the IP policies of several major IT standards bodies and highlights potential inconsistencies between these policies and the EIF definition. Attachment B identifies several standards that are commonly viewed as open yet which do not appear to satisfy the EIF definition.

Open Standards and Interoperability

BSA's primary concern is that the EIF's definition of "open standards" is inconsistent in important respects with the policies and practices of many major international standards bodies and thus might substantially restrict the ability of European governments to procure IT products that implement widely used standards. Specifically:

- ***The requirement that a standard be "irrevocably available on a royalty-free basis" is inconsistent with the policies of most recognized standards bodies.*** Most major standards bodies—such as ETSI, ECMA International, the European Committee for Standardization (CEN), the IEEE, the ISO, the IEC, the IETF, and the ITU—permit standardization of technologies that include innovations subject to patents ("essential" patents) so long as the patent owner agrees to license the essential patent claims to implementers of the standard on reasonable and non-discriminatory (RAND) terms.[2] Such RAND terms may include payment of a reasonable royalty. More specialized standards-setting consortia in the IT industry have adopted similar licensing policies.[3] This longstanding practice is based on the recognition that RAND licensing appropriately balances the legitimate rights of patent owners, who contribute innovative technology to the standard, with the interests of implementers who wish to obtain access to essential patents on reasonable terms. Governments like other users may, of course, have valid reasons to want to select royalty-free standards in certain instances, and some standards bodies have adopted licensing policies that either permit or in certain circumstances require royalty-free RAND licensing.[4] Nonetheless, given that many standards bodies *do* permit royalty-bearing licenses, the EIF definition might prevent European governments from using the best available technology solutions.
- ***The requirement that standards licenses be "irrevocable" and impose no constraints on "re-use" of the standard is inconsistent with the licensing policies of every major standards organization, including those that require royalty-free licensing.*** Even where a patent owner agrees to license its technology on a royalty-free basis, such licenses typically allow for additional conditions such as limitations on "re-use" of the technology, and reservation of the patent owner's right to revoke the license under certain limited circumstances. Indeed, such RAND-consistent terms are permissible under the patent licensing policy of every major international standards organisation of which the

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[2] The European Commission itself has recognised the appropriateness of a RAND-based approach in its recommendation that all European standards organisations ensure "that any intellectual property rights (IPRs) that [standards] might contain can be used by market operators on fair, reasonable and non-discriminatory terms." *General Guidelines for the Cooperation Between CEN, CENELEC and ETSI and the European Commission and the European Free Trade Association*, 2003/C 91/04 at 91/11 (28 March 2003). As a result, many technologies that have been standardized by these European organizations require payment of reasonable royalties to owners of essential patents, while also ensuring that the terms on which patents are licensed are reasonable and free from discrimination.

[3] These include OASIS, WS-I, the Liberty Alliance, UPnP, Bluetooth, MPEG-LA, the Digital Video Broadcasting (DVB) project, and the Open Mobile Alliance (OMA), among many others.

[4] The W3C has adopted a royalty-free licensing policy, and OASIS recently adopted a licensing policy that allows its Technical Committees to select royalty-free licensing in some scenarios. Both the W3C and OASIS licensing policies, however, permit owners of essential patents to impose field-of-use and other RAND restrictions, and the W3C policy allows patent owners to charge royalties if certain procedures and decisions are undertaken. *See* W3C Patent Policy, §§ 4, 7 (available at http://www.w3.org/Consortium/Patent-Policy-20040205/); OASIS Intellectual Property Rights Policy, § 10 (available at http://www.oasis-open.org/who/intellectualproperty.php).

BSA is aware, including that of the W3C. Common RAND licensing restrictions include the following:

- ***Field-of-use clauses.*** Nearly all recognized standards bodies allow licenses that limit the field of use to products that fully comply with the standard. Field-of-use clauses not only promote broad industry participation, but also are consistent with the goal of promoting interoperability (as non-compliant implementations will normally frustrate rather than advance interoperability).
- ***Restrictions on sublicensing.*** Restrictions on sublicensing reinforce field-of-use limitations and reciprocal clauses, and facilitate the enforcement of licensing terms, including that all licensees enjoy RAND terms. The requirement that RAND licenses be non-discriminatory ensures that interested sublicensees can always obtain a license directly from the patent owner.
- ***Reciprocal licensing clauses.*** Reciprocity clauses typically require licensees to agree to license certain of their own patents to the licensor (and possibly to other licensees) under equivalent terms. These clauses ensure that a licensee cannot block the licensor or other standards implementers from competing with the licensee in marketing products that use the standardized technology. It also ensures that a licensor is not put in a worse situation just because it licensed its patents in the standard.
- ***Defensive suspension clauses.*** Defensive suspension clauses allow the licensor to revoke the license if the licensee sues the licensor for infringement of the licensee's own patents. These clauses ensure that licensees cannot use litigation to block competition by the licensor, and thus, as with reciprocal licensing clauses, prevents a licensor being put in a worse situation just because it licensed its patents in the standard.

- ***As a general matter, it should be recognized that standards organizations' IP policies should not be overly restrictive so as to serve as a disincentive to patent holders' participation in standards-setting processes.***

Open Source Software

BSA also has concerns with statements in the EIF regarding open-source software (OSS). First, the EIF mistakenly equates open standards and OSS. An open standard is a technical specification that has certain qualities and is made available to the public on a non-discriminatory basis. Open source, by contrast, refers to a specific software development and/or licensing model. While an open standard is a technical *specification*, OSS is software that may be used to *implement* an open standard in a particular product. Whether a standard qualifies as "open", however, has nothing to do with the development and licensing model of the software used to implement that standard. In fact, open standards are neutral with regard to software development and licensing models—welcoming all models and favoring none—so it is equally feasible for an open standard to be implemented in proprietary software as in OSS.

BSA would like to reiterate that public procurement policies should be neutral with respect to commercial or open source software offerings. The EIF's statement that OSS products be "considered favourably" with respect to proprietary alternatives is ambiguous in this regard. As BSA noted in its March 2004 response to an earlier draft of the EIF:

> "Interoperability in eGovernment and elsewhere can best be achieved through vigorous competition among many different technology providers and through consumers exercising free choice among the resulting products. This approach ensures that technology providers have the incentive to produce the best products for the market—which in turn means broader consumer choice among many innovative technologies.
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> "[R]ather than allowing public sector entities to choose the eGovernment solution that best serves their needs, the EIF appears to favour technology solutions developed under an open source model, regardless of whether these solutions are best matched to needs. . . . We believe such preferences will be counter-productive.
>
> "The private sector has created numerous interoperable systems and components. While some of these are based on open source software, others are not. Governments should be free to exercise discretion in selecting which solution best serves their needs."

Recommendations

1. Proposed Definition of "Open Standards"

BSA would respectfully urge the EIF to endorse the following definition of "open standards", one that would avoid the shortcomings in the EIF's current definition described above:

> *(1) Open standards are published without restriction (e.g., potential implementers are not restricted from accessing the standard) in electronic or tangible form, and in sufficient detail to enable a complete understanding of the standard's scope and purpose;*
>
> *(2) Open standards are publicly available without cost or for a reasonable fee for adoption and implementation by any interested party;*
>
> *(3) Any patent rights necessary to implement open standards are made available by those developing the specification to all implementers on reasonable and non-discriminatory (RAND) terms (either with or without payment of a reasonable royalty or fee); and*
>
> *(4) Open standards are regularly developed, maintained, approved, or ratified by consensus, in a market-driven standards-setting organization that is open to all interested and qualified participants. Standards can also develop by consensus in the marketplace.*

In contrast to the current EIF definition, this definition of open standard is consistent with the policies of ITU, ECMA, ETSI, ANSI, ISO, IEC, IETF, OASIS, W3C, and other major standards organizations, as well as with the hundreds of well-known and universally deployed standards they have produced. The definition set forth above would therefore foster the EU's goals of enhancing interoperability and technological innovation both within Europe and between European and other countries.

It is also important to emphasize that, while "open" standards promote interoperability, other types of mechanisms may be equally essential in doing so. Such mechanisms include interoperability tools, the publication of proprietary protocols and interfaces for third-party use, and standards developed through a range of processes whose specifications are published and which are licensed on RAND or royalty-free terms. The EIF should afford governments the flexibility to utilize the full range of standards and interoperability mechanisms if the particular circumstances justify doing so. The ultimate test of a successful standard is not its method of development, but its exploitability and whether it solves the identified problem. The marketplace often provides the best evidence of the effectiveness of a standard, specifically whether the standard is widely adopted, ideally via multiple, independent implementations.

2. Proposed Approach to Open Source Software

BSA would also respectfully recommend that the EIF replace its current statements regarding OSS (specifically, the last bullet on page 8) with a statement encouraging the adoption and implementation of software procurement policies that are neutral with respect to technologies, development platforms and licensing models. Procurement policies that are based on reasonable, objective criteria, such as interoperability, security, and value for money, are not only consistent with the goal of interoperability, but also maximize competition, innovation, and consumer choice.

Conclusion

If the current EIF definition of "open standard" were adopted, policies of most leading international standards bodies (such as ECMA, ETSI, ISO, IEC, IETF, ITU, OASIS, and those accredited by ANSI) would not qualify as open, and numerous standards that have been developed by these bodies and widely deployed in the marketplace could be rejected by European governments. This would have significant negative implications for European innovation and would undermine the EIF's goal of fostering interoperability. By contrast, the alternative definition of "open standards" proposed above is consistent with the policies of all major standards organizations and hence with the many well-known and universally deployed standards they have produced. This alternative definition, along with a neutral software procurement policy, will foster greater European interoperability and innovation and help establish Europe as a global technology leader.

BSA appreciates your consideration of these comments and recommendations and commends the IDA for the great amount of effort that has gone into this project. BSA stands ready to further contribute to revising the EIF to respond to the comments set forth above, and to engage fully and collaboratively with the IDABC and other EU bodies to promote the goal of interoperability, including by leveraging the benefits of open standards.

B. Müller

Benoît Müller
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cc: Mr. Bernhard Schnittger, acting Head of Unit, IDABC

ATTACHMENT A

IP POLICIES OF SAMPLE STANDARDS ORGANIZATIONS (NOTING POTENTIAL INCONSISTENCIES WITH EIF DEPENDING ON HOW IT IS INTERPRETED)

Standards organization	Copyright Policy: Limits on copying/distribution/modification of the specifications?	Patent policy; RAND licensing?	Patent policy: Royalty-free licensing required?
American National Standards Institute (ANSI)	Yes	Yes	No
CableLabs (OpenCable)	Yes	Yes	No
Digital Video Broadcasting Project (DVB)	Yes	Yes[5]	No
European Committee for Standardization (CEN)	Yes	Yes[6]	No
ECMA International	Yes	Yes	No
European Telecommunications Standards Institute (ETSI)	Yes	Yes[7]	No
GlobalPlatform	Yes	Yes	No
Institution of Electrical and Electronics Engineers (IEEE)	Yes	Yes	No
International Organization for Standardization (ISO) / International Electrotechnical Commission (IEC) Joint Technical Committee (ISO/IEC JTC1)	Yes	Yes	No
International Telecommunication Union (ITU)	Yes	Yes	No
Internet Engineering Task Force (IETF)	Yes	Yes	No
The Open Group (formerly Directory Interoperability Forum)	Yes	Yes	No
Organization for the Advancement of Structured Information Standards (OASIS)	Yes	Yes	No
World Wide Web Consortium (W3C)	Yes	Maybe	Yes[8]

[5] Non-exclusive, non-transferable, world-wide licenses on RAND terms; third party to submit an equivalent undertaking.

[6] RAND to entire world required or standard may be withdrawn.

[7] RAND, but standard may be adopted even if patentee refuses to license.

[8] While the W3C patent policy generally requires royalty-free licensing, it also allows a patent holder to refuse to license its essential patents by making timely disclosures of them, and also allows for the inclusion of RAND-based technologies in W3C standards in certain circumstances. *See* Sections 4 and 7 of the W3C Patent Policy (available at http://www.w3.org/Consortium/Patent-Policy-20040205/).

ATTACHMENT B

EXAMPLES OF STANDARDS WIDELY USED TO ACHIEVE INTEROPERABILITY (NOTING POTENTIAL INCONSISTENCIES WITH EIF DEPENDING ON HOW IT IS INTERPRETED)

Standard	Maintained by Non-Profit	Available Free of Charge or Nominal Fee?	Copy and Distribute at no or nominal fee?	Patents irrevocably available royalty-free?	Free from constraints on Re-Use?
XrML	No[9]	Yes	No	No (RAND)	No
ebXML	Yes (OASIS)	Yes	Yes	No (RAND)	No
3GPP	Yes (ETSI)	Yes	No	No (RAND patent pool)	No
DVB MHP[10]	Yes (ETSI)	Yes	No	No (RAND)	No
GSM	Yes (ETSI)	Yes	No	No (RAND)	No
SNMPv3[11]	Yes (IETF)	Yes	Yes	No (RAND)	No
XML Configuration Access Protocol[12]	Yes (IETF)	Yes	Yes	No (RAND)	No
DHCP[13]	Yes (IETF)	Yes	Yes	NO (RAND)	No
IEEE 802.1X[14]	Yes (IEEE)	Yes	No	No (RAND)	No
WLAN[15]	Yes (IETF)	Yes	Yes	No (RAND)	No
IEEE 1394[16]	Yes (IEEE)	Yes	No	No (RAND)[17]	No
MPEG-2	Yes (ISO)	No	No	No (RAND)	No

[9] Currently maintained by ContentGuard, but being reviewed for standardization by OASIS & MPEG.

[10] Digital Video Broadcasting, Multimedia Home Platform.

[11] Simple Network Management Protocol Version 3.

[12] See Nokia Statement on Patent Licensing (available at http://www.ietf.org/ietf/IPR/NOKIA); Nokia's Statement About IPR Claimed in draft-ietf-scon-cpcp-xcap-00 (available at http://www.ietf.org/ietf/IPR/nokia-ipr-draft-ietf-xcon-cpcp-xcap-00.txt).

[13] Dynamic Host Configuration Protocol.

[14] Port based network access control for wireless access.

[15] See Telecom Italia's Statement About IPR Related to WLAN Access (available at http://www.ietf.org/ietf/IPR/telecom-italia-ipr-wlan-access.txt).

[16] High speed data transfer.

[17] Portfolio license with flat fee of $0.25/device, available through MPEG LA.

AVC/H.264[18]	Yes (ISO)	No	No	No (RAND)	No
MPEG-4[19]	Yes (ISO)	No	No	No (RAND)	No
OMA DRM 2.0[20]	No (Open Mobile Alliance)	Yes	Yes	No (RAND)[21]	No
Liberty Alliance 1.0 (ID-FF 1.0)[22]	No (Liberty Alliance)	Yes	No	Maybe[23]	No

[18] Also ISO/IEC IS 14496-10; audio-video format.

[19] Also ISO/IEC 14496-2:2001 [Part 2 Visual dated 2001-12-01], 14496-2:2001/Amd.1:2002 [Studio profile dated 2002-02-01], or 14496-2:2001/Amd.2:2002 [Streaming video profile dated 2002-02-01].

[20] DRM for mobile devices.

[21] MPEG LA has issued a call to form a new patent pool.

[22] And ID-WSF Interaction Service v1.0; identity for web services.

[23] Royalty-free by default, but RAND as alternative; RAND Reservations by various parties, *see, e.g.*, Necessary Claims Disclosure Notices By Citigroup, Inc. (available at http://www.projectliberty.org/specs/Citigrouptable.php) and Sony Corporation (available at http://www.projectliberty.org/specs/Sonytable.php).