

November 29, 2006

### VIA FEDEX

The Honorable Thomas O. Barnett Assistant Attorney General U.S. Department of Justice 950 Pennsylvania Avenue NW Washington DC 20530

### Re: IEEE-SA Request for Business Review Letter

Dear Mr. Barnett:

The Institute of Electrical and Electronics Engineers, Inc. (IEEE) and its Standards Association (IEEE-SA) request, pursuant to 16 C.F.R. § 50.6, a Business Review Letter concerning proposed revisions to the IEEE-SA's Patent Policy. Exhibit A contains the current policy. Exhibit B contains the proposed new policy.

#### I. Background

The IEEE is a New York not-for-profit organization as described in section 501(c)(3) of the Internal Revenue Code of 1986, and it is the world's leading professional association for the advancement of technology. The IEEE has well over 350,000 members from across the globe.

The IEEE-SA is an operating division of the IEEE,<sup>1</sup> and it is the leading developer of global industry standards in a broad range of electro-technical subjects, including: power and energy, biomedical and healthcare, information technology, telecommunications, transportation, nanotechnology, and information assurance. For over a century, the IEEE-SA has offered an established standards development program based on balance, openness, due process, and consensus. The IEEE-SA is accredited by the American National Standards Institute (ANSI).

#### A. The IEEE-SA and Standards Development

The IEEE-SA has essentially two types of standards-development processes. First, the IEEE-SA has traditionally operated an individual-based process. In this program, the entire process is open to any individual who wants to participate (although acquisition or maintenance of voting privileges can be subject to minimum-participation requirements), and the process works on the principle of one-person / one-vote. Second, for approximately the last four years the IEEE-SA has also operated a

<sup>&</sup>lt;sup>1</sup> The IEEE-SA as it now exists, was formed circa 1998, but the standards activities that it oversees have been conducted under IEEE auspices for many years. For convenience, this letter will use "IEEE-SA" to refer to all IEEE standards activities.

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corporate-based program. Standards development groups in this program operate on the principle of one-corporation / one-vote and are open to materially interested corporations and other entities, e.g., educational institutions and government agencies. Using these processes, the IEEE-SA conducts over 200 standards ballots every year, through which proposed standards are voted upon for technical validity, completeness, and soundness. IEEE-SA thrives because of the technical diversity of its 20,000 plus participants, consisting of technology leaders from around the globe, including individuals in corporations, organizations, universities, and government agencies.

### B. IEEE-SA and Its Patent Policy

The IEEE-SA seeks to produce standards that any willing implementer can use and that will become widely adopted. With the increasing prevalence and scope of patents and the potential for their inclusion in standards, a number of years ago the IEEE-SA modified its patent policy to explicitly permit the inclusion of patented technology in certain circumstances. The IEEE-SA seeks to become aware of potentially essential patents through inquiry to all participants in its working groups. Currently, at the beginning of each and every working group meeting, the chair displays a slide set that states the IEEE-SA's patent policy,<sup>2</sup> and he or she invites every participant to identify or disclose the holders of patents that the working group member believes may be essential for the use of the standard under development. The IEEE-SA expects that working group members will act in good faith and disclose any patents that potentially might prove essential or identify any persons who might hold potentially essential patents.

Once a working group participant discloses a potentially essential patent or identifies a possible holder of such patent, the working group chair will ask the holder about the holder's intentions. The IEEE-SA policy currently permits the known use of essential patents (and patent applications), but only if the IEEE receives the patent holder's or applicant's assurance that either (a) the patent holder or applicant will not enforce any of its present or future essential patent(s) against any person complying with the standard; or (b) the patent holder or applicant will make available a license for such implementation without compensation or under reasonable rates, with reasonable terms and conditions that are demonstrably free of any unfair discrimination (RAND). This assurance is irrevocable once submitted and accepted and shall apply, at a minimum, from the date of the standard's approval to the date of the standard's withdrawal. While the IEEE-SA cannot compel a patent-holder to provide an assurance (or indeed even to respond to the request), the absence of an assurance is a factor that the IEEE-SA will take into account when considering whether to approve the draft standard.

The difficulty with the current policy is that a RAND commitment is inherently vague. It can lead to expensive litigation whose cost and risk can impede the adoption

<sup>&</sup>lt;sup>2</sup> Exhibit C contains a set of slides currently used in IEEE-SA standards development meetings.

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of a socially valuable standard.<sup>3</sup> Even where a license negotiation does not result in litigation, the ex post negotiation of license terms (that is, negotiations occurring after a technology's inclusion in a standard has increased the patent-holder's market power, potentially to the point of monopoly) can lead to higher royalty payments and ultimately higher prices to consumers.

#### 1. Process of Revision

In April 2005, the IEEE-SA began to consider certain revisions to its patent policy that have culminated in the policy described in this letter. This process began in the Spring of 2005 when several companies approached the IEEE-SA with a proposal to revise its patent policy to permit ex ante disclosure of license terms.

The IEEE-SA considered the original proposal and other options at great length and in a very public forum. All proposals were publicly available on the IEEE-SA website. The IEEE-SA's Patent Committee ("PatCom") conducted a series of six guarterly public meetings that dealt with the topic of revising the IEEE-SA patent policy. PatCom invited public comment at its meetings, and individuals addressed all sides of the issues. After PatCom determined in a public meeting the revisions that it wished to pursue, the PatCom chair appointed a core drafting committee to reduce the principles to specific documents appropriate for the IEEE-SA. The results of the core drafting committee's work were provided to an extended drafting committee that included representatives who had divergent views on the principles of the proposed revision but were all willing to help improve the language implementing those principles. The output from the extended drafting committee was then made available for public comment. Dozens of companies and individuals offered hundreds of comments, which PatCom considered at its September 12, 2006 meeting. After resolving the comments, PatCom recommended approval of the policy. On September 15, the proposed revisions to the patent policy were presented to the IEEE-SA Standards Board, which has now voted via letter-ballot recommending approval of the proposal. The policy portion of the proposal (i.e., the Bylaws revision, which states the basic policy) will be submitted to the IEEE-SA Board of Governors on or before its December 2, 2006 meeting. If approved at that level, the policy will take effect on January 1, 2007 subject to any other timing, terms or conditions the Board of Governors may choose to include.

<sup>&</sup>lt;sup>3</sup> See, e.g., FTC Chairman Deborah Platt Majoras, Recognizing the Procompetitive Potential of Royalty Discussions in Standard Setting (Sept. 23, 2005), *available at* <u>http://www.ftc.gov/</u> speeches/majoras/050923stanford.pdf ("Experience has shown, however, that some agreements on RAND rates can be vague and may not fully protect industry participants from the risk of hold up.").

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### 2. Substance of Proposed Revision

The revision has three key elements. First, it will permit and encourage the optional and unilateral ex ante disclosure of royalty rates and other license terms.<sup>4</sup> These disclosures will be made available on the IEEE-SA website, and interested parties will be permitted to make copies available at working group meetings, but discussion of the specific terms of the disclosure cannot occur at IEEE-SA standards development meetings. The disclosed terms will be the maximum that the patent holder will charge; nothing will prevent the patent holder from offering different terms, as long as they are at least as advantageous to the proposed licensee. IEEE-SA itself will take no position on the reasonableness of the disclosed terms (and will in fact so disclaim); this will simply be information that each working group member can take into consideration in weighing competing alternative technologies for inclusion in a standard.

Second, the revision makes clear that a patent-holder's assurance is irrevocable and runs with the patent. The IEEE-SA believes that this was implicit in its existing policy, but the IEEE-SA is aware of at least one circumstance in which the assignee of a patent apparently believes that its predecessor's assurance is either revocable or does not bind an assignee.

Third, the policy clarifies the binding effect of the assurance on the submitter's affiliates. An assurance binds the submitter's affiliates unless the submitter identifies affiliates that it does not wish to bind. This is intended to address the problem that can arise when potentially essential patents are held by a corporate affiliate other than the submitter itself. Without this provision, an assurance from one affiliate might offer a false sense of security concerning a patent held by another affiliate.

#### 3. An Illustration

One of IEEE-SA's premier families of standards is the 802<sup>®</sup> series. Some IEEE-SA 802 working groups use a process called "down-selection." After the group determines the technical criteria necessary to meet the objectives of the proposed standard, participants offer technology proposals to satisfy these criteria. The working group members then consider and debate the technical merits of the competing technologies. After a period of deliberation, the working group will vote on competing proposals, and at least one will be eliminated from consideration. This process will continue until only two competing technologies remain. At that point, decisions or compromises must be made until a single proposal receives at least 75% of the votes.

<sup>&</sup>lt;sup>4</sup> Unlike the VITA / VSO policy that was discussed in your October 30 business review letter, disclosure of terms under the IEEE policy is voluntary.

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The IEEE-SA's policies currently prohibit any discussions relating to royalty rates or other license terms during IEEE-SA meetings.<sup>5</sup> Consequently, the engineers who vote on technology proposals may not have a common understanding – or indeed, any idea – about the relative costs of competing proposals.<sup>6</sup> The current process thus impedes the ability to make sensible cost-benefit comparisons.<sup>7</sup>

Experience has shown that better information on relative royalty rates and other terms can play an important role in reaching consensus and bringing lower prices to consumers. The IEEE-SA is aware of at least two instances in which a patent-holder apparently made a unilateral announcement of its proposed royalty rate during the standards process (before the policy as it now exists was adopted), and in both instances, the announcement contributed to breaking a logjam in the consensus process and induced the working group to adopt the proposal for which royalty information was available. (Unfortunately, one of these also appears to be an example of an assignee that sought to limit or revoke the assurance that its predecessor had given.)

The proposed revision of the IEEE-SA's policy would encourage and facilitate (but not require) these unilateral disclosures not just in the unusual case, but in all cases, so that all of the participants have access to the same information and can use it in making their decisions on competing technologies. Moreover, by making these disclosures broadly available to all participants through its website, the IEEE-SA can provide greater transparency and consistency in the process.

#### II. The Issue

The IEEE-SA believes that its proposed policy fully complies with the antitrust laws, but in the past there have been concerns that any reference to prices (including royalty terms) created antitrust risk. Accordingly, the IEEE-SA assured participants in the process that it would not move forward with the proposed policy without seeking a Business Review Letter.

<sup>&</sup>lt;sup>5</sup> The standard slide set for use at the outset of every IEEE-SA standards development meeting states "Don't discuss the cost of specific patent use" and "Don't discuss licensing terms or conditions." (available at http://standards.ieee.org/board/pat/index.html).

<sup>&</sup>lt;sup>6</sup> A slide used in at least some IEEE-SA 802 working group meetings states that "the subject of cost in a technical standards development committee is appropriate under the following general guidelines: the perspective is cost not price (i.e., market or sales view); the purpose is to evaluate cost / performance tradeoffs where technical considerations are the main objective; [and] the facts are stated objectively and can be substantiated" (slide available at http://www.ieee802.org /3/cost\_discussion.pdf; punctuation and capitalization revised from PowerPoint original).

<sup>&</sup>lt;sup>7</sup> In addition, cost-benefit information can assist a working group in determining whether to include an optional functionality in the standard – that is, to make the judgment of whether the benefits of a specific function exceed its costs.

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### **III. Antitrust Considerations**

The IEEE-SA's proposed policy is a conservative but significant step toward greater transparency and better information in the standards-development process. At present, while any one participant might have a sense of the royalty terms that a licensor will make available to that participant's company, it is more difficult for there to be common knowledge of terms that will be made generally available (including to implementers who are not participants in the process). The policy does not require any patent holder to disclose terms, although competition between competing technologies may well induce most patent holders to do so. The IEEE-SA antitrust compliance policy will prohibit joint negotiations of license terms and indeed will prohibit discussion of specific license terms within IEEE-SA standards-development meetings. With the proposed policy, however, participants will be able to weigh alternatives based on a common pool of knowledge about potential terms and will be better able to discuss at least in general terms the relative costs of competing technologies in making costperformance comparisons. The IEEE-SA's antitrust policy will also continue to prohibit discussion of downstream pricing (e.g., the price or anticipated price at which implementers would sell compliant products). Moreover, although the IEEE-SA's policy does not single out and prohibit price-fixing between competing patent holders, that kind of agreement would clearly violate section one of the Sherman Act.

The Department's October 30, 2006 letter addressing the VITA / VSO policy<sup>8</sup> has made substantial progress in clarifying the Department's enforcement intentions for ex ante disclosure policies. In that letter, the Department acknowledged the procompetitive benefits of collaborative standard setting and discussed the propriety of an ex ante disclosure policy in the context of that activity. The IEEE policy does differ in a number of ways from the VITA / VSO policy, however, and while the IEEE does not believe that any of these differences are material to the antitrust analysis, the IEEE wants to make sure that the Department does not view the policy any differently.

### A. Basic Antitrust Analysis

The Department's fundamental analysis in the October 30, 2006 VITA business review letter sets forth the principles announced in remarks of the then Assistant Attorney General Pate in June 2005<sup>9</sup> and are similar to remarks of FTC Chairman Majoras in September 2005:<sup>10</sup>

<sup>10</sup> FTC Chairman Deborah Platt Majoras, *Recognizing the Procompetitive Potential of Royalty Discussions in Standard Setting* (Sept. 23, 2005), *available at* <u>http://www.ftc.gov/speeches/majoras/050923stanford.pdf</u> ("Consequently, some experienced members of SSOs and commentators have suggested that owners of patented technology should

<sup>&</sup>lt;sup>8</sup> Business Review Letter from Hon. Thomas Barnett to Robert Skitol, Esq. (October 30, 2006) (available at <u>http://www.usdoj.gov/atr/public/busreview/219380.htm</u>) ("VITA BRL").

<sup>&</sup>lt;sup>9</sup> R. Hewitt Pate, *Competition and Intellectual Property in the U.S.: Licensing Freedom and the Limits of Antitrust* (Jun. 3, 2005), *available at* http://www.usdoj.gov/atr/public/speeches/209359.pdf.

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> Early in the standard-setting process . . . working group members often can choose among multiple substitute technological solutions, some of which may be patented. Once a particular technology is chosen and the standard is developed, however, it can be extremely expensive or even impossible to substitute one technology for another. In most cases, the entire standard-setting process would have to be repeated to develop an alternative standard around a different technology. Thus, those seeking to implement a given standard may be willing to license a patented technology included in the standard on more onerous terms than they would have been prior to the standard's adoption in order to avoid the expense and delay of developing a new standard around a different technology.

> Requiring patent holders to disclose their most restrictive licensing terms in advance could help avoid this outcome by preserving the benefits of competition between alternative technologies that exist during the standard-setting process. . . . Without an ex ante disclosure policy,] working group members choose between alternative technologies primarily based on technical merit. They generally have little information about how eventual licensing terms for alternative technologies are likely to differ. Under [an ex ante disclosure] policy, each working group member also [would] be able to compare the most restrictive licensing terms associated with each alternative technology, including freely-available public domain technologies, when deciding which technology to support for inclusion in the draft [standard]. Disclosure of this information, enforced by the requirement that nondisclosed patents be licensed royalty-free, permits the working group members to make more informed decisions when setting a standard. They might decide, for example, that a cheaper, less technologically elegant solution would be best or they might determine that it is worth including the proffered technological elegance even on the most restrictive terms declared by the patent holder. At a minimum, the disclosure of most restrictive licensing terms decreases the chances that the standardsetting efforts of the working group will be jeopardized by unexpectedly high licensing demands from the patent holder.<sup>11</sup>

be permitted to state their intended royalty rates ex ante, that is, before the standard is set. Indeed, as some have suggested, if owners stated their royalty rates upfront, then price could become part of the competition among technologies for incorporation into the standard.").

<sup>11</sup> VITA BRL at Part IV.

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The Department's approach is also consistent with the principles the FTC discussed in its *Rambus* decision.<sup>12</sup>

#### B. Specific Issues

The IEEE has identified three differences between the VITA / VSO policy and the proposed IEEE policy that may warrant comment: the potentially larger number and broader range of standards that the policy addresses, the nature of the IEEE-SA's patent disclosure policy, and the voluntary nature of the IEEE's proposed policy.

### 1. Number of Standards Affected.

One difference between the IEEE policy and the VITA / VSO may be the sheer number and breadth of standards that the IEEE produces and to which the policy therefore applies. According to the Department's October 30, 2006 letter, VITA / VSO has finalized 32 standards and has an additional 21 standards under development, all in the area of VMEbus computer architecture and derivative development. In contrast, the IEEE-SA has nearly 1300 active standards in a wide array of fields.

The basic principle that information and transparency are improved and competition is enhanced when patent holders disclose their maximum terms ex ante remains true, regardless of the amount of commerce affected. Even if it were theoretically possible for a standards organization somehow to enable concerted action driving license terms below the levels that would prevail in a fully competitive market (instead of simply preserving or enhancing the possibility of competition), no such potential antitrust issue can be expected to arise in connection with the proposed IEEE policy. First, any and all such concerted action will continue to be prohibited. Second, the proposed IEEE policy is voluntary – it encourages but does not require disclosure of

<sup>12</sup> In the Matter of Rambus, Inc., FTC Docket No. 9302 (Aug. 2, 2006) ("An SSO may elect to require disclosure of patent positions before standardization decisions are made, because this enables SSO participants to make their choices with more complete knowledge of the consequences - including the potential that those practicing the standard may be liable for patent infringement, unless they negotiate licenses and pay royalties. If the SSO members prefer a given technology, notwithstanding the prospect of royalties, they can vote to incorporate it into the standard. If, in light of likely royalty payments, members prefer an alternative technology, they can vote against inclusion of the patented technology. Disclosure of potential patent liability also helps avoid the possibility of hold-up by enabling SSO participants to seek protection from excessive royalties "ex ante" - i.e., before choosing which technologies to incorporate into the standard. For example, an SSO member expecting to sell products that conform to the standard, who gains knowledge of potential patent exposure, may have powerful economic incentives to negotiate a license before the technology becomes standardized, based on the lower, ex ante value of the patented technology. Similarly, the owner of the patented technology may prefer to offer an ex ante license - even at a lower ex ante rate - knowing that the other SSO participants otherwise might engage in a cost/benefit analysis and opt to standardize an entirely different technology. Indeed, under certain circumstances, members of an SSO may even collectively negotiate these types of ex ante licenses, without necessarily running afoul of the antitrust laws.").

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terms. Third, the underlying IEEE standards development activity is likewise voluntary. No patent holder is required to contribute its patented solution to an IEEE specification; every holder remains free to submit its technology to another standards development organization or to retain and develop it as a proprietary market alternative.

### 2. Nature of Patent Disclosure Policy

The proposed IEEE-SA patent policy requires the chair to issue a call for patents at the beginning of every IEEE-SA standards-development meeting. The chair will ask everyone present to identify any person of whom they are aware who might hold a potentially essential patent or patent claim. Attendees are expected to answer, and to do so honestly, consistent with the requirements of the proposed policy. The working group chair then makes inquiry to the persons so identified and requests that they return a letter of assurance stating their intentions. The choices available on the IEEE-SA's form letter of assurance range from a disclaimer of any knowledge of potentially essential patents, to a refusal to grant any kind of assurance, to an assurance that the submitter will grant a license on RAND terms. The form letter of assurance also provides the submitter the option (but not the requirement) to disclose the maximum terms that it will seek. In contrast, the VITA/VSO policy requires its working group members to make "good faith and reasonable inquiry" into the patents and applications owned, controlled or licensed by the company he or she represents, to disclose all such patents and applications that the member believes may contain claims essential to comply with a proposed standard, and to bind his or her company to grant licenses under any such applicable patents on defined and disclosed terms. (The VITA/VSO policy also requires disclosure of known third-party patents or applications that may contain essential claims unless prohibited by confidentiality strictures.)

The policy that the IEEE-SA has arrived at represents its best effort to balance a number of competing values and interests. The IEEE-SA does not believe that this difference between its own policy and the VITA / VSO policy has antitrust significance. Regardless of how many patents will be disclosed under either policy, having more information on the patents that are disclosed will be useful to the working group in making cost-performance assessments.

### 3. Voluntary Nature of Ex Ante Disclosure Policy.

The IEEE proposes to adopt a policy that encourages but does not require ex ante disclosure of maximum terms. Consequently, there is arguably no "agreement" that could be analyzed under Section One.<sup>13</sup> Assuming that there is an agreement to be

<sup>&</sup>lt;sup>13</sup> Indeed, Chairman Majoras noted that a terms-disclosure policy (which is what IEEE-SA now proposes to adopt) does not even raise Section 1 concerns. See Deborah Platt Majoras, *Recognizing the Procompetitive Potential*, supra, at pp. 5-7 ("While the antitrust concerns are understandable [about announcement of terms], they may have unduly prevented announcements of pricing intentions or royalty discussions that may, in fact, provide procompetitive benefits. First, a patent holder's voluntary and unilateral disclosure of its maximum royalty rate, like most unilateral conduct, is highly unlikely to require antitrust scrutiny.

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analyzed, however, the agreement encourages but does not require disclosure of terms.<sup>14</sup> To the extent that a patent holder discloses terms, the competitive effects of the proposed IEEE policy should not differ from those of the VITA / VSO policy. If a patent holder decides (as is its right) not to disclose terms, the fact of uncertainty as to the costs of that patent holder's technology would be a legitimate but not necessarily dispositive consideration. Of course, it is possible that the binding and irrevocable disclosure by one patent holder may induce another patent holder to make a disclosure that it otherwise would not have made, but that decision would flow from competition and would tend to reduce costs of implementing a standard and thus ultimately lead to lower prices for end-users.

### **IV.** Conclusion

We will be happy to provide any further information that you might find useful, and we look forward to your statement of the Justice Department's enforcement intentions.

Very truly yours,

Michael A. Lindsay

Enclosures

Unilateral announcement of a price is, by definition, not a collective act subject to per se condemnation or even review under Section 1 of the Sherman Act, and it is hard to see how announcing one's price before sale (without more) could amount to exclusionary conduct under Section 2.").

<sup>14</sup> Indeed, the only even arguably collective activity is the IEEE-SA's policy that if letters of assurance (including those that voluntarily disclose terms) are accepted by the IEEE, the IEEE will make accepted letters of assurance available on its website and permit them to be made available at IEEE-SA working group meetings (but not permit discussion of the specific terms at those meetings).