

IBIS Open Forum Minutes

Meeting Date: **October 9, 2009**

VOTING MEMBERS AND 2009 PARTICIPANTS

Actel	(Prabhu Mohan)
Agilent	Brian Andresen, Radek Biernacki, Saliou Dieye, Yutao Hu, Fangyi Rao
AMD	Nam Nguyen
Ansoft Corporation	Steve Pytel
Apple Computer	(Matt Herndon)
Applied Simulation Technology	(Fred Balistreri)
ARM	V. Muniswara Reddy
Cadence Design Systems	Terry Jernberg*, Ambrish Varma
Cisco Systems	Luis Boluna, Tram Bui, Bill Chen, Syed Huq*, Mike LaBonte*, Pedo Miran, Huyen Pham, AbdulRahman (Abbey) Rafiq, Ashwin Vasudevan, Zhiping Yang
Ericsson	Anders Ekholm*
Green Streak Programs	Lynne Green
Hitachi ULSI Systems	(Kazuyoshi Shoji)
IBM	Adge Hawes
Infineon Technologies AG	(Christian Sporrer)
Intel Corporation	Myoung J. Choi, Michael Mirmak*, Vishram Pandit, Jon Powell, Sirisha Prayaga
IO Methodology	Li (Kathy) Chen, Lance Wang*, Zhi (Benny) Yan
LSI	Brian Burdick*
Mentor Graphics	Weston Beal, Vladimir Dmitriev-Zdorov, Zhen Mu, Arpad Muranyi*
Micron Technology	Randy Wolff*
Nokia Siemens Networks GmbH	Eckhard Lenski*
Samtec	(Corey Kimble)
Signal Integrity Software	Barry Katz, Walter Katz*, Todd Westerhoff
Sigrity	Brad Brim, Sam Chitwood
Synopsys	Ted Mido
Teraspeed Consulting Group	Bob Ross*
Toshiba	(Yasumasa Kondo)
Xilinx	[David Banas]
ZTE	(Ying Xiong)
Zuken	Michael Schaeder, Ralf Bruening

OTHER PARTICIPANTS IN 2009

AET	Mikio Kiyono
Altera	Hui Fu
Apache	Yu Lin

ATE	Nob Tanak, Kenny Suga
Bayside Design	Stephen Coe, Elliot Nahas
Circuit Spectrum	Zaven Tashjian
CST	Antonio Ciccomancini, Martin Schauem
Curtiss-Wright Embedded Computing	J. Phillips
EM Integrity	Guy de Burgh
Exar	Helen Nguyen
Freescale	Jon Burnett, Om Mandhama
Huawei Technologies	Xiaoqing Dong, Chunxing Huang, Guan Tao
ICT Solutions	Steven Wong
IdemWorks	Michelangelo Bandinu
Juniper	Kevin Ko
Kineret Design	Ricardo Teliuteuesh
Leventhal Design & Communications	Roy Leventhal
Maxim Integrated Products	Ron Olisar
Mindspeed Technologies	Bobby Alkay
NetLogic Microsystems	Eric Hsu
Politecnico di Torino	Igor Stievano
Sanmina SCI	Vladimir Drivanenko
Sedona International	Joe Socha
Siemens	Manfred Maurer
Signal Consulting Group	Timothy Coyle, Nicole Mitchell
Simberian	Yuriy Shlepnev
TechAmerica (GEIA)	(Chris Denham)
Texas Instruments	Pavani Jella
Xsigo Systems	Robert Badel
Independent	Ian Dodd

In the list above, attendees at the meeting are indicated by *. Principal members or other active members who have not attended are in parentheses. Participants who no longer are in the organization are in square brackets.

UPCOMING MEETINGS

The bridge numbers for future IBIS teleconferences are as follows:

Date	Meeting Number	Meeting Password
October 30, 2009	204 387 881	IBIS

For teleconference dial-in information, use the password at the following website:
<https://cisco.webex.com/cisco/j.php?J=204387881>

All teleconference meetings are 8:00 AM to 9:55 AM US Pacific Time. Meeting agendas are typically distributed seven days before each Open Forum. Minutes are typically distributed

within seven days of the corresponding meeting. When calling into the meeting, press 3 to attend the meeting, then follow the prompts to enter the meeting ID. For new, local international dial-in numbers, please reference the bridge numbers provided by Cisco Systems at the following link:

http://www.cisco.com/web/about/doing_business/conferencing/index.html

NOTE: "AR" = Action Required.

INTRODUCTIONS AND MEETING QUORUM

No new participants.

CALL FOR PATENTS

Bob Ross called for any patents or pending patents related to the IBIS 3.2, IBIS 4.2, IBIS 5.0 or ICM 1.1 specifications. No patents were declared.

MEMBERSHIP UPDATE AND TREASURER'S REPORT

Bob Ross reported that we have 29 paid members. He is waiting for confirmation from TechAmerica on payments of one or two additional memberships.

REVIEW OF MINUTES AND ARS

Bob Ross called for comments regarding the minutes of the September 18, 2009 IBIS Open Forum teleconference. The minutes were approved without any changes.

WEB PAGE UPDATES

Syed Huq reported that there were no web page updates this time. He noted that Bob sent him a few minor changes to make yesterday, so he will be making those changes shortly. Bob Ross noted that there was a web outage. Several people noticed and reported it. There was a renewal issue with the eigroup.org domain, and it took a few days to get restored.

MAILING LIST ADMINISTRATION

Mike LaBonte reported that there were a few drops and additions on the mailing list. Everything is working normally.

MODEL LIBRARY UPDATE

Anders Ekholm reported that he has updated all the links, and he sent the updated page to TechAmerica. The new page has not been published yet.

PRESS UPDATE

None.

MISCELLANY/ANNOUNCEMENTS

None.

OPENS FOR NEW ISSUES

Bob Ross added 'DesignCon Planning' as a separate item from the 'Other Events' planning.

INTERNATIONAL/EXTERNAL ACTIVITIES

- DASC

Michael Mirmak reported that the next meeting is October 15. The DASC file and e-mail archive may be found at:

<http://www.dasc.org/>

- P1735 Encryption

Syed Huq reported that the October 5 meeting was cancelled. The next meeting is October 19. He noted that several more companies have joined the encryption forum. The IEEE Study Group on Encryption web reflector archives are found at:

<http://www.eda-stds.org/ip-encrypt/hm/>

-Conferences

The Electrical Performance of Electronic Packaging and Systems (EPEPS 2009) is October 19-21, 2009 at the Embassy Suites in Portland, OR. This is a major meeting for SI people from universities and industry.

<http://www.epep.org/>

The 7th International Workshop on Electromagnetic Compatibility of Integrated Circuits (EMC COMPO 2009) is November 17-20, 2009 in Toulouse, France.

<http://www.emccompo.org>

TECHAMERICA STATUS

No update.

IEC APPROVAL ACTIVITIES

Randy Wolff reported that the IEC meeting was September 28-30, 2009. He has not heard any update from Victor Berman, so he will email him to find out the status of IEC approval of the IBIS 4.2 specification.

SUMMIT STATUS

-China Summit Planning

The meeting is scheduled for Wednesday, November 4 at the Four Points Hotel in Shanghai in the Pudong district. Bob Ross reported that another announcement will go out next week. IO Methodology has been added as a co-sponsor. Funds have been transferred into Lance Wang's account for paying meeting expenses. 12 presentations are scheduled. The formal agenda will go out one week before the meeting. Vendor tables need to be arranged. Co-sponsors include Huawei Technologies, Agilent Technologies, Ansoft, Cadence Design, Cybernet Systems, Intel, IO Methodology, Mentor Graphics, SiSoft, Sigrity, Synopsys and ZTE Corporation.

-Japan Summit Planning

The meeting is scheduled for Friday, November 6 at the JEITA headquarters from 2:00 PM to 6:00 PM. Bob Ross noted that there have been several signups already. There will be a full program. Vendor tables will be arranged by JEITA. Co-sponsors include Japan Electronics and Information Technology Industries Association (JEITA), ATE (Sigrity Distributor), Cadence, Zuken and others to be determined.

-DesignCon Planning

Bob Ross sent a contract agreement between IBIS and IEC to officers for review. We need to decide what day to hold the meeting. The most likely choice is Thursday, February 4, 2010. Monday is the second choice, but this is the day for tutorials. Bob is working with Syed Huq to make sure we have a backup meeting room with the hotel in case we can't get a room in the convention center. Bob questioned whether we want an IBIS booth. The booth is complimentary, but there are a lot of extra fees.

-Other Events

None.

Sponsorship opportunities for all upcoming IBIS summits are available, with sponsors receiving free mentions in the minutes, agenda, and other announcements. Contact the IBIS Board for further details.

IBIS QUALITY TASK GROUP

Mike LaBonte reported that the group finished reviewing changes to the Quality specification suggested by Randy Wolff and others. He posted an updated version. This included a new check 5.2.14, "[Receiver Thresholds] : Threshold_sensitivity and Ext_ref present and match datasheet, if needed." Bob Ross noted that there are a couple of presentations related to model quality at the China summit.

The Quality Task Group checklist and other documentation can be found at:

http://www.eda-stds.org/ibis/quality_wip/

IBIS MODEL REVIEW TASK GROUP

No update.

ADVANCED TECHNOLOGY MODELING TASK GROUP

Arpad Muranyi reported that the group has discussed a better flow diagram for AMI for the IBIS 5.1 specification. They are making progress on this, but he asked for more comments. Next week, there will be a presentation from Vladimir Dmitriev-Zdorov on a proposal for how to make waveforms in the new flow more accurate. The group also needs to squeeze in time to finalize the IBIS ISS documentation.

Task group material can be found at:

http://www.eda-stds.org/ibis/macromodel_wip/

AD HOC TASK GROUPS (INTERCONNECT)

Michael Mirmak reported that the group meets Wednesdays at 9 AM PT. They are discussing sparse matrix keywords. IBM brought up support for binary file formats, noting a format they use. The group will discuss possible support for this.

Task group material can be found at:

<http://www.eda.org/ibis/adhoc/interconnect/>

TOUCHSTONE TSCHK2 PARSER LICENSE

Bob Ross noted that at the last meeting, a price of \$1000 was proposed for a tschk2 parser license. The current parser is being developed for free, but Bob noted that we can't assume future development will be free, so we need to bring in some funds for this. Anders Ekholm asked about how to handle payments made for the parser. Bob said he would ask companies to make payments for next year, so we will not lose the funding at the end of the fiscal year. Bob motioned to set a fee of \$1000 for a tschk2 parser license. Michael Mirmak seconded the motion. The vote passed with the following vote tally:

Cadence	yes
Cisco	yes
Ericsson	yes
Intel	yes
IO Methodology	yes
LSI	yes
Mentor	yes
Micron	yes
Nokia	yes
SiSoft	yes
Teraspeed	yes

NEW ISSUES

None.

IBIS QUALITY SPECIFICATION VERSION 2.0 REVIEW

Bob Ross asked for any comments. The document was updated with recent changes after the last Quality Committee meeting. Mike LaBonte discussed Check 5.2.1 that relates to the Vinl and Vinh values found under [Model]. The original wording noted that DC values should be used. This came from an example found in the IBIS specification, even though the description of these parameters makes no mention of use of AC or DC values. Mike changed the text in the Quality specification to remove mention of DC, so the user can choose whether to use AC or DC values for Vinl and Vinh parameters. It is suggested to use values related to the values used in [Model Spec]. Randy Wolff noted that he liked the change, as it allows the user to decide what is most appropriate to use. Randy asked if a BIRD should be written to change the example in the IBIS specification. Bob suggested he write up a BIRD for review. Mike noted that many models include Vinl and Vinh values that have no relation to AC or DC values. He thinks the values should have some useful meaning for tools that don't support [Model Spec] or [Receiver Thresholds]. The document will be voted on October 30.

The document can be downloaded from:

http://www.eda-stds.org/ibis/quality_wip/ig_ver_2_0.pdf

IBISCHK5 PARSER STATUS

Michael Mirmak reported that last minute delays are keeping the parser from being released. Compiled versions for Windows and Sun OS are complete, but SuSE Enterprise Server 9 (Linux) is having issues. The parser developer has been notified and is making changes. Michael will send Mike LaBonte the code to try compiling on his Linux system.

TSCHK2 PARSER STATUS

Michael Mirmak reported that he is continuing to get questions from the developer. The code development is on schedule. Questions have helped to make light of areas of the specification needing clarity.

IBISCHK4 BUG STATUS

Bob Ross noted that there are no new BUGs to report.

The BUG report list is available at the link below:

<http://www.eda.org/ibis/bugs/ibischk/>

ICMCHK1 BUG STATUS

All BUGs have been closed. No new BUGs have been filed.

NEW ISSUES

Bob Ross noted that he will be introducing a new term, TSIRD, as a label for changes related to the Touchstone 2.0 document.

NEXT MEETING

The next IBIS Open Forum teleconference will be held October 30, 2009 from 8:00 to 10:00 AM US Pacific Standard Time.

NOTES

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This meeting was conducted in accordance with the GEIA Legal Guides and GEIA Manual of Organization and Procedure.

The following e-mail addresses are used:

majordomo@eda.org

In the body, for the IBIS Open Forum Reflector:
subscribe ibis <your e-mail address>

In the body, for the IBIS Users' Group Reflector:
subscribe ibis-users <your e-mail address>

Help and other commands:
help

ibis-request@eda.org

To join, change, or drop from either or both:
IBIS Open Forum Reflector (ibis@eda.org)
IBIS Users' Group Reflector (ibis-users@eda.org)
State your request.

ibis-info@eda.org

To obtain general information about IBIS, to ask specific questions for individual response, and to inquire about joining the EIA-IBIS Open Forum as a full Member.

ibis@eda.org

To send a message to the general IBIS Open Forum Reflector. This is used mostly for IBIS Standardization business and future IBIS technical enhancements. Job posting information is not permitted.

ibis-users@eda.org

To send a message to the IBIS Users' Group Reflector. This is used mostly for IBIS clarification, current modeling issues, and general user concerns. Job posting information is not permitted.

ibis-bug@eda.org

To report ibischk parser BUGs. The BUG Report Form resides along with reported BUGs at:

<http://www.eda.org/ibis/bugs/ibischk/>
<http://www.eda.org/ibis/bugs/ibischk/bugform.txt>

icm-bug@eda.org

To report icmchk1 parser BUGs. The BUG Report Form resides along with reported BUGs at:

http://www.eda.org/ibis/icm_bugs/
http://www.eda.org/ibis/icm_bugs/icm_bugform.txt

To report s2ibis, s2ibis2 and s2iplt bugs, use the Bug Report Forms which reside at:

<http://www.eda.org/ibis/bugs/s2ibis/bugs2i.txt>
<http://www.eda.org/ibis/bugs/s2ibis2/bugs2i2.txt>
<http://www.eda.org/ibis/bugs/s2iplt/bugsplt.txt>

Information on IBIS technical contents, IBIS participants and actual IBIS models are available on the IBIS Home page:

<http://www.eigroup.org/ibis/ibis.htm>

Check the IBIS file directory on eda.org for more information on previous discussions and results:

<http://www.eda.org/ibis/directory.html>

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IBIS CURRENT MEMBER VOTING STATUS

I/O Buffer Information Specification Committee (IBIS)

Organization	Interest Category	Standards Ballot Voting Status	August 7, 2009	August 28, 2009	September 18, 2009	October 9, 2009
Actel	Producer	Inactive				
Advanced Micro Devices	Producer	Inactive		√		
Agilent Technologies	User	Inactive				
Ansoft	User	Inactive				
Apple Computer	User	Inactive				
Applied Simulation Technology	User	Inactive				
ARM	Producer	Inactive				
Cadence Design Systems	User	Inactive		√		√
Cisco Systems	User	Active	√	√	√	√
Ericsson	Producer	Active	√	√	√	√
Green Streak Programs	General Interest	Inactive				
Hitachi ULSI Systems	Producer	Inactive				
IBM	Producer	Inactive	√			
Infineon Technologies AG	Producer	Inactive				
Intel Corp.	Producer	Active		√	√	√
IO Methodology	User	Active	√	√	√	√
LSI	Producer	Active	√		√	√
Mentor Graphics	User	Active	√	√	√	√
Micron Technology	Producer	Active	√	√	√	√
Nokia Siemens Networks	Producer	Active	√	√	√	√
Samtec	Producer	Inactive				
Signal Integrity Software	User	Active	√	√	√	√
Sigrity	User	Inactive				
Synopsys	User	Inactive				
Teraspeed Consulting	General Interest	Active	√	√	√	√
Toshiba	Producer	Inactive				
Xilinx	Producer	Inactive				
ZTE	User	Inactive				
Zuken	User	Inactive				

CRITERIA FOR MEMBER IN GOOD STANDING:

- MUST ATTEND TWO CONSECUTIVE MEETINGS TO ESTABLISH VOTING MEMBERSHIP
- MEMBERSHIP DUES CURRENT
- MUST NOT MISS TWO CONSECUTIVE MEETINGS

INTEREST CATEGORIES ASSOCIATED WITH GEIA BALLOT VOTING ARE:

- USERS - MEMBERS THAT UTILIZE ELECTRONIC EQUIPMENT TO PROVIDE SERVICES TO AN END USER.
- PRODUCERS - MEMBERS THAT SUPPLY ELECTRONIC EQUIPMENT.
- GENERAL INTEREST - MEMBERS ARE NEITHER PRODUCERS NOR USERS. THIS CATEGORY INCLUDES, BUT IS NOT LIMITED TO, GOVERNMENT, REGULATORY AGENCIES (STATE AND FEDERAL), RESEARCHERS, OTHER ORGANIZATIONS AND ASSOCIATIONS, AND/OR CONSUMERS.