Global Silicon Water Japan TC Chapter

Meeting Summary and Minutes

Japan Fall
October 02, 13:00 – 14:15
SEMI Japan Office, Chiyoda, Tokyo

TC Chapter Announcements

Next TC Chapter Meeting
December 13, 2018, 14:00 – 17:00
Tokyo Big Sight, Tokyo

Table 1 Meeting Attendees

*Italics* indicate virtual participants

Co-Chairs: Naoyuki Kawai (Meiji University), Tetsuya Nakai (SUMCO)

SEMI Staff: Junko Collins

<table>
<thead>
<tr>
<th>Company</th>
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</thead>
<tbody>
<tr>
<td>Meiji University</td>
<td>Kawai</td>
<td>Naoyuki</td>
<td>SUMCO</td>
<td>Nakai</td>
<td>Tetsuya</td>
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<tr>
<td>Tokyo Electron</td>
<td>Mashiro</td>
<td>Supika</td>
<td>ShinEtsu Handotai</td>
<td>Toda</td>
<td>Naohisa</td>
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<tr>
<td>Global Wafers Japan</td>
<td>Takeda</td>
<td>Ryuji</td>
<td>Consultant</td>
<td>Kumai</td>
<td>Sadao</td>
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<tr>
<td>Hitachi High Technologies</td>
<td>Ikota</td>
<td>Masami</td>
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Table 2 Leadership Changes: none

<table>
<thead>
<tr>
<th>WG/TF/SC/TC Name</th>
<th>Previous Leader</th>
<th>New Leader</th>
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<tbody>
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Table 3 Committee Structure Changes: None

<table>
<thead>
<tr>
<th>Previous WG/TF/SC Name</th>
<th>New WG/TF/SC Name or Status Change</th>
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<tbody>
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<Committee Name> <Region> TC Chapter
Meeting Minutes
### Table 3 Committee Structure Changes: None

<table>
<thead>
<tr>
<th>Previous WG/TF/SC Name</th>
<th>New WG/TF/SC Name or Status Change</th>
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</thead>
</table>

### Table 4 Ballot Results: Auxiliary Information

<table>
<thead>
<tr>
<th>Document #</th>
<th>Document Title</th>
<th>Committee Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>6427</td>
<td>Auxiliary Information: Round-Robin Testing of Sample Preparation Methods for Minority Carrier Diffusion Length Measurements by Surface Photovoltage Methods</td>
<td>Passed</td>
</tr>
</tbody>
</table>

Note that

1. Passed ballots and line items will be submitted to the ISC Audit & Review Subcommittee for procedural review.
2. Failed ballots and line items were returned to the originating task forces for re-work and re-balloting or abandoning.

### Table 5 Activities Approved by the GCS between meetings of the TC Chapter: None

<table>
<thead>
<tr>
<th>#</th>
<th>Type</th>
<th>SC/TF/WG</th>
<th>Details</th>
</tr>
</thead>
</table>

### Table 6 Authorized Activities: None

Listing of all revised or new SNARF(s) approved by the Originating TC Chapter.

<table>
<thead>
<tr>
<th>#</th>
<th>Type</th>
<th>SC/TF/WG</th>
<th>Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>TBD</td>
<td>SNARF</td>
<td>Test Method TF</td>
<td>Revision of M51, TEST METHOD FOR TIME ZERO DIELECTRIC BREAKDOWN CHARACTERISTICS OF AMORPHOUS SiO2 FILMS FOR SILICON WAFER EVALUATION</td>
</tr>
</tbody>
</table>

#1 SNARFs and TFOFs are available for review on the SEMI Web site at: http://downloads.semi.org/web/wstdsbal.nsf/TFOFSNARF

### Table 7 Authorized Ballots: None

<table>
<thead>
<tr>
<th>#</th>
<th>When</th>
<th>TF</th>
<th>Details</th>
</tr>
</thead>
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<Committee Name> <Region> TC Chapter 2 Meeting Minutes <date of meeting> <city, state/country>
Table 8 SNARF(s) Granted a One-Year Extension: None

<table>
<thead>
<tr>
<th>#</th>
<th>TF</th>
<th>Title</th>
<th>Expiration Date</th>
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Table 9 SNARF(s) Abolished: None

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<th>#</th>
<th>TF</th>
<th>Title</th>
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Table 10 Standard(s) to receive Inactive Status: None

<table>
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<tr>
<th>Standard Designation</th>
<th>Title</th>
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Table 11 New Action Items: None

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<tr>
<th>Item #</th>
<th>Assigned to</th>
<th>Details</th>
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</table>

Table 12 Previous Meeting Action Items:

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<thead>
<tr>
<th>Item #</th>
<th>Assigned to</th>
<th>Details</th>
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</thead>
</table>
| SiW180730-01 | J. Collins | To correct portion pointed out.  
Closed (Meeting minutes has been modified) |
| SiW180730-02 | R. Takeda | To find out documents that JSNM wants to access, and to coordinate with SEMI staff  
Closed (Staff also provided the information to R. Takeda) |
| SiW180730-03 | Test Method Task Force | To set up the technical presentation session regarding this topic at their task force meeting in conjunction with SEMICON Japan 2018 period  
Closed, arrangement of presentation has been done. |

1 Welcome, Reminders, and Introductions

Naoyuki Kawai called the meeting to order at 13:00. Attendees introduced themselves. The meeting reminders on antitrust issues, intellectual property issues and holding meetings with international attendance were reviewed.

Attachment: 01.00_Required_Elements_Reg_20150327_E+J_2016NewStdTemplate,
2 Review of Previous Meeting Minutes
The TC Chapter reviewed the minutes of the previous meeting.

Motion: To approve the meeting minutes on July 30, 2018
By / 2nd: R. Takeda (GlobalWafers Japan) / T. Nakai (SUMCO)
Discussion: 
Vote: 6/0 Motion passed

Action Item:
Attachment: Silicon Wafer Japan TC (2018.07.30) 2018.08.06a

3 Liaison Reports
3.1 GCS
No report.

3.2 Silicon Wafer North America TC Chapter
No report for this time since there was no TC Chapter Meeting since the last meeting.

Action Item: None,
Attachment: None,

3.3 Silicon Wafer Europe TC Chapter
No report

Action Item: None,
Attachment: None,

3.4 JSNM / M4S (Material Standards Study Group for Semiconductor Supply Chain) Report
No report.

Action Item: None,
Attachment: None,

3.5 SEMI Staff Report
J. Collins (SEMI) gave the SEMI Staff Report. See the attachment for details

Action Item: none,
Attachment: SEMI Staff Report 20180913_v1.0_Si,

4 Ballot Review

NOTE 1: TC Chapter adjudication on ballots reviewed is detailed in the Audits & Review (A&R) Subcommittee Forms for procedural review. The A&R forms are available as attachments to these minutes. The attachment number for each balloted document is provided under each ballot review section below.

4.1 Review of Auxiliary Information.

This was reviewed by GTC members between September 1 to October 1 (JST) and no negative comments. Therefore, the task force proposed to approve this document to issue as an Auxiliary Information.

Motion: To approve Draft Document 6427: Auxiliary Information: Round-Robin Testing of Sample Preparation Methods for Minority Carrier Diffusion Length and forward this to A&R procedure

By / 2nd: R. Takeda (GlobalWafers Japan) / T. Nakai (SUMCO)

Discussion: None

Vote: 6/0 Motion passed

Action Item: Staff to forward 6427 to GSC to get approval and forward it to A&R after that.

Attachment: Ballot report_6427 (Aux Information),

5 Subcommittee and Task Force Reports

5.1 International 450mm Shipping Box Task Force / JA Shipping Box Task Force

No report

Action Item: none,

Attachment: none,

5.2 International Advanced Wafer Geometry Task Force/Japan Advanced Wafer Geometry Task Force

No report.

Action Item: none,

Attachment: ,

5.3 International Polished Wafers Task Force

No report

Action Item: none,

Attachment: none,

5.4 International Epitaxial Wafers Task Force

No report

Action Item: none,
5.5 International Annealed Wafers Task Force
No report
Action Item: None,
Attachment: None,

5.6 International SOI Wafers Task Force
No report
Action Item: none,
Attachment: none,

5.7 International Terminology Task Force
No report
Action Item: none,
Attachment: none,

5.8 International Test Methods Task Force / Japan Test Method Task Force
R. Takeda (Global Wafers Japan) reported. See attached report.

5.8.1 Major revision to M51 was discussed among the task force and the task force will propose SNARF for Revision to SEMI M51-1012: TEST METHOD FOR TIME ZERO DIELECTRIC BREAKDOWN CHARACTERISTICS OF AMORPHOUS SiO2 FILMS FOR SILICON WAFER EVALUATION.

Therefore, the task force proposed new SNARF and proposed the ballot submission to cycle 8.

2-weeks review was done on September 18 and there was no negative comment.

Motion: To approve SNARF for major revision to M51 was discussed among the task force and the task force will propose SNARF for Revision to SEMI M51-1012: TEST METHOD FOR TIME ZERO DIELECTRIC BREAKDOWN CHARACTERISTICS OF AMORPHOUS SiO2 FILMS FOR SILICON WAFER EVALUATION.

By / 2nd: R. Takeda (Global Wafers Japan) / T. Nakai (SUMCO)
Discussion: none
Vote: 6/ 0Motion passed

See the attachment for more activities.
Action Item: Staff to forward the report to A&R SC.
Attachment:

5.9 International Advanced Automated Surface Inspection Task Force
M. Ikota reported. Of note;
Approval of ballot submission of Doc. 6363 Revision of SEMI M52-0214 GUIDE FOR SPECIFYING SCANNING SURFACE INSPECTION SYSTEMS FOR SILICON WAFERS FOR THE 130 nm TO 11 nm TECHNOLOGY GENERATIONS will be in the agenda at the Silicon Wafer Europe TC Chapter meeting in November. It was explained that this document has been drafted with reference to the numerical values shown in the final ITRS version (2015 edition)

Action Item: none,
Attachment: none,

6 Old Business
6.1 Previous Action Items
All previous action items are closed. See Table 12 Previous Meeting Action Items.
Action Item: None,
Attachment: None,

6.2 3-year Project Period
As reported in the Staff Report, there is no SNARF to be considered.

6.3 Consideration of 5-year Review
As reported in the Staff Report, there is no SEMI Standards to be considered. Of note;
- M85-1014
  - 5834: Line Item Revision to SEMI M85-1014: Guide for the Measurement of Trace Metal Contamination on Silicon Wafer Surface by Inductively Coupled Plasma Mass Spectrometry
  - International Test Method Task Force is working on this document.
  - The SNARF is expired by April 19, 2019.

7 New Business
7.1 TC Award
No nomination as of today

Action Item: None
Attachment: None

8 Next Meeting and Adjournment
The next meeting is scheduled for December 13, from 14:00-17:00 at Tokyo Big Sight in conjunction with SEMICON Japan 2018. See http://www.semi.org/standards-events for the current list of events.

Adjournment: 14:15.
Respectfully submitted by:

Junko Collins
Standards & EHS
SEMI Japan
Phone: 81.3.3222.5819
Email: jcollins@semi.org

Minutes tentatively approved by:

<table>
<thead>
<tr>
<th>Name</th>
<th>Company</th>
<th>Approval Date</th>
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<tbody>
<tr>
<td>&lt;&lt;Name&gt;&gt; (&lt;&lt;Company&gt;&gt;, Co-chair)</td>
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Table 13 Index of Available Attachments#1

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<td>Ballot report_Doc.6427</td>
<td>SiW_Agenda_181002_R0.1</td>
</tr>
<tr>
<td>Test Method TF Meeting Minutes_2018.9.27</td>
<td></td>
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</table>

#1 Due to file size and delivery issues, attachments must be downloaded separately. A .zip file containing all attachments for these minutes is available at www.semi.org. For additional information or to obtain individual attachments, please contact [SEMI Staff Name] at the contact information above.