

**National Hydrogen and Fuel Cell Codes and Standards Coordinating Committee
(NHFCCSCC)**

**Wednesday, October 2, 2013
TIME: 3:00 – 4:30 pm (Eastern Daylight Time)**

Minutes

Attendees

**Bill Collins
Carl Rivkin
Connor Dolan
Ernst Baumgartner
Jay Keller
Jennifer Hamilton
Jesse Schneider**

**John Grimes
Julie Weiss
Karen Hall
Kelvin Hecht
Ken Loewenthal
Nick Barilo
Robert Boyd**

**Robert Ingram
Spencer Quong
Steve Tucky
Susan Bershad
Tim McGuire
Tommy Rockward**

1 Welcome and Housekeeping Items

Review of anti-trust guidelines

http://www.fchea.org/core/import/PDFs/ANTITRUST_GUIDELINES.pdf

Meeting agenda approved.

September draft minutes approved.

2 DOE/HQ Update

Several people from the U.S. attended the Belgium conference in Brussels in September. The conference had close to 200 registered participants. In conjunction with the conference, DOE held the first international / bi-lateral webinar on lessons learned with PNNL and Joint Research Center part of the European Commission, presented on their two databases. About 180 people attended the webinar remotely (through the Web) and about 150 people attended live in Brussels. The rest of the conference went well.

Focus areas included combustion, materials, and other safety topics.

3 C&S Events and Fuel Cell Safety Information

http://www.fuelcellstandards.com/calendar_new.html

Kelvin Hecht

<http://www.hydrogenandfuelcellsafety.info/meetings.asp>

Karen Hall

4 Codes and Standards Organization Updates

IEC TC 105

Kelvin Hecht

Key item coming up is the plenary meeting in 105 in Frankfurt. Several of the groups will be meeting just prior to that meeting.

The International Standard for Stationary Fuel Cell Power Plants – CSA Fuel Cell Working Group has approved the International Standard with US deviations. That document is currently at ANSI under review until November 21st. By the end of the year, we will likely have a new harmonized ANSI standard. Korea, Japan, Canada, and China are in the process of updating the standard. This revision will likely run through 2014. Most of the world will be harmonized on the same stationary standard by the end of 2014.

ISO TC 197

Jill Thompson

Jay Keller – ISO TC 197 new management is moving ahead aggressively. It has gone through its internal review process of every new work item proposals put forward in the February plenary in preparation for December. For those who need a calendar update, the plenary is scheduled for the December 5 & 6, with Working Group (WG) meetings planned for Dec 2-4. The WG meetings will report out at the plenary at the end of the week.

Spencer Quong – Firm request for the agenda was noted. As the travel will be done during Thanksgiving weekend, travel prices will be increased and availability will be limited. Jay Keller to quire the ISO/TC197 management to stress the need for an agenda and venue be communicated to the ISO/TC197 stake holders.

Jesse Schneider – December 4th is the *tentative* date for the hydrogen station standard kickoff meeting. Jay Keller notes that this is a tentative planning date, P-Member approval is currently pending.

NFPA 2

Martin Gresho

Susan Bershad – NFPA 2 is in the process of changing cycles from Fall 2014 to Annual 2015 document. NFPA staff is working to coordinate schedules with NFPA 55. The ballot for NFPA 2 will not come out until after the NFPA 55 meeting next week. That is because any changes to NFPA 55 that will be extracted will be changed in the ballot. A joint meeting will be held on NFPA 55 and NFPA 2. This joint meeting will likely be held next July. The timeframe for comments on the ballot are uncertain at this time.

NFPA 853

Karen Hall

First draft is posted, will be a Fall 2014 edition. Closing date to submit public comments will be due on November 16th. Paper comments by October 11th.

ICC

Robert Sale

Spencer Quong – the ICC meetings are occurring right now, International Fire Codes are discussed tomorrow. One vote on hydrogen related to service garages. A larger update will be provided at the next meeting.

CSA**Julie Weis**

Reviewed CSA's status update. <http://www.fchea.org/core/import/NHFCCSCC/CSA-2013.10.01.pdf>

HDTA Status Update**Ken Loewenthal**

Some design companies are involved. Letters of support in commitment from OEMS, stationary providers, manufacturers, and others are being collected reaffirming the need for the HDTA. Follow-up support from other government agencies is being conducted as well.

Jennifer Hamilton – Did include input to the California Energy Commission to the next investment plan to consider funding as part of operations & maintenance for the HDTA.

Norman Ingram - Question was raised on our device, do you plan to incorporate metrology information in your device as well?

Ken Loewenthal – Depending on the timeframe, initial concern is to get device out and verify the J2601 protocol. Part of the design consideration is to look at metrology aspects.

UL**Laurie Florence**

No report at this time.

SAE**Mike Steele
Jesse Schneider**

Jesse Schneider – SAE 1766 (electric crash safety) is in its final review and is estimated to be finished in the next two weeks.

J2601 - The team has reviewed 73 pages of comment and is now down to 3 pages. There is going to be an OEM/fuel provider industry survey sent out to finalize the final open points in J2601. Final draft still expected at the end of October.

J2799 (IRDA Communications) – Standard draft completed, awaiting J2601 finalization to start balloting.

Jennifer Hamilton - J2990-1 (ER Guide) – Submitted language for vehicle labeling and identification for committee review. Some more modifications to take place, expected wrap up no later than November meeting. Working through another ISO technical committee for input. One of the major portions to get through. Others straightforward, working on J2990 as parent document.

ASTM**Tommy Rockward**

Interlaboratory study working to get under way. Standard is D7649 to trace CO2, Argon, Nitrogen, Oxygen, and water. Hydrogen fuel technique. Identified Air Liquide as a supplier, received a quote on material samples. Also identified participants, to date are California Department of Food and Agriculture and others.

5 Discussion Topics

Regulatory Matrix Review and Comment

Karen Hall

<http://www.fchea.org/core/import/NHFCCSCC/FCHEA-Reg-Matrix-Sept-30-2013.pdf>

FCHEA noted an increased focus on metering relating to fueling vehicles.

Comments can be submitted to Karen Hall at khall@fchea.org.

Permitting and Installation of Hydrogen Fueling Stations

CAFCP Working Group

Jennifer Hamilton

The draft program opportunity notice released from CEC. Comments on the draft are due 5 PM Pacific on Wednesday, October 16th.

Workshop to gather input from stakeholder on draft outline to vehicle grid integration roadmap to be held Tuesday, October 8th 9:30 AM – 5:00 PM.

Still do not have any due to open, timelines are late this year / early next year for building.

Some stations are in the process of location changes.

Ca DMS Metrology

Norman Ingram

Validation / data collection period should begin later this week / next week. Will dispense into the device and by next meeting should have data collected.

Ca DMS Fuel Quality

Ron Nies

No report at this time.

SAE TIR J2601 Compliance

Jesse Schneider

The draft program opportunity notice (PON) on hydrogen fueling stations was released from CEC. Comments on the draft are due 5 PM Pacific on Wednesday, October 16th.

The CEC PON draft has incorrect references to J2601 and nomenclature for recommending dispensers, though it already refers to soon to be released standard, J2601-13. In addition, it references using T40 (Type A) or T20 (Type B). While it is still recommended to use a T40 category for the CEC PON, in order to achieve a 3-5 minute fueling, it is not recommended to use a T20 (Type B) fueling due to extended fueling times of 20-30 minutes –or more- depending on ambient temperature.

This is an opportunity to correct the incorrect nomenclature, and at the same time, recommend only T-40 stations (Type A) so that a three minute fueling is possible. T-40 stations are the only technology referenced in J2601 a customer acceptable fueling time and is the only standard fueling which provides a the fueling time (under most conditions) referenced to in the ZEV Mandate (less than 15 minutes).

The CaFCP is organizing a response to the CEC PON, which may include this. It may be valuable to have H2USA submit a coordinated response with the CaFCP.

The issue will also be raised at the 10/8/13 FCHEA's Transportation Working Group.

Hydrogen Fuel Quality and Measurement

NIST

Juana Williams

No report at this time.

7 Open Discussion & Other Issues

Next meeting to be held on Wednesday, October 30th at 3:00 PM EDT.