

August 9, 2012



Commissioner Peterman and CEC Staff
California Energy Commission
Dockets Office, MS-4
Re: Docket No. 12-HYD-1 Hydrogen and Transportation
1516 Ninth Street
Sacramento, CA 95814-5512

To whom it may concern:

This is an informative letter regarding the published SAE Technical Information Report, J2601, "Fueling Protocols for Light Duty Gaseous Hydrogen Surface Vehicles" and the upcoming standard, J2601 by the SAE Fuel Cell Interface Working Group. The goal is to provide clarity on the intended usage of the TIR version and some insight into what is coming in the standard. In addition, SAE would like to provide a recommendation on how to best provide the referencing of these documents in the upcoming solicitations for stations.

The published edition of TIR SAE J2601 describes goals and performance targets for hydrogen fueling of light duty, Fuel Cell Electric Vehicles. It is a table-based approach which specifies a fueling rate and a pressure target where the fueling should stop. SAE J2601 was created by worldwide automakers, hydrogen suppliers, industry experts, and government representatives. This TIR is currently being used worldwide as the only guideline for hydrogen vehicle fueling for these vehicles.

The TIR J2601 is to be replaced by a standard with the same title in 2013. The scope is to also include the infra-red data communications (from SAE J2799) and the lessons learned in the field to enable the first "commercial infrastructure" of hydrogen fueling. The standard is to enable commercial fueling of hydrogen with customer satisfaction and fueling performance as the main focus. To this goal, station operators around the world have given real world fueling data to the SAE Fuel Cell Interface Working Group for the purpose of furthering the document. These have already been incorporated into the draft standard, such as the tolerances to better match real world conditions and updating the fueling tables to reflect representative fueling hardware. The new standard J2601 can be implemented with limited changes, for stations designed with fueling hardware to TIR J2601 with the recommendation below.

The timeline for the Standard SAE J2601 is to be published in early 2013. For reasons of station capability and timeline, it is recommended that you use language as "SAE J2601" as a reference for a minimum performance criteria. This would allow the station providers to quote using the published 2010 TIR edition of J2601 document, but commission stations using the updated edition of the standard when it is released.

The Interface team also recommends that the stations in California at a minimum be designed to provide fueling which match the SAE J2601 H70 Type A fueling protocol (T40)-nomenclature used in future standard) and H35 Type B (T20) using both non-communication and communication Protocols. This would be available to reference in both the TIR & Standard versions.

Thank you for your consideration.

Sincerely,



On behalf of SAE Fuel Cell Interface Working Group

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Mr. Bill Elrick, California Fuel Cell Partnership
Mr. Pat Perez, California Energy Commission
Mr. Jesse Schneider, Chairperson, SAE J2601 SAE Fuel Cell Interface Working Group
Mr. Eugene Steele, Chairperson, SAE Fuel Cell Committee