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October 2016, 2013

Attn: Staff  
California Energy Commission  
1516 Ninth Street, MS-29  
Sacramento, CA 95814-5512

**Re: Responses to 12-HYD-01**



Dear California Energy Commission Staff:

I write this letter to provide comments on the recent draft solicitation document "Alternative and Renewable Fuel and Vehicle Technology Program" numbered 12-HYD-01 on behalf of the University of California – Berkeley Transportation Sustainability Research Center (TSRC).

In general we are very supportive of the proposed solicitation and look forward to an expanded network of hydrogen stations in California. The following suggestions are intended to help make the solicitation as effective as possible, given our experience in siting, permitting, commissioning, and operating our hydrogen station at the UC Berkeley Richmond Field Station. That station was originally conceived in 2008-09 and commissioned in May of 2011, and has been in continuous operation ever since.

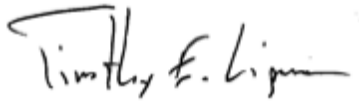
Our comments and suggestions are as follows:

- 1) Regarding "Station Location Areas": It is unclear why the line was drawn between primary and secondary locations at the point that it was. The key point is that Oakland/Berkeley is secondary when bay area stations would be easier to site there than in San Francisco, potentially providing similar if not greater functionality. Please consider including the Oakland/Berkeley site as well as San Francisco in the "primary" category.
- 2) Similarly at least one of the key Los Altos/Los Altos Hills/Palo Alto or Woodside/Menlo Park/Atherton/Redwood City areas should perhaps be considered as a Primary Priority Location, to complement the in-progress stations further south in the Silicon Valley area.
- 3) Regarding the provision that hydrogen stations proposed be at least "6 minutes or more drive time (according to the UCI STREET model) from existing, planned, or newly proposed stations," how do we determine this without direct access to the STREET model. In other words, who do we contact to obtain that information now that Dr. Tim Brown as left UCI for a different position?
- 4) "Projects located in existing fueling locations will be scored higher" – has the amount of additional scoring/points been determined?

- 5) Regarding the Provision 24 “Data Collection” we assume that more detail will be provided in the actual solicitation but allowing industry/partner groups to review these criteria for appropriateness and feasibility may be desirable.
- 6) In general, regarding the “polygon” approach, we feel that it is a useful construct that should help groups to target good locations for stations, but we feel that the strict polygon boundaries, and in fact even “fuzzy” polygon boundaries, should be further loosened. Station siting criteria should consider the proximity to the targeted polygons but should more importantly prioritize:
  - a. Siting feasibility given the solicitation constraints and additional (e.g., “NIMBY”) concerns to initially locate stations in convenient locations, but with appropriate buffers to heavily residential areas (at this stage); and
  - b. Automaker OEM input with regard to station siting.

Once again I appreciate the opportunity to provide these comments on behalf of UC Berkeley’s Transportation Sustainability Research Center. We very much applaud all of the hard work that the Energy Commission staff and legislature have put toward these efforts.

Respectfully submitted,

A handwritten signature in black ink, reading "Timothy E. Lipman". The signature is written in a cursive, flowing style.

Timothy E. Lipman, PhD