

November 27, 2010

California Contractor's  
License No. 115753-ABoard Members  
California Air Resources Board  
1001 I Street  
Sacramento, CA 95814

RE: Proposed Amendments to the In-Use Off-Road Diesel-Fueled Fleets and the Off-Road Large Spark-Ignition Fleet Requirements

Dear Honorable Board Members,

Nabors Well Services Co (NWSC) would like to thank the California Air Resources Board (CARB) and the CARB staff for the opportunity to participate in the development of the In-Use Off-Road Diesel-Fueled Fleet Regulation (Off-Road Reg) over the past seven years. NWSC is submitting its comments and concerns relating to the Staff Report: Proposed Amendments to the In-Use Off-Road Diesel-Fueled Regulation. NWSC believes that there are several opportunities absent from the Staff Report that would improve the regulation. NWSC is requesting the Board take these comments, suggestions and recommendations under advisement in the adoption of the proposed amendments to the Off-Road Reg.

NWSC would like to thank the CARB staff for proposed amendments to Off-Road Reg which will provide economic relief to fleets hit hard by the recession. The proposed amendments will simplify the current regulation and lower the compliance cost by providing a four year delay on the initial compliance date. NWSC believes the amendments will remove the mandate retrofits and instead allow fleets to choose between turnover or retrofit as a compliance strategy. NWSC believes the proposed amendments are a great improvement over the current Off-Road regulation. NWSC will provide the following suggestions to improve the regulation.

### **Recognition of Compliance Fleets**

In 2004, several fleets worked on the development of the Off-Road Reg. Some of the fleets recognized early on some the requirements being developed. These fleets developed strategies to be in compliance with the original regulation in 2010 and some fleets achieved compliance. NWSC is suggesting that CARB develop a recognition program for these fleets. The recognition was discussed several times during the workshops, but no final decision was made. NWSC made the following suggestions: (1) CARB Green Off-Road Fleet, (2) name of the Company that achieved compliance with the original requirements of the Off-Road Regulation by March 2010, (3) this fleet is one of 250 compliant companies in a population of 8800 affected companies, (4) having total horsepower of 25,000 hp and (5) post the companies' names on the CARB website. The companies could share this certificate with their customers to demonstrate their commitment to improving the air quality in California.

NWSC's recommendation is for the Board to request the staff to develop the recognition program. Since the initial compliance date was March 31, 2010, and now we are at the end of 2010, NWSC recommends having the recognition program completed in 30 days.

## **Labeling Modification**

Staff is proposing to modify the labeling provision that would require a fleet to label both sides of its equipment rather than just the right-hand side with an EIN. Staff made the assumption that the cost of the additional labeling would be \$10 per EIN label. NWSC would like to note that the initial labeling cost is one cost, but the re-labeling is another cost that the staff did not take into account. After the original labeling two years ago, a large number of EINs are fading due the heat and sun in the valley. The staff report states the labeling modification would make it easier for enforcement.

If the labeling modification is adopted, NWSC's recommendation is for CARB to enforce the labeling and reporting requirement of the regulation. The staff report acknowledges non-compliance fleets with this statement, "there are still some fleets that have not reported to DOORS and are therefore not in compliance with the off-road regulation." CARB should locate all the non-compliant fleets.

## **Rebuilt Engines**

The proposed amendments have a provision for rebuilt engines of a lower Tier to be rebuilt to a Tier 1 or more stringent emission standard. Staff should clarify this rebuilt engine provision. Can the companies manufacturing the replacement parts sell the parts to the end user? If the end users install the parts during the rebuilt process, how do you ensure the engine has achieved the Tier 1 or higher standard? Will the rebuilt engine require a certification and labeling? Will the rebuild process require a third party to rebuild the engine to ensure certification? Does the adding vehicles provision apply to the rebuilt engines? As you can clearly see, additional clarification is needed in the rebuilt engine provision.

## **New Fleets**

Staff has spent a considerable time in the staff report clarifying the requirements for new fleets. NWSC believes this clarification will be valuable in the future. NWSC's recommendation is with the new fleet reporting provision. This provision requires a new fleet to report in DOORS within 30 days of bringing the vehicles into the state. Staff should require the new fleet to report in DOORS before using the vehicles in California. This would allow CARB the opportunity to review the company's fleet to ensure compliance with the regulation.

## **Cost Methodology**

NWSC is concerned with the costs in the Table F1-2: Vehicle \$/hp Cost by Vehicle Type as they relate to the Workover Rig (Mobile) and Drilling Rig (Mobile) found in the staff report. These updated costs were used by staff in the cost methodology to estimate the total costs of the proposed amendments. NWSC is in the business of providing mobile workover rigs and mobile drilling rigs. In 2006, NWSC purchased several workover rigs that cost \$1.4 million each with a 450 hp engine which would have a cost of \$3,111 per hp. In addition, NWSC purchased a few other workover rigs that cost \$1 million each with a 450 hp engine which would have a cost of \$2,222 per hp. The mobile drilling rigs will have vehicle cost of \$3,777 per hr. The workover rig cost on Table F1-2 is understated by 114%. Approximately ten years after the purchase of the workover rigs, the company had to replace the engines at an investment of \$100,000 each to extend the useful life of the rigs. Approximately twenty years after the purchase of the workover rigs, the company performed a major refurbishing at an investment of \$700,000 each to extend the useful life of the rigs. The engine replacement and the refurbishment investment will repeat at the same intervals. The original purchase of the workover rigs is understated and the additional investments were not captured on Table F 1-2.

From the above discussion, it is apparent staff does not understand the cost of workover rigs and drilling rigs. NWSC is concerned with the cost methodology found in staff report.

### **More Stringent Fleet Average Targets**

Staff is proposing to increase the stringency of the fleet average targets in the later years of the regulations which will require fleets to turn over to additional Tier 4i and/or Tier 4 vehicles. NWSC is concerned with this provision of the amendments and the requirement of turning over to additional Tier 4 vehicles. NWSC believes the mandate to move to Tier 4 vehicles would place a financial burden of fleet owners. NWSC's recommendation is for staff to remove the mandate of moving to Tier 4 vehicles and allow fleets to achieve the turnover through the fleet's normal turnover rate.

NWSC is requesting that the Board take these recommendations under advisement during the adoption of the proposed amendments to the In-Use Off-Road Diesel-Fueled Fleets and the Off-Road Large Spark-Ignition Fleet Regulation. NWSC continues to work with CARB staff to collectively achieve consensus on the solution. If you have any questions concerning these comments, please contact me at (661) 391-1623.

Sincerely,

A handwritten signature in cursive script that reads "James Thomas".

James Thomas  
Administrative & Regulatory Affairs Manager