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October 19, 2016

Via Federal Express

Mr. Gary W. Snellgrove, Director Office of Conservation – Environmental Division Louisiana Department of Natural Resources 617 North 3rd Street, 8th Floor Baton Rouge, LA 70802

RE: Landowner Response to Office of Conservation's Letter to Tortuga Betty D. Blanchard et al Lease

COMPLIANCE ORDER No. E-I&E-05-0233

OC Legacy Project No. 023-007-001

Dear Mr. Snellgrove:

Arabie Environmental Solutions, LLC, (Arabie Environmental) has prepared this letter on behalf of the landowner, Ms. Nancy Blanchard, concerning the oilfield contamination on her property. The purpose of this letter is to offer specific comments to the Office of Conservation's (OC) letter to Tortuga Operating Company (c/o Stewart L. Stover, Jr.) dated October 12, 2016. In its letter, the OC is commenting on the December 18, 2015 report prepared by Hydro-Environmental Technology, Inc. (HET) titled "SITE INVESTIGATION AND REVISED RECAP REPORT", which will be referred to as the Report in this correspondence.

On May 5, 2016, Arabie Environmental submitted comments based on a review of the Report and greatly appreciates that the OC has considered those comments in the preparation of the October 12, 2016 letter to Tortuga. However, some issues warrant further clarification and comment.

The referenced Compliance Order No. E-I&E-05-0233 was issued on October 11, 2005, and dealt with the very same matters that are the subject of the OC letter issued on October 12, 2016. Therefore, almost 11 years to the day from issuance of the Compliance Oder, the Office of Conservation is still requesting that Tortuga deal with the contamination first documented by Shinteaux's sample analytical results from as early as 2003. As it stands today, the operator has managed to avoid complying with multiple written directives, a Supplemental Compliance Order, and many deadlines issued by the OC. Given this 11 year history of non-compliance, we note that the October 12, 2016 letter (Letter) does not include any specified timeframe in which the OC directives are to be met.

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The site's oilfield operational history and soil sample analytical data clearly demonstrate that the contamination of the soil has switted for the switted for the soil has switted for the switted that the contamination of the soil has existed for decades. The groundwater data, including groundwater flow direction and contaminant concentrations, documents continuing source or sources of E&P waste constituents to the aquifer, yet there appears to be no sense of urgency or importance to stop the ongoing contamination of the aquifer.

Item 1 of the Letter points out that RECAP can be applied as an exception to LAC 43:XIX.Subpart 1.Chapter 3 requirements pursuant to LAC 43:XIX.319. Item 1 also properly recognizes that written affirmation of no objection to the RECAP Report has not been submitted to the OC.

COMMENT: The landowner has not authorized the use of RECAP in evaluating the contamination of the property. Since RECAP cannot be applied, it is unclear why there is further discussion by OC in the Letter regarding specific RECAP requirements. For example, Letter Item 7 deals with groundwater classification, which is strictly a RECAP issue. Under Order 29-B, the groundwater at the Blanchard tract is an "aquifer" and contamination of an aquifer is "strictly prohibited."

Item 2: We concur with OC comments.

Item 3 includes a quote from Page 8 of the RECAP Report that was issued on behalf of Tortuga. The quote follows: "The LDNR defines the shallow silts encountered during the installation of the HET monitor wells as part of the Atchafalaya Aquifer..." And then the OC Letter asks "What is the source of the statement."

COMMENT: The LDNR has designated the Atchafalaya Aquifer as the aquifer that wells are completed in on the Blanchard tract. A review of water well registration information on SONRIS shows that wells on the tract, ranging in depth from 50 feet to 200 feet, are completed in the Atchafalaya Aquifer. The aquifer designation by LDNR is correct in that borings completed on the property have not shown that there is continuous clay separation between the deeper sands of the Atchafalaya Aquifer and the upper saturated zones where contamination has been documented.

Item 4: We concur with OC comments.

Item 5 states that the Agency requires written affirmation that the landowner has no objection to higher limits for EC, SAR, and ESP.

COMMENT: The landowner **does** object to higher limits for EC, SAR, and ESP.

Item 6 discusses future intended uses and the OC's evaluation of applicability of exceptions to LAC 43:XIX.Chapter 3.

COMMENT: The landowner has not authorized the use of exceptions on her property. An evaluation of "non-compliant" areas through an exception is not appropriate.

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Item 7 states "To accurately classify the shallow groundwater at the property," Namey tall Division Blanchard's domestic well screen interval should be determined."

COMMENT: There are several important points to be understood regarding that statement. First, there is no need to classify the aquifer in which Ms. Blanchard's well is screened; it has been in use for many years and obviously supports the domestic use for which it was intended. Second, pump tests on the shallow aquifer performed by HET and Arabie Environmental have already shown that it will support domestic use requirements. And third, "classification" of an aquifer is a RECAP process, which has no bearing in this matter since the landowner has not consented to an exception to LAC 43:XIX.Chapter 3. The monitor wells, Ms. Blanchard's domestic well, and a number of rig supply wells are all completed in an "aquifer" as defined by Order 29-B.

Item 7 goes on to say that due to "lack of site specific boring information below approximately 60 feet from ground surface...."

COMMENT: It should be noted that there is site specific boring information below approximately 60 feet. This fact has been pointed out, and supporting documentation provided, in Arabie Environmental's May 5, 2016 submittal to Mr. Snellgrove (page 2 of 8.) The onsite borings indicate a hydraulic connection of the shallow, water bearing strata to the Atchafalaya Aquifer. This fact has been recognized by LDNR in its water well registration documentation.

Item 8 discusses the need for additional monitoring wells and additional sample analysis, stating that additional wells **may** be necessary and additional samples **may** be needed.

COMMENT: To properly assess the areas listed, additional wells and samples are necessary. For example, the areas identified in the Letter as having remaining compliance issues are the SE-SW Pit, SB on 150, 11AC and SB-11-AC-w. These areas have not been investigated since that contamination was initially identified as early as 2003. In addition to the analytical parameters listed in Item 8, the salt indicator parameters (chloride, conductivity, and total dissolved solids) should also be required.

Item 9 states that NORM analytical results should be addressed by the appropriate DEQ staff.

COMMENT: We concur with the OC statement, however, there appears to be no process or requirement in place for DEQ to review and address the NORM results.

Item 10 deals with full delineation/site characterization and source removal at each AOI and specific RECAP requirements.

COMMENT: Full delineation/site characterization and source removal are vital steps needed at this site. RECAP is not applicable since the landowner has not consented to an exception to LAC 43:XIX.Chapter 3.

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Item 11 includes a requirement for a work plan detailing specifically how the JAB pit area soil will be delineated, remediated with mixing and blending activities, and sampled to confirm compliance.

COMMENT: Full delineation of all COC's at the former JAB pit is critically needed. The reference to remediation for the JAB pit only refers to mixing and blending and makes no mention of offsite disposal. LAC 313.I.3. states that E&P waste failing to meet the pit closure requirements "shall be moved offsite by the operator to a permitted commercial facility..."

The efforts of the OC staff in reviewing the Report and noting the shortcomings of that report are appreciated. It is hoped that the comments provided in this letter on behalf of the landowner will assist OC in correcting the environmental issues on Ms. Blanchard's property and in protecting the aquifers of the State of Louisiana.

If there are any questions or if additional information is needed, please do not hesitate to contact me.

Sincerely,

Austin R. Arabie

cc: Nancy Blanchard, Park Plantation, LLC

= Rabie

Daniel Henry, Jr., Office of Conservation Brian W. Arabie, Arabie Law Firm, LLC

Office of Conservation