EXECUTIVE SUMMARY

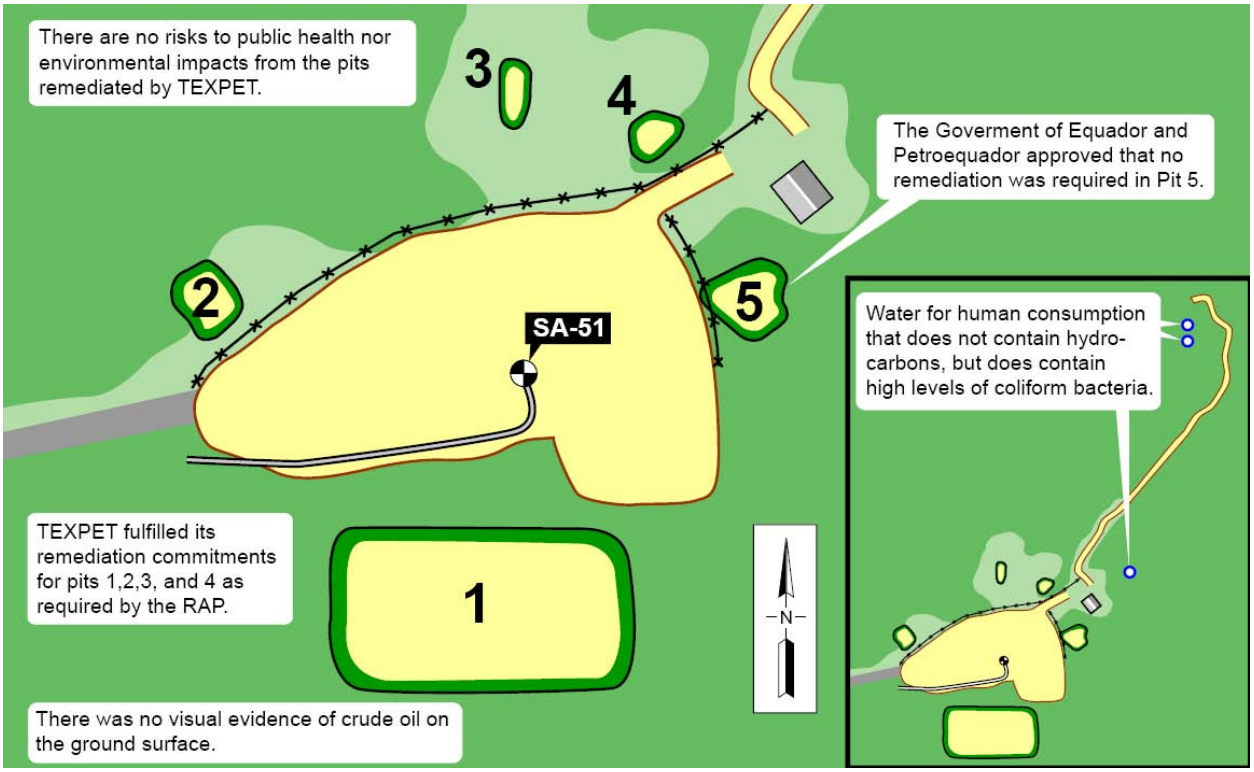
Based on the field activities conducted during the judicial inspection and subsequent review of reports and documents related to remedial activities at Sacha 51, the following conclusions can be summarized:

1. ***There are no tangible environmental impacts.***

2. ***There are no risks to human health or the environment from pits that were included in the RAP.***

3. ***There are no risks to human health, the environment, groundwater or surface water from crude oil.***

4. ***TEXPET fulfilled its remediation commitments related to well Sacha 51.***



These conclusions are discussed below:

- **THERE ARE NO TANGIBLE ENVIRONMENTAL IMPACTS**
  During the three days of field work in well Sacha 51 and surroundings, no impacts to the environment or private property were noted. The areas surrounding the platform were

covered with dense vegetation, trees and grass. Numerous cattle and swine were observed. There was no visual evidence of crude oil on the ground surface.

- **THERE ARE NO RISKS TO HUMAN HEALTH OR THE ENVIRONMENT FROM PITS THAT WERE INCLUDED IN THE RAP**

  All soil samples collected within pits 1 to 4, remediated by TEXPET, are below applicable international criteria and comply with the requirements set forth in the RAP (see tables 2A and 2B). Therefore, the pits remediated by TEXPET do not require any additional remediation.

  Pit 5 was excluded from remedial activities in 1995 because the composite sample from that pit contained 443 mg/kg of TPH and there was no crude oil in the pit. However, the only samples that did not comply with international criteria were collected from Pit 5 at a depth of more than 0.75 m and contained 63,140 mg/kg of highly degraded hydrocarbons (see appendices P and Z), which are mostly immobile (see Appendix H) and are not bio-available (see Appendix U). However, concentrations of BTEX and PAHs in all samples from Pit 5 were below international criteria. There are workover records for well SA-51 (see Appendix M) that show that on February 21, 2002, after Petroecuador began to operate the well, 1,120 barrels of crude oil were spilled. It is recommened that those responsible for the crude oil found in Pit 5 conduct the necessary studies to evaluate whether Pit 5 should be remediated.

- **THERE ARE NO RISKS TO HUMAN HEALTH, THE ENVIRONMENT, GROUNDWATER OR SURFACE WATER FROM CRUDE OIL**

  The groundwater sample obtained from Mr. Aguilar's well does not pose any risk to human health or the environment from crude oil. Similarly, the two surface water samples from the ravine northeast of Mr. Aguilar's residence do not pose any risks to human health or the environment from crude oil. Analytical data for all water samples are below applicable international criteria (see tables 3A, 3B, 4A and 4B), except for microbiological analytes. Also, the same analytical data indicate that the concentration of metals in all water samples are below the criteria established in Decree 2144. The absence of petroleum hydrocarbons in water samples indicates that there are no crude oil residues in the ground that are mobile or that could impact drinking water sources.

  It should be noted that the three water samples contained high concentrations of total and fecal coliform, which could cause different types of diseases in people or animals that consume the water. These diseases are not related to crude oil.

- **TEXPET FULFILLED THE REMEDIATION COMMITMENTS RELATED TO WELL SACHA 51**

  According to the information reviewed and the analytical results provided by an internationally certified laboratory for samples collected from the remediated pits, TEXPET closed the pits in accordance with the criteria and specifications agreed upon with the Government of Ecuador and Petroecuador, and with applicable international criteria for metals, BTEX and PAHs.

The conclusions presented above also are based on the following information:

- There is no crude oil migration from the pits to groundwater.

- All pits have a surface cover over the remediated soil.

- Pit 5 was not remediated by TEXPET because it was classified as NFA (No Further Action). Currently, it contains TPH concentrations at depth above the international criterion of 10,000 mg/kg, but it does not contain any BTEX or PAH that would pose a risk to human health or the environment.

- The degraded crude oil found in the subsurface of the remediated pits does not have the potential to migrate because its residual saturation is well below the concentration required for migration to occur.

- Traces of crude oil found in the soil do not pose a risk to human health or the environment. This was proven through scientific tests that confirm the following:
  - *The chemical composition of Sacha crude indicates that it contains metals in concentrations below that of typical soils and that would not cause a significant increase of metal concentrations in soil.*
  - *The chemicals of concern in Sacha crude that have potential toxic effects, BTEX and PAHs, are present in crude oils from oil-producing areas throughout the world.*
  - *The chemicals of concern are significantly and rapidly degraded by natural mechanisms in tropical climates such as those of the Oriente region in Ecuador, thereby reducing the toxicity potential and mobility of crude oil.*
  - *All results indicated the absence of BTEX, the disappearance of light and mobile fractions, and the degradation of most of the PAH content with respect to fresh Sacha crude.*
- The solubility of degraded crude oil in water is extremely low, which is why there are no impacts to nearby water sources.

- Conservative hydrocarbon volatilization estimates indicate that the volatile fractions have been degraded and that calculated concentrations are minimal.

- Risk evaluations of exposure routes for hydrocarbons indicate that:
  - *Direct exposure: is not possible because remediated soils have a soil cover of more than 0.35 m in thickness.*
  - *Exposure from ingesting surface water or groundwater: crude oil is immobile in the pits remediated by TEXPET. When leaching to groundwater or surface run-off was considered, the BTEX and PAH values calculated using the most conservative assumptions are not sufficiently high to pose a risk to human health. Degradation quickly eliminates the more mobile light and toxic fractions in crude oil.*

- The drinking water sources found in the vicinity of the Sacha 51 pits include a water well 67 m northeast of former Pit 5 and a spring located approximately 90 m northeast of the same pit. In both cases, the concentration of BTEX, PAHs, and metals was below detection limits (see tables 3 and 4) or were well below criteria recommended by WHO or USEPA.