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Subject:	Gainesville: Floridan Well, CFW-1 Sampling Results
Date:	Monday, December 14, 2015 8:42:08 AM
Attachments:	CFW-1_Validated_w_EB.pdf

Rusty and Bill:

Attached please find analytical results for the Floridan well (CFW-1) installed down gradient of the former Cabot Lagoons. Groundwater samples were collected from four intervals in this multi-level Westbay well. Based on a review of the data, we draw the following conclusions:

- The key pine tar plume tracers, phenol and 3,4-methylphenol, were not detected at any depth interval in the Floridan Aquifer at CFW-1. The absence of pine tar related compounds in the Floridan Aquifer well is consistent with significant attenuation of the pine tar plume vertically and the presence of relatively limited contamination in the Lower Hawthorn Group.
- Naphthalene was detected in all depth intervals (up to 170 µg/L in the shallowest sampling interval, see attached table), and showed decreasing concentrations with depth. Similarly, 2-methylnaphthalene, 2,4-dimethylphenol, and acenaphthene were detected at low levels in the upper sampling depth(s). The detection of these compounds is consistent with the analytes detected in the Floridan on the Koppers Site, indicating a creosote related plume.
- Acetone, a common laboratory contaminant, was detected intermittently during sampling. The pattern of acetone detections supports these being laboratory artifacts:
  - Acetone was detected in the equipment blank at 14 µg/L;
  - The reproducibility of the acetone data was poor, *e.g.*, at CFW-1-175-185 the field sample showed a detected value of 41 µg/L while the field duplicate was nondetect; and
  - The highest acetone concentration (97 µg/L) was detected in the 195 to 205 ft-bgs zone. If acetone was Site related, the highest concentrations would likely have been detected in the uppermost sample, consistent with the pattern of naphthalene detections. The Florida Groundwater Clean-up Target Level for acetone is 6,300 µg/L.
- Low levels of bromide, several orders of magnitude below the 30 mg/L well development target value in the Work Plan, indicate that CFW-1 was adequately developed at the time of sampling.

Please let us know if you have any questions.

Regards

Manu

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