To: Residents

Date: September 20, 2004

Re: South Cayuga Street Construction Area – Subsurface Investigation

As part of the reconstruction of West Spencer Street the City has done soil and water testing to look for contaminants within the work area. The purpose of this testing program is to assure the safety of residents and workers in the immediate construction area. These tests indicate the presence of low levels of various volatile organic compounds in the parts per billion range. These results are all well below soil and groundwater standards. No special precautions, handling or monitoring are required for the soil and water in the construction area. However as soils are excavated, air monitoring will be done periodically with a photoionization detector (PID). If contamination is encountered or suspected, workers have been told to stop work and notify the project manager. The analytical results of the subsurface investigation are summarized below. A copy of the investigation report can be reviewed at the City Clerk’s Office.

South Cayuga Street Subsurface Investigation

In the spring of 2004 the City began reconstruction of West Spencer Street in the vicinity of South Cayuga Street. In July, as construction progressed, Emerson Power Transmission (EPT) released data pertaining to soil gas sampling in the same vicinity. According to EPT, both New York State and Tompkins County have stated that additional environmental investigation is warranted at some of the residences. New York State and Tompkins County must approve that investigation before it is undertaken. In response to community concerns as well as concerns for environmental and worker safety the City of Ithaca undertook additional testing of soils and groundwater in the construction zone. The City was not required to conduct this testing; this testing is not part of the work plan being developed by EPT for State and County review. Buck Environmental Laboratories, Inc was engaged by the city to conduct this testing.

Sampling was done on August 11, 2004. Five soil samples were collected from the embankment along the east side of South Cayuga Street in the construction area. Three samples were collected from soil near sanitary sewer pipes (pipe bedding) under South Cayuga Street. Three water samples were collected from storm sewers on South Cayuga Street and a spring flowing out of bedrock on West Spencer Street. No groundwater was encountered.

Samples were analyzed for sixty different compounds. Only six compounds were detected in the samples.
Soil samples from the embankment:

- Tetrachloroethene was detected in one soil sample at 1 part per billion (ppb). (Clean-up objective is 1,400 ppb)
- Toluene was detected in two soil samples at 1.1 ppb and 12 ppb. (Clean-up objective is 1,500 ppb)
- No volatile organic compounds were detected in two of the soil samples.

Soil samples from near the sanitary sewer:

- Benzene was detected in one sample at 1.2 ppb. (Clean-up objective is 60 ppb)
- Chloroform was detected in two samples at 2.2 ppb and 2.9 ppb. (Clean-up objective is 300 ppb)
- Ethylbenzene was detected in one sample at 1.6 ppb. (Clean-up objective is 5,500 ppb)
- Tetrachloroethene was detected in two samples at 54 ppb and 5.3 ppb. (Clean-up objective is 1,400 ppb)
- Toluene was detected in two samples at 17 ppb and 2.6 ppb. (Clean-up objective is 1,500 ppb)
- Trichloroethene was detected in two samples at 2.4 ppb and 1.5 ppb. (Clean-up objective is 700 ppb)
- No volatile organic compounds were found in one sample.

Water sampling:

- Chloroform was detected in the spring water at 2 ug/L. (Groundwater standard is 7.0 ug/L)
- Chloroform was detected in the storm water flowing from Hillview Place at 2 ug/L. (Groundwater standard is 7.0 ug/L)
- No volatile organic compounds were detected in storm water flowing along South Cayuga Street.

All detected quantities are well below accepted soil clean-up objectives or groundwater standards. All detected quantities are well below concentrations that would require special handling or disposal.

Workers have been told to pay attention to soil conditions as digging proceeds. If workers are suspicious of discolored or smelly soil they should stop work and notify the project inspector. If it is unclear whether the suspicious soil is contaminated the project inspector will get someone trained in the operation of a PID to “sniff” for volatile compounds. If it is obvious that contaminated soils have been encountered New York State Department of Environmental Conservation will be notified and our consulting engineer will be called to the site.

Questions or comments: Contact Tom West, Assistant City Engineer, tomw@cityofithaca.org