

200 North Cedar Road - New Lenox, Illinois 60451-1751 - (800) 383-0468 or (815) 485-6161 - FAX (815) 485-4433 - Email sahci@sahci.com - Home Page www.sahci.com

April 26, 2023

981899

Jack Hansen Roen Salvage Company 180 E. Redwood St. Sturgeon Bay, WI 54235

RE: Thorium Monitoring – 108 N. Streeter Dr. Dig Ticket: 601336022

Dear Mr. Hansen:

Stan A. Huber Consultants, Inc (SAHCI) was hired by your firm to provide radiation monitoring during the removal of topsoil at 108 N. Streeter Dr. in Chicago, IL (Chicago Locks). Monitoring was performed on April 18 and 19, 2023, by Brian Schmidt and Jeremy Kieser, SAHCI Health Physics Technicians.

## Instrumentation

Surface gamma scans were performed using Ludlum Model 2221 Scaler / Ratemeters (serial nos. 132844 and 126496) with attached Ludlum Model 44-10 2"x2" Nal Detectors (w/ 6" collimated lead shields). The instruments were both calibrated on May 3, 2022. The US Environmental Protection Agency (USEPA) action level of 7.1 picocuries per gram (pCi/g) total thorium for instrument 132844 is 8,083 counts per minute (cpm) and 7,819 cpm for instrument 126496.

The average background count rate for this location ranged from 1,956 cpm to 2,100 cpm.

## Soil Gamma Scans

Gamma surface scans were performed using the Ludlum Model 2221 Scaler / Ratemeters described above. Survey data was collected by scanning the surface of the ground before topsoil removal and then again after removal of approximately 1 foot of soil. The excavated area measured approximately 12 feet wide by 462 feet long.

The maximum gamma count rate for each location was recorded on the attached Radiation Survey Form. The count rates ranged from 2,300 cpm to 3,600 cpm.

No count rates were found at any time that exceeded the threshold limits of 7,819 cpm and 8,083 cpm, respectively.

## Additional Monitoring

Since no count rates were identified above the 7.1 pCi/gram threshold limit, no additional soil sampling, air monitoring, or personnel monitoring were performed.

I will be providing a copy of this report to both the City of Chicago Department of Public Health and US Environmental Protection Agency, as required.

Thank you for your assistance with this project. If you have any questions or need additional information, please call me at (815) 485-6161.

Sincerely, Stan A. Huber Consultants, Inc.

Classe

Glenn Huber, CHP President



Radiation Survey Form
ocation/ Project ID: 601336022 108 N. Streeter Roen Solusge
Date: April 18-19, 2023 Technician: Jereny Kieser, Brian Schmidt
nst Model: Ludium 2221 Serial No.: 132844 / 126496
Probe Type: 1"x1" Nal / 2"x2" Nal Shielded / Not Shielded 1956 ** Background 2100 cpm Action Level: 803/78/9cpm
Write grid designations in circles. Record highest counts for grid in cpm. Record 30 second counts at grid intersections (if required). Shade areas-of elevated counts and record max cpm. N
$\bigcirc \qquad \bigcirc \qquad$
T Navy PierT



## 108 N. Streeter – Chicago Locks Topsoil Removal

