

June 2, 2021

Mr. Jason Schimpf  
Business Administrator/Board Secretary  
Kingsway Regional &  
South Harrison Twp. Elem. School Districts  
213 Kings Highway  
Woolwich Twp., NJ 08085

Dear. Mr. Schimpf,

This report summarizes the results of the May 26-28, 2021 air monitoring of the South Harrison Elementary School Gym. This assessment was conducted by Mr. Richard A. Lynch, MBA, CIEC and Ms. Langston R. Lynch of [ESMCCorp](http://www.esmccorp.com).

### Executive Summary of Findings

Findings revealed that airborne mercury levels within the South Harrison Elementary School gym averaged  $0.14\mu\text{g}/\text{m}^3$  over the course of the 2-day monitoring period. All airborne mercury levels were substantially lower than the NJ Department of Health Guideline of  $0.8\mu\text{g}/\text{m}^3$ . No elevated health risk to students, staff or visitors from mercury exposure is suggested at this time.

Evaluation criteria were previously described and will not be repeated herein.

## **I. Methods**

The following methods were observed during our May 26-28<sup>th</sup>, 2021 site inspection.

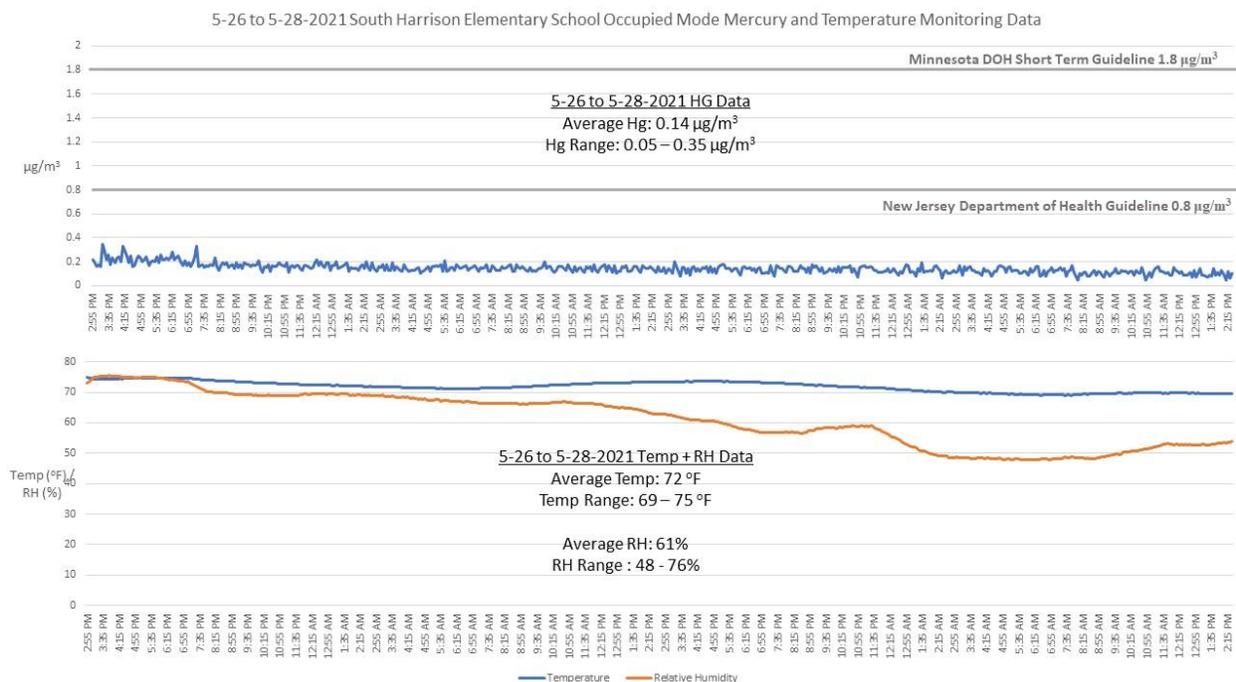
- Continuous air monitoring was conducted within the gym between approximately 2:55PM on May 26<sup>th</sup>, 2021 and 2:25PM on May 28<sup>th</sup>, 2021.
- All mercury air monitoring was conducted using a calibrated Jerome J505 Mercury Vapor Analyzer with a reported detection limit of  $0.05\mu\text{g}/\text{m}^3$  which reads as low as  $0.00\mu\text{g}/\text{m}^3$  with a resolution of 0.01.
- Temperature and humidity were monitored over the same period using a TSI Q-Trak 7575 IAQ monitor.

## **II. Mercury Air Monitoring Findings**

- The gym was not in use during the monitoring period and is instead being used for furniture storage.

- Outdoor airborne mercury was at approximately 0.02 micrograms per cubic meter ( $\mu\text{g}/\text{m}^3$ ). Outdoor temperature ranged from 65 to 90 °F during the duration of the monitoring period.
- Spot airborne mercury measurements within the gym, ranged between 0.08 and 0.13  $\mu\text{g}/\text{m}^3$  and averaged 0.11  $\mu\text{g}/\text{m}^3$ .
- Continuous monitoring of airborne mercury levels measured at the gym center between 2:55PM on 5-26-2021 until 2:25PM on 5-28-2021 at **averaged, 0.14  $\mu\text{g}/\text{m}^3$  (range 0.05 - 0.35  $\mu\text{g}/\text{m}^3$ )**; below the NJDOH Guideline of 0.8  $\mu\text{g}/\text{m}^3$ . Gym temperature averaged 72°F @61% relative humidity (range 48 - 76% RH)

Continuous air monitoring findings from the May 26-28, 2021 monitoring period are shown on the Figure below:



#### IV. Conclusions and Recommendations

Based upon these findings, it is our professional opinion that airborne mercury levels within the South Harrison Elementary School gym averaged 0.14 $\mu\text{g}/\text{m}^3$  over the course of the 2-day monitoring period. All airborne mercury levels were substantially lower than the NJ Department of Health Guideline of 0.8  $\mu\text{g}/\text{m}^3$ . No elevated health risk to students, staff or visitors from mercury exposure is suggested at this time.

Based upon these findings, the following recommendations should be considered:

1. Continue to maintain gym air temperature at approximately 68°F as is current practice at the current outdoor air introduction settings.
2. Continue routine inspections and routine non-abrasive cleaning of gym floors and other

surfaces to reduce dust accumulation.

Our next monitoring will be scheduled for June 2021.

Thank you for the opportunity to assist you with the evaluation. Please contact me with any questions.

Sincerely,  
*Richard A. Lynch*  
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