

MEMO

To:	Natalie Kotyck
From:	Garry T. Hunter, M.A.Sc., P.Eng.
Date:	October 4, 2024
File:	21-407
Subject	Strada Proposed Quarry – Upper Bedrock Guelph Eramosa and Gasport Aquifer Water Level Contours

Natalie,

This communication continues the iterative Peer Review of the proposed Strada Quarry pending application.

Strada has advised that no more site groundwater level logger data will be disclosed until the 2024 Compliance Report is completed. The most recent logger data provided was to Mar 2024 and included only 2 to 3 months of data for the multilevel nested monitors installed in late 2023. There is now more than 6 months of undisclosed data.

1.0 Updated Fig H.1R, Fig H.2R and Fig H.2.R (Enclosed)

Therefore, we have now brought our prior Model Layer 4 and 6 Groundwater Level Figures H.1R, H.2R and H.3R up to Mar 2024 including integration of the Peer Review interpreted 'Underground Stream' feature. These plots contain hydraulic push downs, selected legacy Pit water levels and synthetic data along the 'underground stream'. This Peer Review considers these Spatial Analysis Water Level Plots constructed from screen classified site monitoring data to be approaching 1 to 2 m in vertical accuracy and now suitable for Extraction Site Plan Development. We, of course, are open to further editing input from the Strada consultants.

Fig H.2R enclosed overlays the Strada Groundwater Model inferred zone of Higher Hydraulic Conductivity. This inferred zone of increased flow is offset from and not directly informed by Strada's groundwater monitoring site data.

Site Infiltration / Injection areas should be located in the OW25C-D1 / OW16C -D1 and not at OW28C-D1 areas (Note D1 refers to the Gasport Aquifers).

No Strada comments or critique of previous Peer Review versions of H.1 , H.2 and H.3 as submitted (see Matrix) have been received. We are not aware of any similar plots promised and / or prepared by Strada's Consultants. The poorly calibrated Aug 2024 Appendix CDE Groundwater Model virtual +/- 5 m contour plots are not appropriate Quarry site substitutes. **Fig H.1R and H.2R should be used to inform and further calibrate Strada's Groundwater Model Layers to the proposed actual Quarry site conditions.**

2.0 Conclusions

If Strada or it's Consultants do not agree with these Peer Review spatial GIS water level plot interpolations, the alternative is to now construct additional nested groundwater monitors to 'patch the data gaps' in Strada's current groundwater monitoring Network.

We are open to further discussions of these conclusions.