



Podcast Transcript

Episode 25 Anchor Trenches, follow up to our February 4, 2021 webinar titled: **“Geomembrane Attachment and Penetration Design and Installation”**

Duff Simbeck is Vice-President of Simbeck and Associates. He has been involved in the field installation of geosynthetics and project management for 22 years with projects ranging from North Carolina to California.

Anchor Trenches:

1. What is a good lift thickness and compaction effort for anchor trenches?
-In our experience the need for individual compacted lifts within the anchor trench above an unloaded slope, meaning an exposed geomembrane without soil cover is not necessary. And backfilling, followed by wheel rolling is usually adequate. For loaded slopes that do have cover material over the geomembrane- usually just two lifts hand compacted between them is sufficient. Make sure to always coordinate backfilling with your installer, be conscience of sheet temperatures at the time of backfilling, monitor for bridging, and protect the liner from damage during compaction of the trench with plywood or some other means.
2. I've read that some waste landfills were using Magnetic Liner Anchor System. Have you ever worked with this kind of anchor system? What is your opinion about it? - I have read about the concept but have no personal experience with this type of system. It is an interesting idea I just have not seen it done.

3. On Slide 30, you showed a cobbly subgrade condition. What would you suggest be done in the case that this "anchoring" trench cannot be cut cleanly? (e.g., remove and replace with clays/similar materials) - Remove and replace would be great however it is not always an option. At the very least having a guy on the ground to perform some hand dressing and maintaining the trench surfaces by filling in depressions, and knocking down protrusions to provide a uniform hinge point or breaking point where the liner transitions from the setback and turns down into the trench. Having this as uniform as possible affects deployment, field welding, performance of the liner, and make for a much cleaner looking finished product after backfilling is completed.

If you have additional questions on anchor trenches, please email me (fabricatedgeomembrane@gmail.com) & I will send your question to them at or visit the FGI website at fabricatedgeomembrane.com.