

Installation Guidelines for Septic & Holding Tanks

Site Conditions:

Site selection should consider ease of installation, in addition to other factors. The installation site must be accessible to large, heavy trucks weighing up to 40 tonnes. The construction area should be free of trees, branches, wires, or parts of buildings which could interfere with the delivery and installation of the concrete structure. Most trucks will need to get within 0.91M (3ft) to 2.44M (8ft) of the excavation to be unloaded.

Excavation:

Prior to excavation, all buried utilities should be located. Excavations should be made with a moderate clearance around the installed tank. More space should be provided as needed if other work than installation is required. Excavations should be sloped as needed to comply with construction safety requirements. Excavated materials should be stockpiled a sufficient distance from the excavation so as not to impair the movement of installation equipment.

Bedding:

Proper use of bedding material is very important to ensure a long service life of an onsite septic system. Bedding material should be provided on a site specific basis to yield a uniform bearing surface and to ensure that the structure will not be subject to adverse settlement. In most cases, a bedding of 150mm (6") of 20mm to 25mm (3/4" to 1") clean stone is sufficient. After placing the stone, it must be leveled with special attention that there are no large stones or rocks that could cause pressure points under the bottom of the installed tank. Sites with silty soils, high water tables or other "poor" bearing characteristics must have specially designed beddings or bearing surfaces. In the event of excess excavation, any backfill to be replaced must be adequately compacted.

Joint Seals:

Care must be taken with joint seals on concrete structures. High quality preformed joint seals must be placed on carefully cleaned surfaces. Seals shall meet minimum compression and other installation requirements as prescribed by the seal manufacturer. Tank sections sealed on site should not be backfilled until the sealant has settled.

Backfilling:

When backfilling, native materials can be used provided there are no large rocks or stones placed against the tank. Equipment used to backfill should not place their weight beyond the edges of the excavation. While concrete tanks are heavy, they can float if the water level in the hole is allowed to rise to a high level. Floatation can be prevented by placing soil on top of the tank. In colder climates, it is recommended that tanks be insulated before backfilling. In a septic system, cold temperatures decrease the microbial action within the tank, reducing waste treatment. Tanks which are unused for periods of time can freeze, causing the tank to break.

Polylok Lids and Risers:

Anchor Concrete Products carries a full line of Polylok-brand septic products, including access risers and filters designed to retrofit to your existing septic tank. Our lineup of residential septic tanks all feature Polylok risers cast-in, allowing easy expandability for at- or above-grade pumping access. You'll never have to dig down to pump your tank again. For more information and product drawings, please visit: [Polylok's Site](#)