



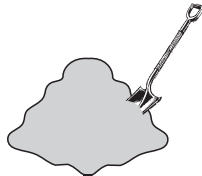
## Excavation and Trenching Safety



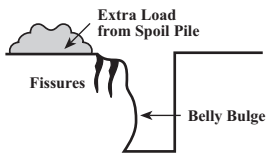
According to the OSHA construction safety and health standard, 1926.650(b), a trench is referred to as a narrow excavation made below the surface of the ground in which the depth is greater than the width—the width not exceeding 15 feet (4.5 meters).

A competent person must preplan prior to digging and be knowledgeable in, but not limited to, the following:

- Soil classification “A, B or C”
- Environmental conditions
- The use of protective systems
- The requirements of the standard



**Soil is heavy! Do NOT enter an unprotected trench!**

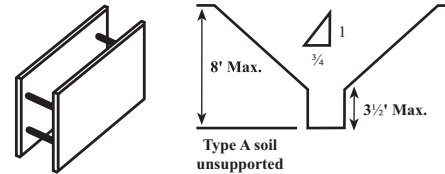


- An unsupported excavation can create an unbalanced stress in the soil, which, in turn, causes subsidence at the surface and bulging of the vertical face of the trench. If uncorrected,

this condition can cause face failure and entrapment of workers in the trench.

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Employees should be protected from cave-ins by using an adequately designed protective system.



Some of the protective systems for trenches are:

- Sloped for stability; or
- Cut to create stepped benched grades; or
- Supported by a system made with posts, beams, shores or planking and hydraulic jacks; or
- Supported by a trench box to protect workers in a trench.

Additionally, excavated or other materials must be at least 2 feet back from the edge of a trench; and a safe means of egress must be provided within 25 feet of workers in a trench.

*Adapted from OSHA Quick Card 3243-03R-05, U.S. Department of Labor.*



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