

# DJM SYSTEM

Dry jet mixing



## Dry Jet Mixing Method

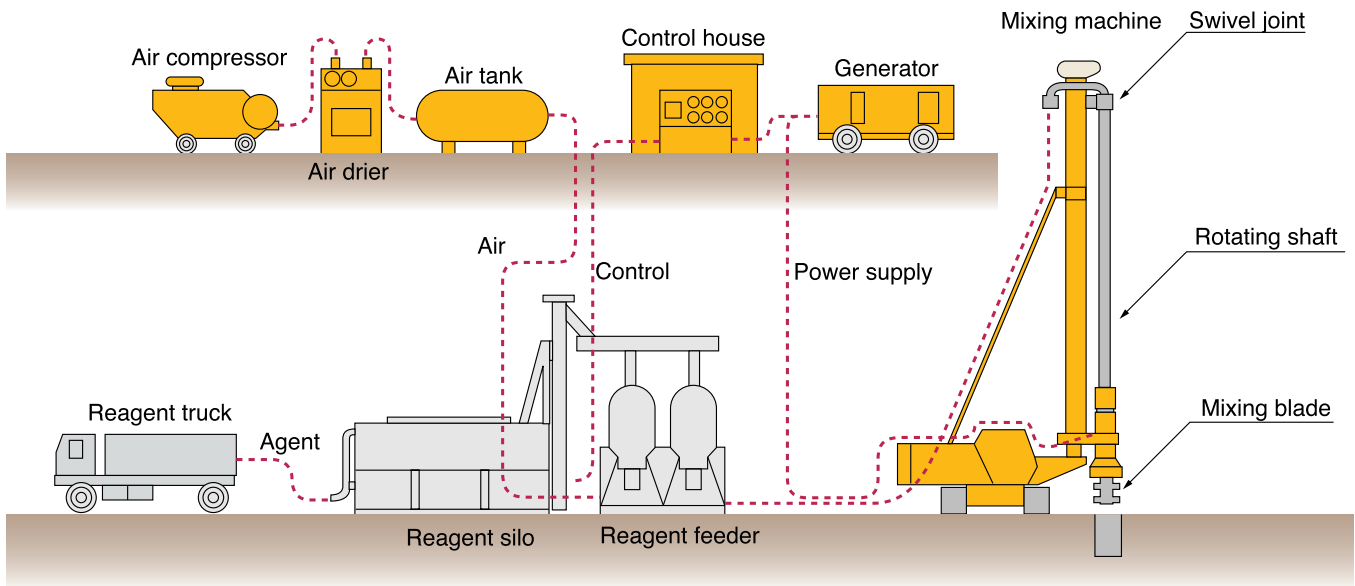
- 1 Dry Jet Mixing (DJM) uses mixing blades to mix dry reagents, such as cement or lime, with in situ soils to increase the strength and reduce the compressibility of the soft ground.
- 2 In addition to cement and lime, other dry powders or particles with sizes less than 5 mm can be used. The type and quantity of reagent used are dependent on the soil properties and the physical requirements of the treated soil.
- 3 The mixing action of the blades creates an even distribution of reagent in the soil. According to the soil type, the reagent dosage can be adjusted to different soil strata.
- 4 DJM employs a highly advanced automatic monitoring system which provides continuous and accurate records of the soil mixing depth, penetration and withdrawal speeds, blade rotation speed, and reagent injection rate.
- 5 DJM does not need water for slurry preparation. Operation without water keeps the site clean and also minimizes the quantity of construction spoils.
- 6 DJM uses a closed system to transport and inject reagent into the soil. Thus, little dust is introduced into the air. The operation is safe and creates a minimal amount of noise and ground vibration.
- 7 The mixing machine used is mobile and can be easily relocated to the next soil mixing location at site. The reagent feeder is automatic which saves on labor while maintaining efficiency.



## Arrangement

Since the development of the DJM method in 1980 by the Civil Engineering Research Institute of Japanese Ministry of Construction, more than 2,500 projects have been completed. The total volume of soil-cement produced exceeds 15 million cubic metres. It is also proven to be effective for liquefaction prevention.

## Line-up of DJM system



## Working Procedure

