

# Bert's Drillin' Juice

# **Ground Conditioner for Tunnel Boring Machine Excavation**

Bert's Drillin' Juice is a concentrate designed specifically for conditioning sands and silts where additional lubrication at the cutting face and muck stability during handling is desired.

# TYPICAL APPLICATIONS

- Bert's Drillin' Juice is for use with Earth Pressure Balance Tunnel Boring Machines
- Muck is conditioned immediately at the cutting face by injecting Bert's Drillin' Juice through ports in the cutterhead
- The concentrate is diluted with water (2% depending on ground conditions) either in a surface plant or on the TBM





# **FEATURES AND BENEFITS**

- Lubricates the cutting face, thereby reducing wear of tools, cutterhead, and screw conveyors
- Reduces cutterhead torque in harder sands and silts with additional lubrication properties
- Contains additional binders to help keep silts and sands together on conveyor belts
- Facilitates the propagation of bubbles in the foam, creating perfect EPB foam
- Helps to homogenize excavated material, resulting in better pressure control at the face
- Made in the USA
- Readily available
- Just-In-Time delivery possible
- Available in bulk trucks, totes, and drums

Characteristic	Value
Form	Liquid
Color	Red
Density at 20°C	1.06 g/cm <sup>3</sup>
VOC Content	0.00%
Biodegradability	Biodegradable

# Bert's Drillin' Juice

#### **GUIDELINES FOR USE**

# Application:

Bert's Drillin' Juice can be used with standard foam generators on Earth Pressure Balance (EPB) Tunnel Boring Machines (TBMs). Foam can be injected directly onto the cutting face through the cutterhead, into the excavation chamber, or into the screw conveyor.

# Dosage:

The concentrate dosage, Foam Injection Ratio (FIR), and Foam Expansion Ratio (FER) all depend on the conditions of the soil encountered. Typically, Bert's Drillin' Juice concentrate is diluted between 1%-4% with water. In sandy/silty ground FIR in the range 30%-80% and FER between 4:1 and 15:1 are expected.

# Required Equipment:

Bert's Drillin' Juice is compatible with standard foam generators.

To prevent mixing of non-approved additives, it is recommended to use a dedicated transfer and/or dosing pump for Bert's Drillin' Juice. If a single pump is used for more than one product, the pump should be thoroughly cleaned with water before switching to Bert's Drillin' Juice.

# STORAGE AND HANDLING

# Temperature and Shelf Life:

Bert's Drillin' Juice should be stored between 40°F and 105°F (5°C and 40°C). Do not allow product to freeze. If stored in the original tightly closed containers, Bert's Drillin' Juice will have a shelf life of 12 months.

# Safety

Standard precautions for handling chemical products should be observed. Avoid eye and skin contact; wear protective gloves and safety goggles. If contact occurs, rinse with water. In case of eye contact, seek medical advice. For further information refer to the Safety Data Sheet.

# **PACKAGING**

Bert's Drillin' Juice is available in bulk, totes, and drums.

# **RELATED DOCUMENTS**

Safety Data Sheet.

#### ADDITIONAL INFORMATION

For additional information please contact your sales representative.

# LIMITED WARRANTY NOTICE

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