# METAL/NONMETAL
# Serious Accident

**Underground – Sandstone**– On March 24, 2018, two miners were using a man-lift to charge (load) blast holes with non-electric blasting caps, 8-grain boosters and ammonium nitrate fuel oil (ANFO) blasting agent. During the loading process, one of the non-electric shock-tubes became wedged on the man-lift basket. As the man-lift operator progressed across the face loading the blast holes, the wedged shock-tube stretched and broke (snapped) causing a pre-detonation of a blast hole. As a result of the pre-detonation, one miner received minor injuries and the other miner serious injuries.

## Best Practices

- Explosive materials should be kept organized and under the direct observation of the blaster during loading operations so personnel and equipment does not inadvertently come in contact with them.
- The manufacturer's recommendations regarding maximum loading on the tubing are to be followed (e.g. maximum primer weight lowered into hole by the tubing).
- Shock tubing is not to be subjected to undue tension by pulling, in hole to hole situations.
- Situations in which shock tubing is subjected to impact by falling rock, equipment etc. is to be avoided.
- Excess shock tubing can be coiled, but should not be cut off.
- Shock l tube downlines should be tied to pegs visible to vehicle operators.
- The blast crew should carefully consider the blast design and plan the loading sequence to avoid having to move over or too near to loaded holes.