BATTERY BREAKING

**DEFINITION:** Process by which casings of electric storage batteries are sawed or sheared open in order to remove plates, terminals and solution.

**Potential Hazards:**
- Aerosolized particles
- Corrosive liquids
- Hazardous vapors
- High-velocity flying parts
- Flammable/explosive gas (hydrogen)
- Noise
- Sharp objects/edges
- Slippery walking/working surfaces

**Guarding/Shielding:**
- Power-driven saws, cleavers, or shears used to cut battery casings must be guarded at the point of operation in such a way as to avoid injury caused by contact with moving parts, and impact from flying debris.

  - Where splash hazards exist, shielding must be in place.

**Protective Equipment:**
- Hard hats*
- Safety goggles*
- Face Shield*
- Corrosive-resistant steel-toe/steel shank work boots*
- Corrosive-resistant work gloves*
- Respirator with acid gas cartridge
- Hearing protection
*minimum requirements

**Safety Procedures:**
- Battery breaking operations likely will trigger a number of OSHA regulations. You should familiarize yourself with the standards for lead, arsenic, antimony, arsine, stibine, and sulfuric acid.

  - If located indoors, the area used for battery breaking must have forced air ventilation exhausted to a bag house or other emission control device.

  - Emergency showers must be readily accessible and clearly marked in areas where splashes could occur.
• Sufficient safe clearances must be allowed between machinery and adjacent aisles or passageways.

• Permanent aisles and passageways must be clearly marked.

• Motors and other electrical equipment must be grounded.

• All walking/working surfaces must be kept clean and dry.

• Where the vertical distance between walking or working surfaces exceeds four feet (48 inches), railings or fall protection equipment must be utilized.

• Designate and enforce a safety zone, the area in which the operator of the equipment must be while the equipment is in use.

• Keep suspended loads clear of walking/working areas, power lines, obstructions, buildings, and other hazardous locations.