# STEP 1: Machine/Equipment Inventory & Energy Audit

#### **Directions:**

Complete one form for each machine/equipment in your facility.

Use the information in Step 1 to develop Machine-Specific LOTO Procedures (see Step 2).

## 1. Describe the machine/equipment

SHORT NAME, MANUFACTURER, MODEL

SERIAL NUMBER(S)

DEPARTMENT/LOCATION

## 2. What kinds of energy power the machine/equipment?

Electrical Energy	Volts	Phase	AC or DC
Source 1			
Source 2			
Source 3			
Source 4			
Source 5			

Potential Energy	Stored/Residual?	Dissipation time
Pneumatic		
Hydraulic		
Gravity		
Mechanical		
Thermal Energy		
Hot		
Cold		

#### **Other energy sources:**

### 3. Identify Potential Hazards (check box $\sqrt{}$ )

- □ Crushing injury
- $\Box$  "Caught in" injury
- Electrical shock
- Hot or cold burn
  Hearing injury
- Eye contamination

Other:

# 4. Identify all Energy Isolating Devices

Note: Examples of Energy Isolating Devices include disconnect switches, circuit breakers, line or ball valves, etc. "Lockout Capable" means the device has a hasp or other means through which a lock can be attached.

	ТҮРЕ	LOCATION	OPERATION	Lockout Capable?
DEVICE 1				
DEVICE 2				
DEVICE 3				
DEVICE 4				
DEVICE 5				

#### Note:

Examples of stored energy include electricity in capacitors, air pressure in lines, coiled springs, elevated parts that could fall, and hot or cold pipes that take time to cool down or warm up.

# **STEP 2: Machine-Specific Lockout/Tagout Procedures**

(Directions: Use the information gathered in Step 1 to complete Step 2)

# A. SHUTDOWN PROCEDURES -- Establishing Lockout/Tagout

**1. NOTIFY** all affected employees that the machine or equipment will be shut down and locked/tagged out for servicing. Name who and how they will be notified:

**2. SHUTDOWN** *the machine or equipment. List the steps to shut down the machine/equipment, including the type and location of the operating controls:* 

3. ISOLATE the machine/equipment from its energy sources. List types, locations, and operation procedures for all Energy Isolating Devices.

	Туре	Location	Operation
Device 1			
Device 2			
Device 3			
Device 4			

**4. APPLY** *lockout/tagout devices to the Energy Isolating Devices. List the type of lockout device that will be used on each Energy Isolating Device.* 

Energy Isolating Device	Lockout Device Description
Device 1	
Device 2	
Device 3	
Device 4	

5. CONTROL all stored/residual hazardous energy. List the types of stored energy and how to dissipate or restrain.

Energy Type	Method to Dissipate or Restrain

**6. VERIFY** *that the machine/equipment has been isolated by attempting to restart it. Describe how to attempt to restart the machine/equipment.:* 

## B. **RESTART PROCEDURES** – Removal of Locks and Tags

- 1. <u>Check</u> *equipment and surrounding area to ensure all tools, etc. have been removed and equipment is operationally intact.*
- 2. <u>Verify</u> that all employees are in a safe area, and controls are in a neutral position.
- 3. <u>**Remove Locks and Tags**</u> in the reverse order they were applied, and reenergize.
- 4. **<u>Notify</u>** affected employees when servicing is complete and equipment is ready for use.
- 5. List any additional steps: