

# LOCKOUT-TAGOUT IN ELECTRIC ENVIRONMENTS

The safest way to avoid electric risks when working on an installation is working with the power off, subject to being certain that voltage has been eliminated and remains eliminated.

Lockout-Tagout is a series of steps designed to cut off the power of an electric structure (either totally or partially), to check that this is effective and then to guarantee that the structure power fully remains cut during the work.

Lockout-Tagout guarantees staff safety, but also protects installations.



## THE 5 LOCKOUT-TAGOUT STEPS

(REGARDING EN 50110-1)



#### STEP N°1: SEPARATE

THIS INVOLVES CUTTING THE POWER SUPPLY. SEPARATION IS CARRIED OUT USING A CIRCUIT BREAKER OR CUT-OFF SWITCH.



#### **STEP N°3: IDETNTIFY**

MAKE SURE THAT THE LOCKED OUT INSTALLATION IS IN FACT THE ONE ON WHICH THE OPERATOR WILL BE WORKING



#### STEP N°2: LOCKOUT

PREVENT POWER BEING RESTORED BY MECHANICALLY BLOCKING THE SEPARATION DEVICE. SIGNAL AND WARN BY MEANS OF A DISPLAY DEVICE.



# STEP N°4: CHECK THE ABSENCE OF VOLTAGE

MAKE SURE THAT THE LOCKED OUT INSTALLATION IS POWERED OFF USING A VOLTAGE DETECTOR.



#### STEP N°5: CARRY OUT EARTHING AND SHORT-CIRCUITING

INSTALL AN EARTHING AND SHORT-CIRCUITING DEVICE IN ORDER TO PROTECT FROM AN ACCIDENTAL RETURN OF VOLTAGE OR THE PRESENCE OF RESIDUAL ENERGY, INDUCED VOLTAGE OR LIGHTNING.



# THE IMPORTANCE OF THE LOCKING DEVICE IN THE LOCKOUT-TAGOUT PROCEDURE

Because locking out is not an ordinary process, the locking device must meet specific characteristics:

- The separation device must be locked in the open position using mechanical locking (padlock, lock or similar).
- > Signage informing of the lockout bearing the following information:
- Lockout removal prohibited
- Name of the person who initiated the lockout
- Lockout date
- Other (purpose, structure identification, etc.)

Sibille Safe lockout padlocks meet all these criteria with their set of innovations, in particular the exclusive dater function that prevents all risks of the lockout date from being erased.



## THE LEGISLATIVE FRAMEWORK



- > The 89/655 EEC directive covers minimum health and safety instructions for the use and maintenance of industrial equipment by workers.
- Article 19: "Employers must guarantee worker safety and protection and take the necessary measures to reduce risks to a minimum".
- Article 2: 14: "All working equipment must be fitted with clearly identified systems that are used to isolate each energy source. Reconnection supposes the absence of danger to the workers involved. ".
- > EN 50110-1 standard (Operation of electrical installations) recalls the minimum specifications and invites to work off voltage. This standard reminds us of the importance of protecting against recharging by giving priority to locking the operating mechanism (padlock).
  - Article 6.2 indicates the 5 essential safety steps to be followed to ensure that an installation is de-energized and remains de-energized for the duration of the intervention. These 5 steps are:
  - 1. Disconnect completely.
- 2. Secure against re-connection; Article 6.2.2 states "All switching devices that have been used to disconnect the electrical installation for the work activity shall be secured against re-connection, preferably by locking the operating mechanism. ... All signaling and interlocking systems used for this purpose shall be reliable."
- 3. Verify that the installation is dead.
- 4. Carry out earthing and short-circuiting.
- 5. Provide protection against adjacent live parts.
- > EN ISO 14118 standard indicates the requirements for built-in safety measures intended to prevent the accidental restart of the machine in order to allow completely safe human interventions in dangerous zones.



> BS 7671:2008 standard
In the UK the Provision of Work Equipment Regulations – Regulation 19 – Isolation from Sources of Energy specifies: "Every employer shall ensure, that where appropriate, work equipment is provided with suitable means to isolate it from all its sources of energy. Every employer shall take appropriate measures to ensure that reconnection of any energy source to work equipment does not expose any person using the equipment to any risk to his health or safety."

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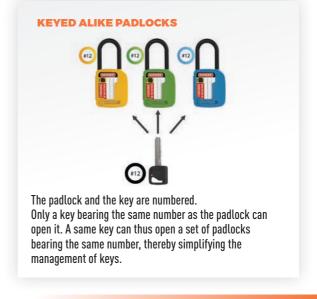
#### **OSHA Occupational Safety and Health Standards**

- > The OSHA standard for The Control of Hazardous Energy (Lockout/Tagout), Title 29 Code of Federal Regulations (CFR) Part 1910.147, addresses the practices and procedures necessary to disable machinery or equipment, thereby preventing the release of hazardous energy while employees perform servicing and maintenance activities. The standard outlines measures for controlling hazardous energies—electrical, mechanical, hydraulic, pneumatic, chemical, thermal, and other energy sources.
- > In addition, 29 CFR 1910.333 sets forth requirements to protect employees working on electric circuits and equipment. This section requires workers to use safe work practices, including lockout and tagging procedures. These provisions apply when employees are exposed to electrical hazards while working on, near, or with conductors or systems that use electric energy.

#### REMINDER OF THE 2 LOCKOUT PADLOCK KEY SYSTEMS

On the lockout padlock market, it is usual to see two different key systems. The 2 key systems are available for all our Sibille Safe padlocks.







# SIBILLE SAFE LOCKOUT PADLOCKS

# INNOVATION AT THE SERVICE OF SAFETY

We have designed and developed a line of innovating lockout padlocks that combine practicality, ergonomics and aesthetics.



#### AN INTERCHANGEABLE SHACKLE SYSTEM

Our Sibille Safe lockout padlock line is the only one on the market to have an interchangeable shackle system. This feature allows the quick adaptation of the shackle to the installation to lock out without needing to change the padlock.

- > We offer 7 different shackles that adapt to all our padlocks:
  - Height 36 or 72 mm
  - Metal or composite material
  - 4.5 mm or 6 mm diameter or ultra-thin Ø 1.4 mm cable



Pressing the push button on the front face once releases the shackle when the padlock is open in order to replace the shackle.

Always prefer a shackle diameter that corresponds to actuating member to be locked out in order to avoid any looseness that would make it possible to reactivate the installation.





## **EXCLUSIVE DATING SYSTEM**

- > We have developed a padlock that has a built-in dating wheel function that is exclusive on the market which brings 2 benefits in the field:
  - Installation time saving
  - Permanent information: the date is impossible to change when the padlock is closed.

We also offer a classic lockout padlock without a dater function.

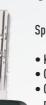


According to the applicable standards, the lockout date is an essential item of data that must be featured on the lockout device.

Our exclusive system prevents any deliberate or accidental erasure of this information.







# THE SIBILLE SAFE KEY SYSTEM

Special care has been taken over our padlock key specifications.

- Keys combining punches and grooves to high security levels
- Over 1.000.000 possible blade profile variations
- Guaranteed key number traceability and assignment of specific key numbers, Sibille Safe manages key blade profiles and their traceability independently.
- Captive key system: it is impossible to remove the key if the padlock is not locked
- Automatic return cylinder

All our padlocks are available with a keyed different or keyed alike system.



Remember to carefully choose original key numbers to avoid the entire profession focusing on the same numbers. We are also at your disposal to guide you.



# **CUSTOMISE YOUR PADLOCKS**

We offer to customise your lockout padlocks using laser engraving to add a lockout supervisor name, a company name or a training organisation name.



## **MADE IN FRANCE**

Sibille Safe wants to propose faultless quality safety products, which is why it naturally decided to design and produce them in its French factories.



# **LOCKOUT PADLOCKS**

# **CLASSIC**



# > ALL THE COLOUR AND SHACKLE LINE AVAILABLE





# **LOCKOUT PADLOCKS**

# WITH DATER



# > ALL THE COLOUR AND SHACKLE LINE AVAILABLE





# **HOW TO ORDER YOUR PADLOCK**

#### 1 - SELECT THE BODY MODEL



CLASSIC **PADLOCK** Code: CS



**PADLOCK** Code: CD

### 2 - SELECT THE KEY SYSTEM (AND THE PADLOCK NUMBER)



**KEYED DIFFERENT PADLOCKS** 

Code: KD



#### **KEYED ALIKE PADLOCKS**

Code: KD + add the required key n° From 0301 to 0400 (contact us for specific key numbers)

#### 3 - SELECT YOUR COLOUR



**ORANGE** Code: 1



**RED** Code: 2



Code: 3



Code: 4



Code: 5



Code: 6



Code: 7



Code: 8

#### 4 - SELECT THE SHACKLE FITTED TO THE PADLOCK

## 5 - ADD EXTRA SHACKLES IF YOU SO REQUIRE



#### 6 - CUSTOMISE YOUR PADLOCK IF REQUIRED

## BREAKDOWN OF A COMPLETE REFERENCE



# **LOCKOUT PADLOCK REFERENCES**



#### **CLASSIC - KEYED DIFFERENT**

Reference	Choice of colours (corresponding code)	Shackle material	Shackle inside height	Shackle diameter
CS-KD-x-M438	Orange (1)	Metal	38 mm	4.5 mm
CS-KD-x-M476	Red (2)	Metal	76 mm	4.5 mm
CS-KD-x-M638	Blue (3)	Metal	38 mm	6 mm
CS-KD-x-M676	Green (4)	Metal	76 mm	6 mm
CS-KD-x-P438	Yellow (5)	Composite	38 mm	4.5 mm
CS-KD-x-P476	Brown (6)	Composite	76 mm	4.5 mm
CS-KD-x-P638	White (7)	Composite	38 mm	6 mm
CS-KD-x-P676	Black (8)	Composite	76 mm	6 mm
CS-KD-x-F1		Metal wire with vinyl sheath	70 mm	1.4 mm

Replace the reference x by the required colour code as shown in the table (1 to 8). The padlock is supplied with 1 shackle, 1 key and 1 set of lockout tags in 6 languages.



## **CLASSIC - KEYED ALIKE**

Reference	Available key numbers	Choice of colours (corresponding code)	Shackle material	Shackle inside height	Shackle diameter
CS-KA#-x-M438			Metal	38 mm	4.5 mm
CS-KA#-x-M476		Orange (1)	Metal	76 mm	4.5 mm
CS-KA#-x-M638		Red (2)	Metal	38 mm	6 mm
CS-KA#-x-M676	0301 to 0400	Blue (3)	Metal	76 mm	6 mm
CS-KA#-x-P438		Green (4)	Composite	38 mm	4.5 mm
CS-KA#-x-P476		Yellow (5)	Composite	76 mm	4.5 mm
CS-KA#-x-P638		Brown (6)	Composite	38 mm	6 mm
CS-KA#-x-P676		White (7)	Composite	76 mm	6 mm
CS-KA#-x-F1		Black (8)	Metal wire with	70 mm	1.4 mm
			vinyl sheath		

Replace the reference # by the required key number (4 digits). For specific key numbers, contact us. Replace the reference x by the required colour code as shown in the table (1 to 8). The padlock is supplied with 1 shackle, 1 key and 1 set of lockout tags in 6 languages.



## **WITH DATER - KEYED DIFFERENT**

Reference	Choice of colours (corresponding code)	Shackle material	Shackle inside height	Shackle diameter
CD-KD-x-M438		Metal	38 mm	4.5 mm
CD-KD-x-M476	Orange (1)	Metal	76 mm	4.5 mm
CD-KD-x-M638	Red (2)	Metal	38 mm	6 mm
CD-KD-x-M676	Blue (3)	Metal	76 mm	6 mm
CD-KD-x-P438	Green (4)	Composite	38 mm	4.5 mm
CD-KD-x-P476	Yellow (5)	Composite	76 mm	4.5 mm
CD-KD-x-P638	Brown (6)	Composite	38 mm	6 mm
CD-KD-x-P676	White (7)	Composite	76 mm	6 mm
CD-KD-x-F1	Black (8)	Metal wire with vinyl sheath	70 mm	1.4 mm

Replace the reference x by the required colour code as shown in the table (1 to 8). The padlock is supplied with 1 shackle, 1 key and 1 set of lockout tags in 6 languages.



## **WITH DATER - KEYED ALIKE**

Reference	Available key numbers	Choice of colours (corresponding code)	Shackle material	Shackle inside height	Shackle diameter
CD-KA#-x-M438			Metal	38 mm	4.5 mm
CD-KA#-x-M476		Orange (1)	Metal	76 mm	4.5 mm
CD-KA#-x-M638		Red (2)	Metal	38 mm	6 mm
CD-KA#-x-M676		Yellow (5)	Metal	76 mm	6 mm
CD-KA#-x-P438	0301 to 0400		Composite	38 mm	4.5 mm
CD-KA#-x-P476			Composite	76 mm	4.5 mm
CD-KA#-x-P638		Brown (6)	Composite	38 mm	6 mm
CD-KA#-x-P676		White (7)	Composite	76 mm	6 mm
CD-KA#-x-F1		Black (8)	Metal wire with	70 mm	1.4 mm
			vinyl sheath		

Replace the reference # by the required key number (4 digits). For specific key numbers, contact us. Replace the reference x by the required colour code as shown in the table (1 to 8). The padlock is supplied with 1 shackle, 1 key and 1 set of lockout tags in 6 languages.

# COMPLEMENTARY LOCKOUT PRODUCTS



#### **ULTRA-THIN HOLE LOCKOUT**

#### USB14X200

Using the USB14X200 lockout device, it is easy to lock out individual main circuit breakers or other systems with very small holes and then lock mechanically using a lockout padlock.

#### **Specifications**

Composite body

Vinyl-coated cable locking system: max. cable diameter: 1.4 mm

Passage hole for padlocks with a max. 6 mm diameter shackle (padlock not included).

Reference	Dimensions (mm)	Weight (g)
USB14X200	147 x 31 x 14	25



# **CIRCUIT BREAKER LOCKOUT**

#### **SFESCG**

To lock out lever-operated circuit breakers using a single system.

Designed to adapt to almost all circuit breakers and lever switches on the market.

#### **Specifications**

Red NYLON body

Extendible metal spring to adapt to all circuit breaker widths

Reference	Description	Weight (g)
SFESCG	Circuit breaker lockout	8



# **80 MM PLASTIC LOCKOUT TAG**

S349 - S350C11

Ø 10 mm hole in the upper part.

Colour: red background, white printing

Reference	Symbol	Diameter (mm)	Dimensions (mm)
S350 GBC11	Lightning	80	7



# HOLLOW "DEVICE LOCKED OUT, DO NOT OPERATE" PLASTIC TAG

S350C1233-GB

#### **Specifications**

Colour: red background, white printing

Reference	Diameter (mm)	Hollowed cross	Weight (g)
\$350C1233-GR	33	18 v 6 mm	3



#### **LOCKOUT TAG**

#### ETI-01GB

Allows the use of indelible markers. Text: DANGER - LOCKED OUT Sold in packs of 10 units. PVC 0.3 mm material.





#### **PADLOCK RACK**

#### **IS47**

In addition to transport, lockout racks are used to check the number of padlocks when removing the

#### **Specifications**

Composite material rack delivered without padlocks or keys.

Reference	Number of holes	Dimensions (mm)	Weight (g)
IS47 4TROUS	4	150 x 115 x 9	85
IS47 6TROUS	6	150 x 115 x 9	85
IS47 10TROUS	10	150 x 115 x 9	85
IS47 20TROUS	20	340 x 80 x 5	70



# LOW AND HIGH VOLTAGE "ELECTRIC WORKS WITH POWER CUT" SIGN

S753ALNM-GB - S754ANLM-GB

Aluminium sign reminding of electric safety rules for low or high voltage works with the power supply cut.

Reference	Model	Dimensions (mm)	Weight (g)
S753ALNM-GB	Low voltage	500 x 350	470
S754ALNM-GB	High voltage	500 x 350	470



### **PERSONAL PADLOCK CARRIER**

## **SFEPCP**

#### **Specifications**

Ultra-strong Cordura textile

1mm steel cable with 2mm black polyethylene coating and key crimping sleeve.

Plastic eyelets to attach the padlocks

Nylon belt support

3 storage compartments

Erasable pen included

3 films to create personal labels included

Reference	Description
SFEPCP	Personal padlock carrier



## **LOCKOUT-TAGOUT PANEL**

#### **SFEPAC**

This panel makes it easier to manage site level lockouts. On its front part: display of the lockout-tagout sheet

On its back part: storage of documents

On its lower part: positioning of the keys used to lockout

Reference	Model
SFEPAC01	No back and no magnet
SFEPAC02	Back and magnet
SFEPAC03	No back with magnets



## **SEMI-PERMANENT MARKER**

#### C388

Used to write the required information on the lockout tags

Référence	Colour
C388N	Black
C388N	Blue
C388R	Red
C388V	Green

## INTERNATIONAL



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