

# Javo 'Compact' Robot

## Placing and Pick-up

Versie 1



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About This Manual

## 1.1 General

This user manual has been written with the most possible care, and is intended for anyone who uses the Javo 'Compact' placing and pick-up robots.

It describes the features, startup, and operation and other important information.

Read and understand this manual before you use the machine or do maintenance.

**Javo b.v.** takes no responsibility for mistakes in this manual, or for any consequences from its use.

The Safety and Troubleshooting chapter provide tips and solutions for common problems and other information you may need.

This chapter provides an overview of the information included, along with notation and icon descriptions and other documentation for your reference.

## 1.2 Declaration of Conformity

**TRÄDGÅRDSTEKNIK AB**  
**Helsingborgsv., Varalöv**  
**262 96 ÄNGELHOLM**

declare completely under our own responsibility, that the product

**Javo 'Compact' placing and pick-up robot CE-Nr:.....**

To which this application applies,

is in agreement with the rules of the machine directive

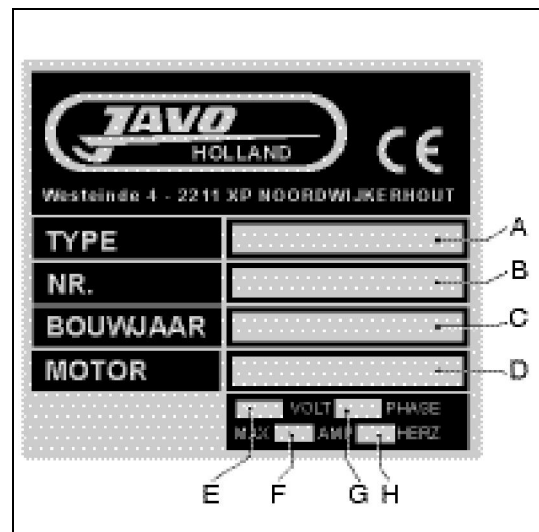
89/392/EEG, including 91/368/EEG, 93/44/EEG and 93/68/EEG,98/37/EC.

### 1.3 The CE-mark

The CE-mark is shown on the robot body. In combination with the registration plate.

### 1.4 Type plate

- A. Type name of the machine
- B. Unique serial number of the machine
- C. Year of building
- D. Motor
- E. Mains voltage
- F. Maximum Mains current
- G. Number of phases
- H. Cycles



## 1.5 Descriptions of used icons

Below is a list of the notes, cautions and warnings used throughout this guide. They consist of an icon, followed by text in bold or italic type.



**NOTE:**

*This icon indicates important information and tips that help you make better use of the machine.*



**CAUTION:**

*This icon indicates information that tells you how to avoid either potential damage to the machine.*



**WARNING:**

*This icon indicates the potential for bodily harm and tells you how to avoid the problem..*

## 2 Safety

### 2.1 Safety precautions

Always keep hands, hair, loose clothing and/or jewellery away from moving parts of the machine



**WARNING:**

*Use of controls, adjustments or procedures other than those specified in this documentation may result in exposure to shock electrical hazards and/or mechanical hazards.*

Read and follow these instructions before you connect and use the machine.

Unplug the machine:

when it is not in use  
before moving the machine  
before cleaning  
before maintenance  
changing pot size.



**NOTE:**

*Consult supplier if the machine does not operate normally although the operating instructions given in this manual have been followed.*

## 2.2 Dangerous situations

The figure below shows the emergency stops and the safety marks on the machine with references to the potential risks.



*The fork moves in a linear system. During the process there is a risk of injury by turning parts. Only approach when the system is switched out.*



A Read and understand this manual before you use the machine or do maintenance.



B Risk of injury by turning parts.



C Risk of injury by electric shock.



D Risk of injury by clamping parts.



E-F Emergency stop.

## 2.3 Emergency stop

There are two emergency stop buttons on the machine. They are situated on both sides of the machine on the side panel.

The procedure to reset the machine after an emergency stop is described in paragraph 5.3.



**WARNING:**

*Before resetting the emergency stop, make sure that the problem has been solved and the machine is safe to start up again.*



**WARNING:**

*Never move the machine when the mains cord is connected to the power supply.*

## 2.4 Electrical protection

The motors of this machine are protected by circuit breakers. These are located inside the side panel box.

If one of the circuit breakers is switched OFF, turn the black button of that circuit breaker to restart the machine. If the circuit breaker switches OFF again, trace the cause of the breakdown and solve the problem.



**CAUTION:**

*Never use the circuit breakers to turn the machine ON and OFF.*

### 3 General

This machine automatically pick up or put down plant containers (pots) by moving a fork in horizontal and vertical direction. The robot is integrated in a stationary automatic processes.

#### 3.1 Overview of the total machine



#### Before Start-up

Before startup make sure that the following points are correct.

Covers and doors.

All the covers and doors of the machine are closed and secure.



**CAUTION:**

*Always check the rotation direction of the, after the machine has been relocated and connected to another socket.*



## 4 Installation

Installation of the machine must be carried out by the supplier or representatives of the manufacturer.

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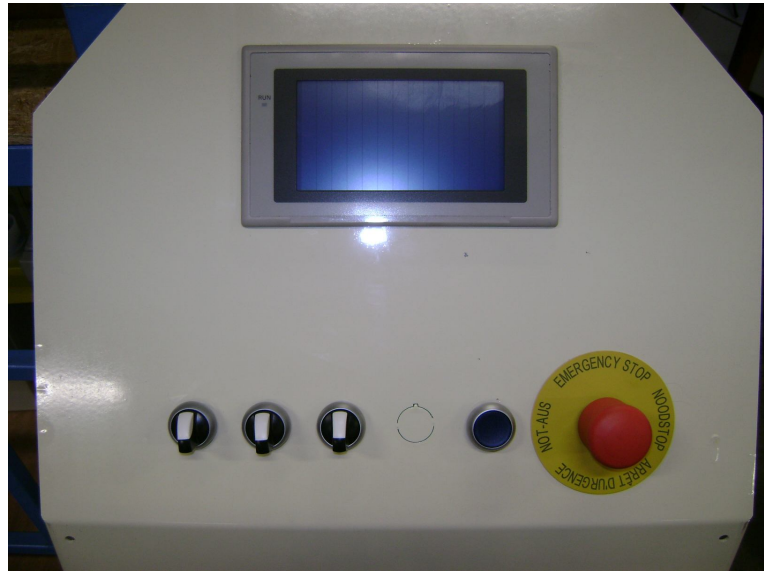
Representative in USA  
**Javo USA Inc.**  
**1900 Cobb Intl. Blvd., Ste. G&H**  
**Kennesaw, GA 30152**  
**1-800-USA-Javo**

There is no information about installation inside this manual.

## 5 Operating the machine

### 5.1 Instructions for use

On the machine 'instructions for use' stickers are present.



**1 2 3 4 5**

1. Manual control Vertical movement
2. Manual control Horizontal movement
3. Manual control Container transport
4. Reset Emergency stop
5. Emergency stop

**POWER**

A Connector for continuous electrical power  
OUT

**Continuous**

B Connector for continuous electrical power  
IN

## 5.2 Normal startup

On the machine one control panel is provided.  
One on a flexible cord.

Make sure that the machine is in a normal condition. (See paragraph 3.2 'Before start up').
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Switch ON the main switch on the front panel.
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The lamp (E) will light.
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Switch ON the drill motor the compost transport belt and the pot track with the switches (A+B+C) on the front panel.
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Press the green start button on the control box of the machine. (paragraph 5.3).
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## 5.3 Startup after an emergency stop

1. Make sure that the cause of the emergency stop is solved.
2. Make sure that all doors and covers are closed.
3. Pull out the actuated red emergency button (B or F) to reset.
4. Press the blue reset button on the door.

## 5.4 Normal stop

1. Press the black stop button (B) on the wander lead.

## 5.5 Emergency stop

1. Push the red emergency button (B) on the left side panel or right side panel on the machine (*chapter 5.2*), to activate the emergency stop.
2. To reset the emergency stop pull the res button an press the blue reset button.