Manual
Tintmaster TM300
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1 About this manual

The manual shows the information necessary to:
- install
- operate
- perform basic maintenance
- correct small problems.

The TM300 and all its versions are referred to in the manual as the 'machine'.

This manual contains the original instructions. The original language of the manual is English. All other language versions are translations of the original instructions.

1.1 How to work with the manual

For the safe use of the machine, it is important:
1 To familiarize yourself with the structure and content.
2 To read the safety chapter in detail and make sure you understand all the instructions. See chapter 2.
3 To carry out the actions completely and in the given sequence.

1.2 Record of changes

<table>
<thead>
<tr>
<th>Edition</th>
<th>Editor</th>
<th>Check</th>
<th>Date</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.0</td>
<td>EvT</td>
<td>TB</td>
<td>08/2015</td>
<td>First edition</td>
</tr>
</tbody>
</table>
2 Safety

WARNING
Read the manual before you install or use the machine. Failure to do so can result in personal injury, death or property damage.

2.1 Intended use

The machine is designed to dispense colorants into a can. Any other use of the machine is strictly forbidden.

2.2 Liability

2.2.1 General liability

Our machines and accessories are fully compliant with the CE regulations. Any modification can result in not fulfilling the CE safety requirements and is therefore not allowed. Fast & Fluid Management B.V. will not accept any responsibility in case of modifications to machines and/or accessories.

Fast & Fluid Management B.V. is not liable if you do not follow the rules below:

- The machine is for indoors use only.
- This machine may only be used for commercial settings. The machine is not a household appliance.
- Observe all local safety regulations.
- Mind the minimal requirement of the building structure of the load capacity of the floor.
- Place machine in a well-lit and well ventilated room.
- Install and connect the machine according to the instructions in this manual.
- Connect the machine to a grounded wall socket.
- Do not use extension cords or inadequately rated power cables.
- Make sure that the power cable is freely accessible.
- Do not place objects on top of the machine.
- Do not use a damaged machine. When you have doubts, contact your supplier. See §5.2.
- Keep the machine in good condition. Make sure that defective parts are immediately replaced.
- Replace parts only with original Fast & Fluid Management B.V. spare parts.

All maintenance beyond the scope of this manual must be carried out by a qualified service technician that Fast & Fluid Management B.V. has trained and certified.

2.2.2 Machine-specific liability

This machine is designed to dispense colorants into a can in non-hazardous conditions.

Please consult the health & safety officer of your paint supplier and/or colorant supplier on how to avoid the emergence of hazardous situations like personal harm or the risk for fire and explosion.

- Personal harm should be avoided by strictly following the materials safety data sheets (MSDS) for colorants, (base) paint and brush liquid.
- Do not use flammable liquids in the brush container.
- The use of flammable colorants or colorants that diffuse potential explosive vapors may present fire and explosion risks.
2.3 User qualification for installation

Only install the machine if you have written permission from the supplier of the machine.

2.4 CE certification

The machine is CE certified. This means that the machine complies with the essential requirements concerning safety. The directives that have been taken into consideration in the design are available on www.fast-fluid.com.

2.5 Safety symbols on the machine

- Central earthing point
- Electrical hazard
- Finger cut hazard
- Read the manual
- Read the manual
- Rotating parts hazard
- Read the manual
- Read the manual
- Instruction
- Refill canisters
- Read the manual
2.6 Safety symbols in the manual

WARNING
Can cause personal injury.

Note
Shows further information.

CAUTION
Can cause damage to the machine.

2.7 Disposal of the machine

1. Sort the machine, the accessories and the packaging for environmentally friendly recycling.
2. Do not dispose of the machine into domestic waste. Dispose of the machine according to local regulations.
3. Dispose of the canisters as chemical waste, according to the local regulations.
3  Operator manual

3.1 Description

3.1.1 Overview of the machine

A: Top cover
B: Display
C: Display window
D: Emergency stop switch
E: Can table
F: Foot pedal
G: Wheels
H: Side cover
I: Latch
J: Brush drawer with brush container
K: Pump with nozzle
L: Canister
3.1.2 Overview of the machine (back)

A: Net entry
B: Type plate
C: 5-Way socket
### Type plate: serial number

<table>
<thead>
<tr>
<th>Model</th>
<th>XXXX-XX Xxxxxxxxxx Xxxxx</th>
</tr>
</thead>
<tbody>
<tr>
<td>Brand</td>
<td>Xxxxxxxxxx</td>
</tr>
<tr>
<td>Serial Number</td>
<td>XXXXXXXXXXXX-XXXXXX</td>
</tr>
<tr>
<td>Production week</td>
<td>XX-XXXX</td>
</tr>
</tbody>
</table>

### Type plate: details

<table>
<thead>
<tr>
<th>Model</th>
<th>XXXX-XX-XXX</th>
</tr>
</thead>
<tbody>
<tr>
<td>Brand</td>
<td>Xxxxxxxxxxx</td>
</tr>
<tr>
<td>Serial no.</td>
<td>XXXXXXXXXX-XXXXXXX</td>
</tr>
<tr>
<td>Prod.week</td>
<td>XX-XXXX</td>
</tr>
<tr>
<td>Mass</td>
<td>XXkg</td>
</tr>
<tr>
<td>Fuse</td>
<td>X AT</td>
</tr>
</tbody>
</table>

Patented families: Design: ©
- Xxxxxxxxx
- Xxxxxxxxx
- Xxxxxxxxx

Made in Xxxxxx
3.2 Operation

**WARNING**
Only push the emergency stop switch in the case of a safety emergency.

Make sure that the problem is solved before you reset the emergency stop switch.

When you reset the emergency stop switch, the machine restarts automatically. When the machine is operational, you hear ‘beep beep’.

**CAUTION**
Do not remove the power from the machine. The machine must stir the colorants periodically.

3.2.1 General dispensing procedure
For all the software instructions: see the software documentation.

1. Place the can. See § 3.2.2.
2. Move the can table up. See § 3.2.3.
3. Choose the recipe and dispense. See the software documentation.
4. Move the can table down. See § 3.2.4.
5. Remove the can.

3.2.2 Place the can

1. Place the can (A) at the centre of the mark (B) on the can table.
3.2.3 Move up the can table

1. Hold the handle (A) of the can table.
2. Push and hold the foot pedal (B) with your foot. The can table is unlocked.
3. Move up the can table until the can is in front of the sensor (C). Use the handle.
4. Remove your foot from the foot pedal. The can table is locked.

3.2.4 Move down the can table

1. Hold the handle (A) of the can table.
2. Push and hold the foot pedal (B) with your foot. The can table is unlocked.
3. Move down the can table. Use the handle.
4. Remove your foot from the foot pedal. The can table is locked.

3.3 Maintenance

3.3.1 General cleaning: after every dispensing operation

1. Clean the machine with a cloth and remove all spilled colorant or other liquid.

**CAUTION**

Do not use cleaning agents based on organic solvents to clean painted or plastic parts of the machine.

3.3.2 Cleaning of the brush container: daily

**CAUTION**

If you do not clean these items daily, severe pollution will occur.
Remove the brush drawer
1. Remove the brush drawer (A). Use the hole.
   a. Lift the brush drawer.
   b. Pull out the brush drawer.

Remove the brush container
1. Remove the brush container (A) from the brush drawer (B).

Clean the brush container
1. Remove the liquid from the brush container. For the disposal of the liquid, follow the local regulations.

Put back the brush container
1. Put back the brush container in the brush drawer.

Fill the brush container
1. Fill the brush container until the brush rotates through the liquid. Use the liquid that your paint supplier indicates.

WARNING
Do not put flammable liquids in the brush container.
Put back the brush drawer

1. Put back the brush drawer (A) in the machine. *Use the hole.*
2. Push the brush drawer to the back. *The brush detection sensor inside the machine senses the brush.*

**Note**
Make sure that the brush drawer is put in position correctly, otherwise the machine does not function properly.

3.3.3 Filling of a canister

**WARNING**
Check the material safety data sheet (MSDS) of the colorants for the personal protection measures that are required for handling the colorant.

**CAUTION**
Make sure that the colorant level in the canister is correct. If a canister is empty, this can cause an inaccurate dispensing and/or a recipe fault.

**Note**
The software checks the level of colorant in each canister. The software on the machine shows when you need to refill a canister.

1. In the software, activate the fill canister option.
2. Open the top cover (A).
3. Remove the lid of the canister (B).
4. Add the colorant (C). Do not spill.
3.3.4 Using the emergency stop switch

1. Push the emergency stop switch (A). The machine stops immediately.

**CAUTION**
Only push the emergency stop switch in the case of a safety emergency. Do not use the emergency stop switch as an on/off function!

2. Solve the problem as quickly as possible.

**CAUTION**
When the machine is shut down, the stirring mechanism, which is necessary to keep the colorant in optimal condition, is also shut down.

3. Release the emergency stop switch by turning the emergency stop switch. The machine restarts automatically.

**Note**
After the release, the machine is operational when you hear two 'beeps'.
4 Installation

4.1 Unpack the machine

4.1.1 Remove the cardboard
1. Remove the cardboard (A) and the plastic from the outside of the machine.

4.1.2 Remove the transport screws
1. Open the side cover (A). Use the latches.
2. Remove the side cover.
3. Remove the transport screws (B).
4. Put back the side cover.
5. Close the side cover. Use the latches.
4.1.3 Remove the wooden beams

1. Remove the wooden beams.

4.1.4 Remove the plastic protection on the canisters

1. Open the top covers (A).
2. Remove the plastic protection (B).

4.1.5 Remove the tie wraps

1. Remove the tie wraps (A).
4.2 Put the machine in position

4.2.1 Move the machine from the pallet
1. Optionally, place a ramp (A).
2. Move the machine from the pallet on to the ground.

4.2.2 Move the machine to the final location

WARNING
Mind the minimum requirement of the load capacity of the floor. See § 6.2.

Note
Make sure the final location is well-lit and well-ventilated.
1. Move the machine to the final location.
2. Connect the power cable to the net entry.

CAUTION
Do not connect the power cable to the wall socket.
4.3 Install the computer

4.3.1 Remove the side cover
1. Open the side cover (A). Use the latches.
2. Remove the side cover.

4.3.2 Install the computer

Note
Usually, the computer already has the correct software and drivers installed. If not, see the instructions in the installation manuals of your software provider.

1. Put the computer (A) in the machine.
2. Connect the power cables of the computer and the screen to the 5-way socket (B).
3. Connect an USB cable between the computer and the power board (C).
4. Connect the keyboard, the mouse and the screen to the computer.

4.3.3 Put back the side cover
1. Put back the side cover.
2. Close the side cover. Use the latches.
4.4 Turning on the machine

1. Connect the power cable to the wall socket. When the machine is operational, you hear two ‘beeps’.
2. Make sure that the emergency stop switch is released. See § 3.3.4.

Note
The power cable is also used as a device to disconnect the power.

4.5 First use

1. Fill the brush container. See § 3.3.2.
2. Fill the canisters. See § 3.3.3.
3. Purge the canister. Use the purge command in the software. See the software documentation.
4. Do step 3 again for all canisters.

Note
First the air will come out of the nozzle. When the output is continuous, the tube is filled.
5 Troubleshooting

5.1 General troubleshooting procedure

1. Try to solve the problem with the information in this manual. See § 5.3 and § 5.4.

2. If it is not possible to solve the problem with the information in this manual, contact service. See § 5.2.

5.2 Contact service

1. Find the type plate on the rear of the machine. See § 3.1.4.

2. Take a note of the model number and the serial number of the machine.

3. Contact your supplier or manufacturer. See www.fast-fluid.com.

5.3 Audio signals

Note
See the column Possible solution to solve the problem. When the problem persists, contact service. See § 5.2.

<table>
<thead>
<tr>
<th>Problem</th>
<th>Possible cause</th>
<th>Possible solution</th>
</tr>
</thead>
<tbody>
<tr>
<td>••• – – – ••• SOS signal beeps</td>
<td>The agitation motor is malfunctioning, a cable is broken or the power board is malfunctioning.</td>
<td>Contact service. See § 5.2.</td>
</tr>
<tr>
<td>- - - - &gt; 1 long interrupted beep (continuously 1 sec. on, 1 sec off)</td>
<td>Stirring function cannot start because a top cover is open.</td>
<td>Close the top cover.</td>
</tr>
<tr>
<td>***** 5 short beeps</td>
<td>A valve timeout occurred.</td>
<td>Restart the machine.</td>
</tr>
<tr>
<td>** 2 short beeps</td>
<td>The machine initializes.</td>
<td>-</td>
</tr>
<tr>
<td>———— &gt; 1 long uninterrupted beep</td>
<td>The brush container is missing.</td>
<td>Put back the brush container. See § 3.3.2.</td>
</tr>
<tr>
<td>• 1 short beep</td>
<td>A top cover is open when the machine starts to dispense, or when the can table moves.</td>
<td>Close the top cover.</td>
</tr>
</tbody>
</table>
5.4 Error messages and other faults

**Note**
For all error messages on the computer: see the help topic in the dispense software.

**Note**
See the column Possible solution to solve the problem. When the problem persists, contact service. See § 5.2.

<table>
<thead>
<tr>
<th>Problem</th>
<th>Possible cause</th>
<th>Possible solution</th>
</tr>
</thead>
<tbody>
<tr>
<td>Main power supply is present but the machine does not work.</td>
<td>The emergency stop switch is active.</td>
<td>Release the emergency stop switch. See § 3.3.4.</td>
</tr>
<tr>
<td></td>
<td>A fuse is broken.</td>
<td>Contact service. See § 5.2.</td>
</tr>
<tr>
<td>Display shows E01</td>
<td>The machine is not initialized.</td>
<td>Restart the machine.</td>
</tr>
<tr>
<td>Display shows E02</td>
<td>The brush container is missing.</td>
<td>Put back the brush container. See § 3.3.2.</td>
</tr>
<tr>
<td>Display shows E43</td>
<td>The pump is blocked or a motor, cable, or sensor failure occurred.</td>
<td>Restart the machine.</td>
</tr>
<tr>
<td>Display shows E44</td>
<td>A pump (motor / cable) or sensor failure occurred.</td>
<td>Restart the machine.</td>
</tr>
<tr>
<td>Display shows E49</td>
<td>The can is missing.</td>
<td>Place the can. See § 3.2.2.</td>
</tr>
<tr>
<td>Display shows E72</td>
<td>A top cover is open.</td>
<td>Close the top cover.</td>
</tr>
<tr>
<td>All other E - errors</td>
<td>-</td>
<td>Restart the machine.</td>
</tr>
</tbody>
</table>
6 Technical data

6.1 General specifications

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Specification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of canisters (max.)</td>
<td>24</td>
</tr>
<tr>
<td>Dispensing</td>
<td>Sequential</td>
</tr>
<tr>
<td>Pump type</td>
<td>Piston pump</td>
</tr>
<tr>
<td>Cleaning system</td>
<td>Automatic</td>
</tr>
<tr>
<td>Materials used are suitable for</td>
<td>Water, universal and solvent colorants</td>
</tr>
<tr>
<td>Canister sizes [L]</td>
<td>1.75, 3.5</td>
</tr>
<tr>
<td>Pump capacity [oz]</td>
<td>1.64</td>
</tr>
<tr>
<td>Maximal can height [cm]</td>
<td>45</td>
</tr>
<tr>
<td>Can table depth [cm]</td>
<td>22</td>
</tr>
</tbody>
</table>

6.2 Dimensions and mass

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Specification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dimensions, height x width x depth [cm]</td>
<td>157 x 83 x 99</td>
</tr>
<tr>
<td>Packed dimensions, height x width x depth [cm]</td>
<td>193 x 98 x 117</td>
</tr>
<tr>
<td>Mass incl. packaging [kg]</td>
<td>180</td>
</tr>
<tr>
<td>Mass filled machine [kg]</td>
<td>320</td>
</tr>
<tr>
<td>Minimum requirement of load capacity of the floor according to EN 61010-1.2010 [kg]</td>
<td>1280</td>
</tr>
</tbody>
</table>
6.3 Ambient conditions

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Specification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Temperature [°C], operational</td>
<td>+15 to +40</td>
</tr>
<tr>
<td>Temperature [°C], out of operation</td>
<td>-25 to +55</td>
</tr>
<tr>
<td>Altitude above sea level [m], operational</td>
<td>-10 to 2000</td>
</tr>
<tr>
<td>Altitude above sea level [m], out of operation</td>
<td>-10 to 12000</td>
</tr>
<tr>
<td>Maximum relative humidity [RH], without</td>
<td>90</td>
</tr>
<tr>
<td>condensation [%]</td>
<td></td>
</tr>
</tbody>
</table>

6.4 Noise level

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Specification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Maximum noise level [dB(A)]</td>
<td>&lt; 65</td>
</tr>
</tbody>
</table>

6.5 Safety classifications

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Specification</th>
</tr>
</thead>
<tbody>
<tr>
<td>IP (Ingress Protection) classification</td>
<td>32</td>
</tr>
<tr>
<td>EMC (ElectroMagnetic Compliancy) classification</td>
<td>Class B</td>
</tr>
<tr>
<td>Overvoltage classification</td>
<td>Class II</td>
</tr>
</tbody>
</table>

6.6 Electrical specifications

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Specification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Power consumption, maximum [W]</td>
<td>500</td>
</tr>
<tr>
<td>Maximum leakage current [mA]</td>
<td>3.5</td>
</tr>
<tr>
<td>Country specific net cables</td>
<td>European</td>
</tr>
<tr>
<td>Voltage [V]</td>
<td>110 / 230 ± 10%</td>
</tr>
<tr>
<td>Frequency [Hz]</td>
<td>50 / 60</td>
</tr>
<tr>
<td>Fuse specifications [A]</td>
<td>10</td>
</tr>
</tbody>
</table>
6.7 Electrical diagram