

# Operation manual action shower „Midnight Rain“

Table of contents

page

1. Fuction – programmes .....	2
2. Technical description .....	4
3. Installation .....	5
4. Taking the unit into operation .....	6
5. Programme flow .....	6
6. Maintenance .....	6
7. Spare part list.....	7
8. Wiring diagramme .....	8

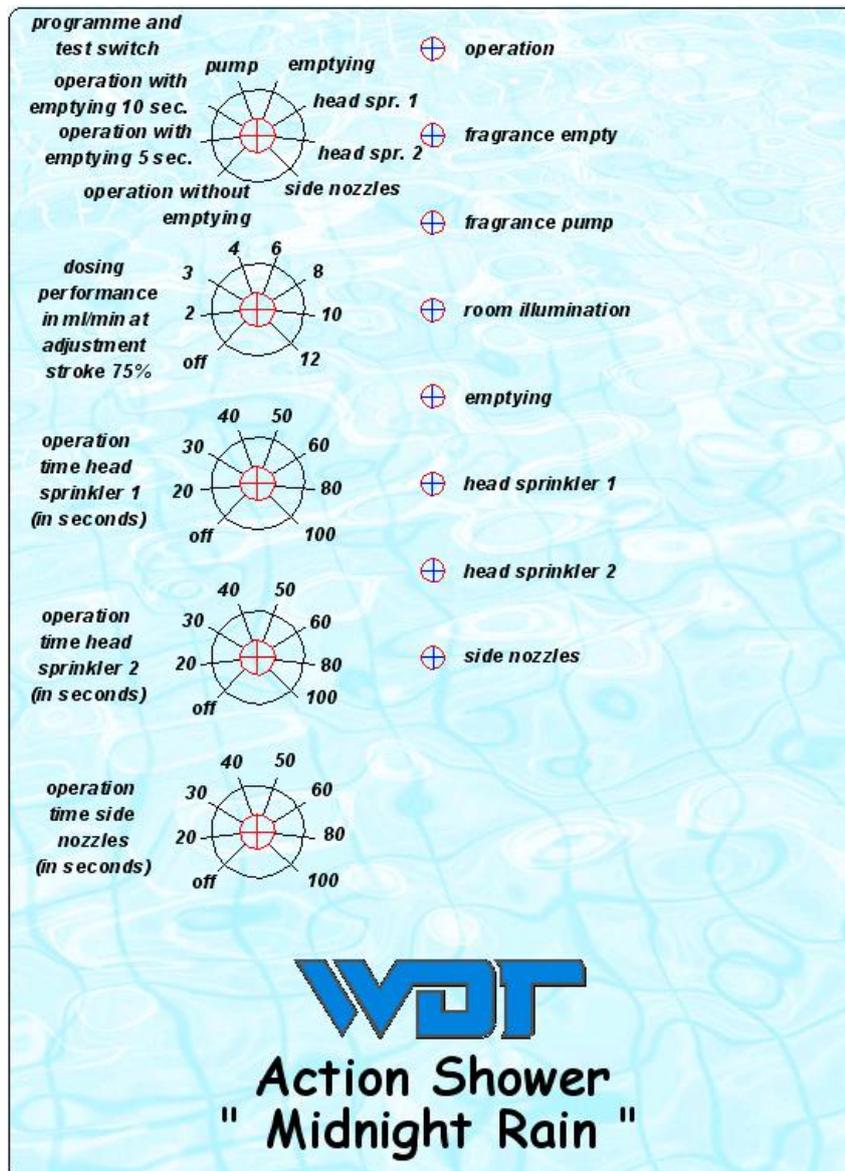


### 1. Fuction – programmes

The Action shower „Midnight Rain“ is a control unit for 3 shower cycles. The programmes can be started by a 3-fold push-button from the shower cabinet.

- Head sprinkler 1: warm head sprinklers
- Head sprinkler 2: cold aromatized side sprinklers
- Side Nozzles: warm side nozzles

The single adjustment are handled by rotary knobs at the control housing:



The single rotary knobs are to adjust the single parameters:

**programme and test switch**

This rotary knob is to test every function of the action shower. Each function is indicated by a burning of the yellow LED on the right side of the control housing. The fragrance pump can only be operated if the fragrance canister is filled or if the pressure switch bellow the pump is bridged.

Before the test of the functions the unit has to be switched on by the *main switch* at the right side of the hosing!!

Adter the test of the functions the operation mode has to be chosen by the switch position: **operation with 10 (5) sec. emptying**

This mode has to be adjusted at all shower techniques that include emptying valves. The emptying time (5 or 10 seconds) is according to the length of the tubing that has to be emptied.

**dosing performance in ml/min at adjustment stroke 75%**

This rotary knob is to adjust the fragrance dosing performance. Pump stroke 75% is adjustment ex works.

**operation time head sprinkler 1 in seconds:**

Adjustment of the operation time for the cold aromatized shower from 20 – 100 seconds.

**operation time head sprinkler 2 in seconds:**

Adjustment of the operation time for the warm shower from 20 – 100 seconds.

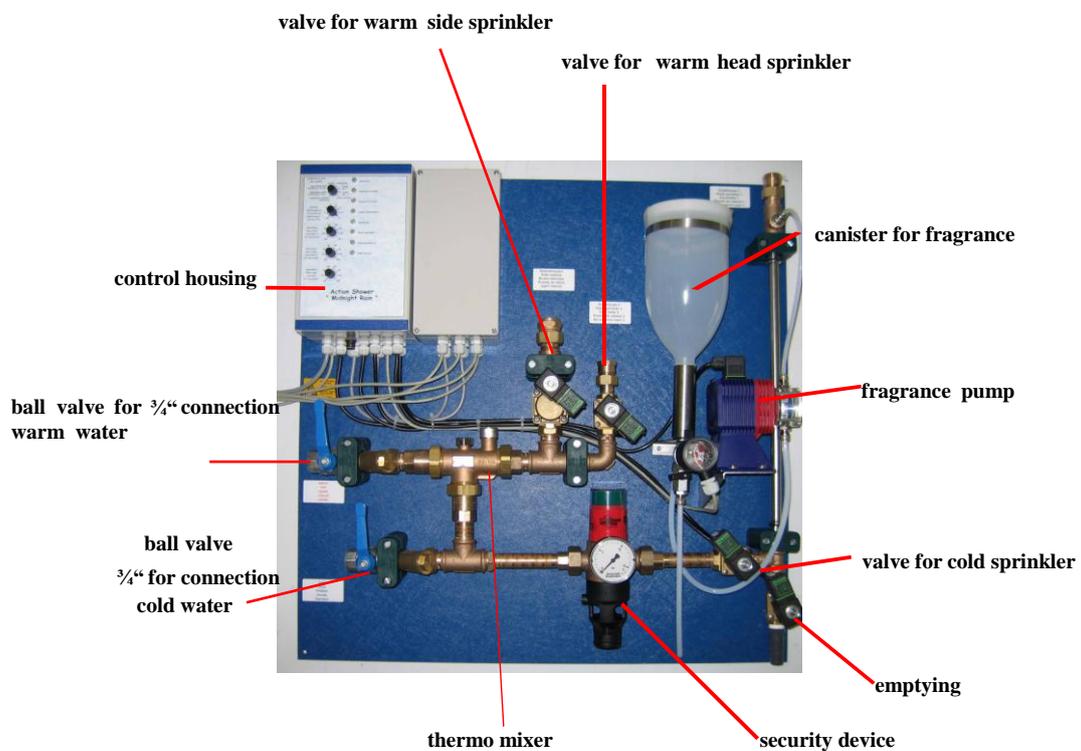
**operation time side nozzles in seconds:**

Adjustment of the operation time for the side nozzles from 20 – 100 seconds.

## 2. Technical description

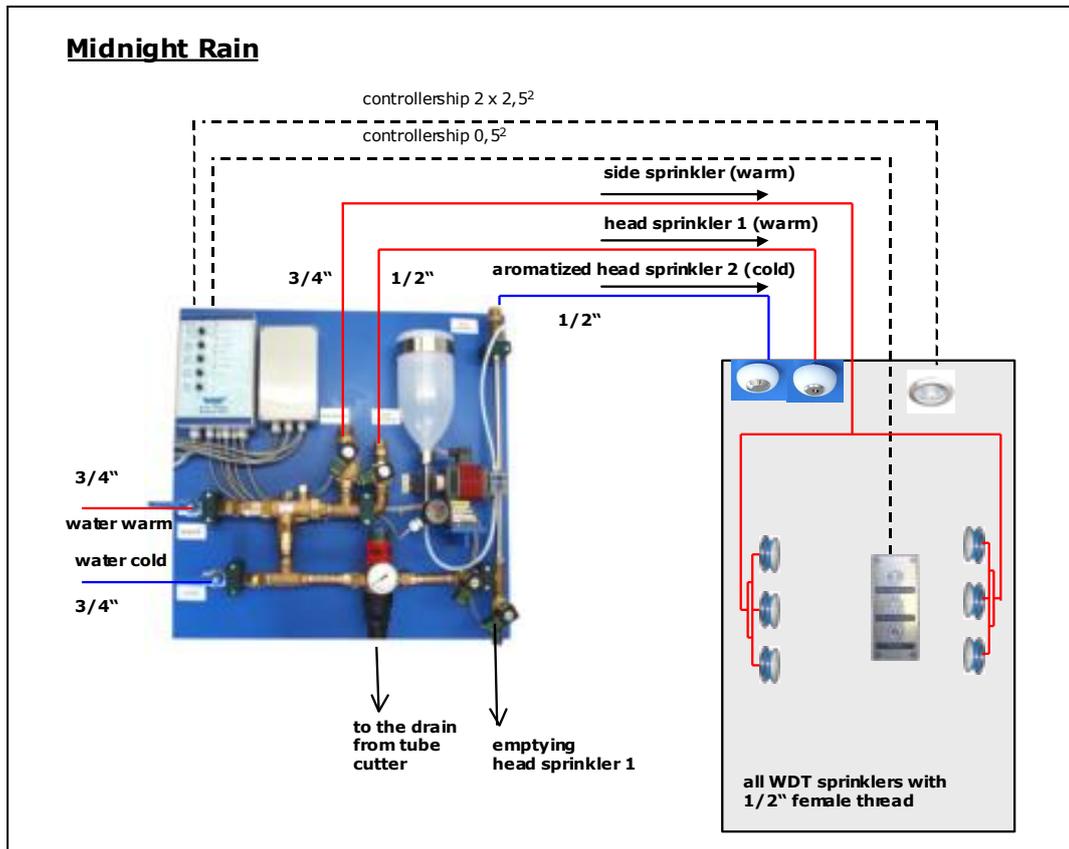
measures: width 75cm, height 75cm, depth 15cm  
 weight: app. 12 kg  
 power supply: power plug 230V  
 water supply pressure: min. 3 bar at a flow through of 3m<sup>3</sup>/h

The action shower „Midnight Rain“ consists of the following components:



### 3. Installation

The control unit „ **Midnight Rain** “ has to be installed at a capable place next to the shower. The water tubing has to be installed according to the following schema. Electrical supply with power plug 230V/AC. Ensure that the nozzles are not blocked by residues that have been in the tubing if you take the unit into operation for the first time!



- Installation only by authorised staff!!!
- Before taking the unit into operation we recommend to flush all the tubings without nozzles to guarantee that no residues will block the nozzles.
- We recommend to install a fine in-line strainer before the shower techniques!
- We recommend to use (softened) water with a low hardness to prevent residues of calcium!

#### **4. Taking the unit into operation**

If the whole tubings and the electrical supply are connected the unit is ready for taking it into operation. Put the „Selector switch 1“ on „0“ and switch-on the unit by the main switch on the left side of the controller housing. The main switch shines red and the operation-LED green. Afterwards all functions can be tested like described above (see page 4). Now the single programme functions can be adjusted according the demanded needs.

If you fill the fragrance canister for the first time, air is getting into the pump head. To ensure a reliable function of the pump it has to be aired. For this reason the pump hose has to be pulled off the dosing valve (see picture). This procedure is only necessary if you take the unit into operation.



#### **5. Programme flow**

The characteristics of the programmes are describes on page 3. The **3 functions** „Tropical Rain“, „Polar Fog“ and „Side Nozzles“ are started by the user by a push button from the cabinet. If one programme runs the others are locked.

Example:

The operator of the unit sets the time for the Polar Fog on 30 seconds. If the user in the cabinet presses the according push-button a smooth and cold aromatized rain patters down on him for 30 seconds. After the 30 secnds the emptying valve opens and the water tubing is emptied to prevent bacterial impact and bad smell due to stagnant water.

#### **6. Maintenance**

If the unit will be out of operation for a longer period of time we recommend to empty the whole tubing and to switch the unit off by the main switch. If the pressure should fall down immediately the filter inserts in the supply have to be cleaned.

## **7. Spare part list**

13080	fragrance pump MPD complete
13103	diaphragm EH0066
12840	pump head EH-B20 complete
12836	pump head without valves
10433	dosing tube PTFE 6 x 1
10432	dosing tube PTFE 4x1mm
10424	ball valve G 3/4" i-a, PN25
12887	filter Ms 3/4"
15955	thermo mixer 3/4"JRG
14871	tube cutter 1/2"
14761	solenoid valve Ms 3/4"
14680	solenoid valve Ms 1/2" M24K
15108	dosing valve 3/8" VA
13082	plug for solenoid valve 230VAC LED 1,5m
15967	controller ED-SeD complete
10959	hosuing 240/160/90
14840	control board ED-V2-11x230V
12985	rotary knob 6mm

## 8. Wiring diagramme

