

# keep clean

Technical Information			
Technical Information			
Description	Remark	TRION2040-e	TRION2040
Voltage		230V/50Hz	54,6V
Power Installed	1 Motor	500 W	500 W
Power Consumption	Eco-Mode / Max	240 / 340 W	240 / 340 W
Tanks capacity	Fresh/Dirty	20 / 22 L	20 / 22 L
<u>Area2Clean</u>	Suggested	250 - 750 sqm	250 - 750 sqm
Productivity	Theo/Expected	1.624 / 1.050 sqm/h	1.624 / 1.050 sqm/h
Sqm Clean Area / charge cycle	Eco-Mode / Max Power		2.100 / 1.500 sqm
NOISE LEVEL	Eco-Mode / Max Power	64,6 - 66,6 dB(A)	64,6 - 66,6 dB(A)
ENERGETIC CONSUMPTION	Eco-Mode / Max	0,14-0,21 W/sqm	0,14-0,21 W/sqm
Lenght		800 mm	800 mm
Width with squeegee		490 mm	490 mm
Height		1.100 mm	1.100 mm
Protection rate		IPX3	IPX3
WARRANTY		36 months or 1000h	36 months or 1000h
SCRUBBING SYSTEM			
Working width		406 mm / 2x8"	406 mm / 2x8"
Brushes	empty/load	340/300 rpm	340/300 rpm
Load on brushhead	- I. W	30 Kg	30 Kg
Water Flow	adjustable	0-2 I/min	0-2 I/min
DETERGENT DOSING SYSTEM (KIDO)	,	prepared	prepared
VACUUM SYSTEM		p	p. 0p. 0.0
Width		490 mm	490 mm
Vacuum	Eco-Mode / Max	600/900 mmH20	600/900 mmH20
WEIGHT AND PACKAGING	zoo mode / max	000,000	
Dimensions	WxLxH	910x520x1.000 mm	910x520x1.000 mm
Total weight unit / with packaging		55 / 69 kg	57 / 71 kg
BATTERY AND CHARGER		55 , 55 Ng	5. / · · ···g
Capacity	Li-Ion with BMS		54,6V/10,20Ah
Runtime	Li ion mai bivio		2h
Charger	UL certified		54.6V - 5A
Charging time	OL OUTHIOU		2h
Charging cycles			1000
Ondrighty by 6163			1000

# **Standard Accessories Trion Range**

**Scrubbing System** 



Water flow adjustment on dash board with a simple push botton
Water filter with integrated tap
Self levelling splashguard
Solution tank water level control
Water tank discharge on dash board
Recovery tank sensor max level

Checks and **Adjustments** 





Two working power selection (Eco-Mode/Max) Counthours

Battery charger level Diagnostic

Continuos power consumption on display in Watt Continuos remaining working time in minutes

Vacuum **System** 

3Stage suction turbine without e-motor





Ergonomic dash board with just one bottom for activating the Power Unit (one motor for scrubbing and suction) Parking position and transport mode on 4 wheels

# **Optional accessories**

TRION 2040	
Part N.	
H.040.0	KI-DO (Kit Detergent Dosing System) 4 percentages

# Air filtration from squeegee (from 11-2019)

#### **TRION 2040**

The exhaust air, coming from the squeegee, goes from the turbine through a specific Hepa H13 filter before moving into the air.

A simple flap must be removed for cleaning or replacing the filter.



### Consumables

TRION 2040				
Part N.	Remark	Equipment		
G.019.0	445 mm	Front Blade		
G.020.0	480 mm	Rear Blade		
G.032.0	445 mm	Front Blade Antioil		
G.033.0	480 mm	Rear Blade Antioil		
D.018.0	8"	Toothed Brush white (hard) PPL 0,9 mm		
D.019.0	8"	Toothed Brush blue (medium) PPL 0,7 mm		
D.020.0	8"	Toothed Brush black (soft) PPL 0,5 mm		
D.021.0	8"	Pad Holder		
D.022.0	8"	Nylon Pad Black (10x)		
D.023.0	8"	Nylon Pad Green (10x)		
D.024.0	8"	Nylon Pad Red (10x)		

### **Trion Models**

	TRION2040-e	TRION2040
Tanks Colours	Part N.	Part N.
Emerald	F.220.0	F.200.0
Black	F.221.0	F.201.0
Blue	F.222.0	F.202.0
Orange	F.223.0	F.203.0
Red	F.224.0	F.204.0
Yellow	F.225.0	F.205.0
Green Lemon	F.226.0	F.206.0
Fuchsia	F.227.0	F.207.0
Light Blue	F.228.0	F.208.0
Grey	F.229.0	F.209.0



#### **Partner**



KlinMak Srl

Via della Levata 1 │ 20084 MI │ Italy

Tel. +39 02 892929.1 | Fax +39 02 892929.90 info@klinmak.com | www.klinmak.com









WALK BEHIND SCRUBBER DRYERS

# **TZÍO**N20

A significant step ahead in the development of compact walk behind scrubbers by reducing the number of motors required to drive the brushes and the vacuum suction motor. Klinmak's designers have developed an innovative power unit consisting of one only motor to drive both the dual brush head and vacuum suction motor. The benefits to the end user are enormous resulting in a lower overall energy consumption, a high increase in runtime and battery autonomy, and an extremely low level of noise **(64,6 dbA in Eco-Mode)**.

The TRION 2040 is the perfect solution for cleaning areas between 250 to 1.000 sqm. The upright design, low power consumption (0.14 W/sqm) and low noise scrubber dryer will make your productivity soar (up to 12h/day).



## **Superior cleaning performances**









### 1 Front brush head with 2 brushes washing system

More uniform and high cleaning result on different surfaces, in comparison to a single disc scrubber dryer. This also due to the high speed of the brushes (340 rpm).

Clean tight space and narrow aisiles, minimizing successive manual steps. Simmetric brush head allows the cleaning job in both directions.

# 2 Heavy duty brush head (30 kg)

Trion can be used from deep to maintenance cleaning. Squeegee can be lift it up for deep cleaning.

# 3 stage turbine with the squeegee just behind the brushes

Great combination for a perfect drying result, straight and on curve, on any kind of surface.





## Easy to handle



### Simple Dashboard (2 buttons)

 $2\ simple\ buttons$  : one for the adjustment of the solution flow from  $0-2\ l/min,$  visible on display. No waste of water and detergent normally present with manual taps. The second button for wash&dry with the possibility to select Eco & Max power. Unique feature is the working power on the display and the working runtime before charging. Battery check and counthours are standard. Cardboard is foreseen for Detergent Dosing System called KiDo (optional).



### **5** Tank in Tank System

Fresh water tank with optical level indicator and water filter inlet. Recovery tank has a big opening for inspection and cleaning. No edges, no dirty water could remain. Hygiene first!



### 6 Big wheels and 2 parking - transport wheels

Easy to move on uneven floor or on steps. Parking position and trasport on 4 wheels. No pressure on brushes and blades during parking position.



### Sustainable production









# Toothed brushes: high efficiency (KlinMak patent)

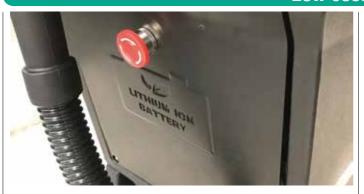
The patented system by two toothed brushes allows for the installation of just a single scrubbing motor with a significant cost reduction. This system grants a strong reduction of the electrical consumption, increase the runtime and the average life of the machine. Just one motor, 48V, for increasing the energetic efficiency and reducing strongly the noise of the machine. No e-motor for the turbine is foreseen! High increase of the runtime and big reduction of the maintenaince cost. Less fatigue with 2 brushes for the operator, being the unit almost self propelling.

# Just on electric motor, no electric motor for the turbine. Low noise

"Lowest level, in his category, of the energetic consumption (0,14 W/sqm). Incredible low noise level: 64,6 dbA in Eco Mode. The Li ion battery gives the opportunity to introduce into the market a unit with low weight, with low volume, with less material, focussing on the reduction of waste production. A big step ahead to the Sustainable Developement Goals ONU 12.5."



### Low cost in use





Many benefits by the use of Li-Ion battery (Li-NCA): light weight, small dimensions, high runtime, no memory effect, low rate of runout, higher cycles (1.000) in comparison to AGM-GEL batteries and short charging time depending by the charger type. Standard the 5A charger, UL certified. Advances BMS (battery management system), made in Italy, is able to manage the operation of the battery, to send all the parameters to the main card board of the machine and to memorized many infos. A specific button switch on the battery on the main battery box. The use of the Li Ion battery gives the opportunity to use the scrubber dryer up to 12 h / day, absolutely unthinkable with the traditional batteries.



### • High productivity and insignificant service cost

Trion decrease the cleaning operating cost . Eco-mode reduces the power consumption and the noise level!

Ordinary service on blades, fresh water tank filter cleaning, brushes replacement are easy and fast. Diagnostic and hour meter allows to manage the extraordinary and regulary maintenance. 3 Years Warranty or 1.000h working time!