



CREATING A CLEANER, SAFER, HEALTHIER WORLD.

EQUIPMENT



# M20

## INTEGRATED SWEEPER-SCRUBBER

- Outstanding cleaning results in just one pass – wet or dry – with FloorSmart® technology
- Maximum productivity with ec-H2O™ or FaST® technology for cleaning up to three times longer than conventional scrubbing methods
- Low cost of ownership from fully-integrated, cost-efficient design

## OUTSTANDING CLEANING RESULTS AT A LOW COST OF OWNERSHIP.



The first fully-integrated sweeper-scrubber, the M20 is engineered for consistent, industrial-strength cleaning whether sweeping, scrubbing or doing both at once.

### DRAMATICALLY LOWER COST OF OWNERSHIP

Without compromising safety or performance, we have reduced the lifecycle cost of ownership for machines that both scrub and sweep. With two brushes instead of four, EasyOpen™ service access, and 14% fewer parts, the M20 is one of the most cost-efficient industrial cleaning machines available.

### DURABLE, RELIABLE, LONG-LIFE PRODUCTIVITY

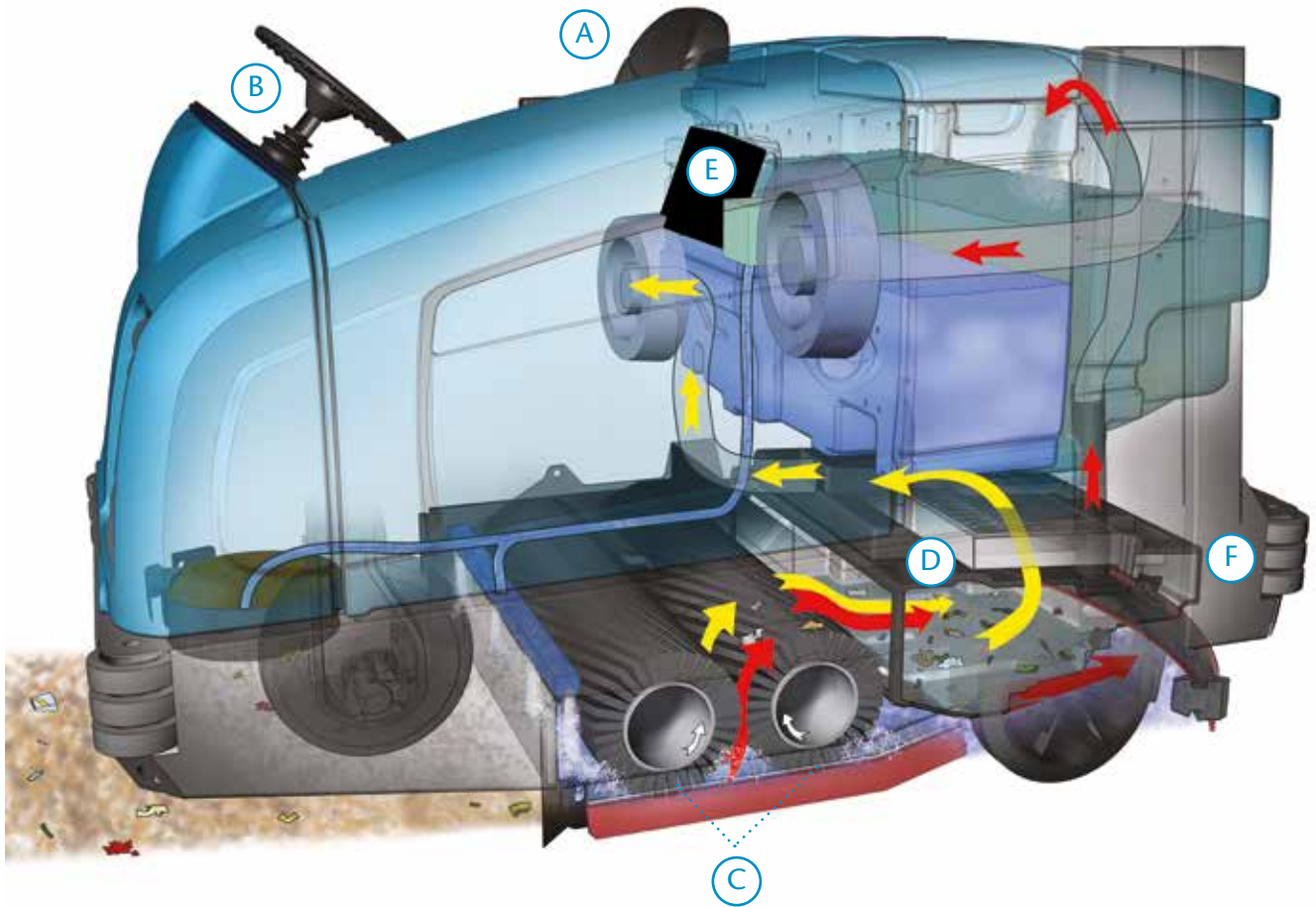
The M20 is not two separate machines bolted together like traditional sweeper-scrubbers. Its integrated design, combined with rugged steel and Duramer™ construction, make it simple to maintain and built to last.

### SAFER FOR OPERATORS, CUSTOMERS, AND EMPLOYEES

The ErgoSpace™ operator compartment, ec-H2O™ or FaST® technology, Hygenic® tanks and Grip-N-Go™ corner rollers to protect your facility are just a few of the ways the M20 sets a new standard for safety.

INSIDE THE

# M20



**A** Ergonomically friendly for operators, the ErgoSpace™ operator compartment makes cleaning with the M20 safe, easy, and comfortable.

**B** Reduce training time and simplify operation with the Touch-N-Go™ control panel featuring 1-STEP™ scrubbing and sweeping.

**C** Improve cleaning results and reduce component wear with FloorSmart® – an integrated scrubbing and sweeping system.

**D** Excellent dust control, shakeback, and high durability from the synthetic panel filter with InstantAccess™.

**E** Reduce environmental impact with ec-H2O™ or FaST® technology.

**F** Long-life construction from heavy gauge steel frame with T-beam members and Grip-N-Go™ corner rollers.

## COST-EFFICIENT. PRODUCTIVE. SAFE.

- ▶ EasyOpen™ service access reduces downtime, service time and maintenance costs, delivering a dramatically lower total cost of ownership.
- ▶ Cleaning productivity is increased with a large 110 liter, 177 kg debris hopper with 1520 mm optional variable dump height.
- ▶ The ErgoSpace™ operator compartment offers outstanding visibility, safety and ergonomics to protect operators, the machine and your facility.



### KEY AVAILABLE OPTIONAL FEATURES

**Increase productivity up to 3 hours.** Ideal for more porous concrete, ES filters and recycles recovered solution, dramatically extending cleaning time.



**Widen cleaning path from 1020 to 1420 mm.** Expand edge-cleaning capabilities and maximise productivity with the optional side brush.



**Boost your cleaning flexibility.** Spot clean hard-to-reach areas with the 5 m spray hose.



**Protect operator and machine.** Ensure safety in severe environments with an overhead guard.



## COMPARE M20 TO COMPETITIVE SWEEPER-SCRUBBERS



### INCREASED SAFETY

- **FaST® Foam Scrubbing Technology** – Reduces potential slip-and-fall accidents with NFSI certified detergents
- **ErgoSpace™** – improves visibility and ergonomics
- **Thermo-Sentry™** – preventive fire safety reduces risk of hopper fires
- **Grip-N-Go™** – Corner rollers to protect your facility and machine

### REDUCED COSTS

- **ec-H2O™ technology** – reduces training, purchasing, storing, handling, mixing tasks and costs associated with floor cleaning chemicals
- **FloorSmart®** – one pass cleaning, wet or dry
- **On-board diagnostics** – quick and easy diagnostics
- **SmartRelease™** – break-away squeegees reduce maintenance and replacement parts due to squeegee damage

### MAXIMUM PRODUCTIVITY

- **ES® Extended Scrubbing with detergent metering** – recycles cleaning chemicals to increase uptime
- **Front-wheel steering** – Tight handling, easy manoeuvring
- **EasyOpen™** – service access and on-board diagnostics
- **Wet/dry synthetic fibre panel filter** – Outstanding dust control, excellent shake-back, and high durability
- **Touch-N-Go™** – Intuitive control panel remembers last settings, reduced training time
- **Hygenic® tanks** – Less downtime, easy visibility and access solution and recovery tanks for cleaning and hygiene
- **Variable Drain Valves™** – Control the flow of water leaving the tanks with less mess

## EXCLUSIVE TECHNOLOGIES (optional cleaning innovations)

All technologies increase scrub time up to three times using a single tank of water.



**ec-H2O™ technology** electrically converts water into a cleaning solution that cleans effectively, saves money, improves safety, and reduces environmental impact compared to daily cleaning floor chemicals and methods<sup>1</sup>.



**FaST® Foam Scrubbing Technology** uses up to 70% less water and 90% less chemicals to improve floor traction as certified by NFSI, helping reduce the risk of slip-and-fall accidents.



**ES® Extended Scrubbing** productivity enhancement system recycles cleaning chemicals to increase uptime and improve productivity by scrubbing floors using 66% less chemicals than traditional cleaning methods.

<sup>1</sup> ec-H2O technology is not designed for all soils, including heavy concentrations of fats and oils. Conventional chemical cleaners may be required for those soils.

## ENVIRONMENTAL STEWARDSHIP



ec-H2O and FaST technologies are NFSI (National Floor Safety Institute) Certified. NFSI certification ensures a product has passed a 2-phase testing process, proving the floor product helps to reduce potential for slip-and-fall accidents.



ec-H2O and FaST technologies are registered by NSF International. NSF International is an independent, not-for-profit organisation that ensures formulation and labels on these products meet appropriate food safety regulations.



Tennant FaST 365 and FaST 965 detergents have been awarded the European Eco-label.

This proves that our Tennant FaST® detergents have a reduced environmental impact compared to standard detergents



ec-H2O technology won the European Business Award 2009 for the Business Innovation of the Year, one of the most prestigious business awards. The European Business Awards (www.businessawardseurope.com) is an independent awards programme designed to recognise and promote excellence, best practice and innovation in the European business community.



Conserve Resources



Reduce Detergents



Increase Safety



Improve Air Quality

### GENUINE TENNANT PARTS, SUPPLIES AND SERVICE

#### Tennant Service Offering

- Maximise safety, productivity and uptime
- Control and protect your investment and lower your total cost of ownership
- Benefit from over 200 factory-trained service technicians across Europe

#### Tennant Parts & Supplies

- Operate your machine with confidence
- Benefit from years of worry-free operation

#### Tennant Cleaning Solutions

- Further your sustainable cleaning goals
- Choose sustainable benefits your company wants

## M20 RIDE-ON SWEEPER-SCRUBBER

### INTEGRATED CLEANING SYSTEM

Cleaning path	1020 mm
With scrubbing side brush	1370 mm
With sweeping side brush	1420 mm
Cylindrical main brushes	
Brush speed	480 rpm
Brush down pressure (up to)	177 kg
Brush diameter (2)	300 mm
Side brush	
Brush speed	150 rpm
Scrubbing brush diameter	410 mm
Sweeping brush diameter	530 mm
Tanks	
Solution tank	212 L
Solution capacity with ES®	280 L
Recovery tank	276 L
Demisting chamber	61 L
Debris hopper	
Volume capacity	110 L
Weight capacity	177 kg
Dump height (variable to)	1520 mm
Vacuum fans	
Scrubbing fan speed	11000 rpm
Scrubbing fan water lift	890 mm
Sweeping fan speed	6500 rpm
Sweeping fan airflow	8.2 m <sup>3</sup> /min

### PROPELLING SYSTEM

Propel speed forward (variable to)	13 km/h
Propel speed reverse (variable to)	4.8 km/h
Engine-gasoline/LPG (1.6 L)	44.7 kW
Gradeability	
Transport at gross weight	18%
Working (cleaning)	14%
Ground clearance (transport)	80 mm

### DUST CONTROL SYSTEM

Filter system	Synthetic fibre panel
Filter area	7.3 m <sup>2</sup>
Dust filtration (to)	3 microns
Shaker mechanism (automatic)	Timed, beater bar

### MACHINE SPECIFICATIONS

Length	2410 mm
Width	
Frame	1270 mm
Rear squereege	1300 mm
With side brush	1470 mm
Height	1470 mm
With overhead guard	2120 mm
Weight (empty)	1497 kg
Minimum aisle turn	2790 mm

### WARRANTY

See your local representative for warranty information

Specifications subject to change without notice.

## SEEING IS BELIEVING

For a demonstration or additional information contact us:

#### TENNANT UK CLEANING SOLUTIONS LTD

Gladstone Road  
Northampton NN5 7RX  
UNITED KINGDOM  
Tel: 0800 111 4402 (local rate UK only)  
Tel: 01604 583191  
Fax: 0845 052 9349  
E-mail: sales.uk@tennantco.com  
E-mail: enquiries@tennantco.com

#### TCS EMEA GmbH

Sommerfeld 1  
5202 Neumarkt am Wallersee  
AUSTRIA  
Tel: +43 (0)6216 4524 & 4525  
Fax: +43 (0)6216 4524 20  
E-mail: office@tennant-cee.com

#### TENNANT EUROPE NV

Roderveldlaan 3  
2600 Antwerp  
BELGIUM  
Tel: +32 3 217 94 11  
Fax: +32 3 217 94 19  
E-mail: europe@tennantco.com