



**DST-6<sup>®</sup>**  
Dustless Sweeping Technology

**GENERAL SPECIFICATIONS**



**MODEL DST-6<sup>®</sup> DUSTLESS REGENERATIVE<sup>®</sup> AIR STREET SWEEPER  
DIESEL AUXILIARY ENGINE / DIESEL CHASSIS**

**SWEEPER AUXILIARY ENGINE**

Engine ..... John Deere 4045 turbo FT4, 4 cyl.  
Displacement ..... 275 in<sup>3</sup> (4.5 L)  
Power ..... 99 HP @ 2200 RPM (74 kW)  
Net torque ..... 315 lb-ft @ 1600 RPM (427 Nm)  
Air cleaner ..... Heavy duty, w/pre-cleaner, scavenge vacuum hose, and in-cab air restriction indicator w/gauge.  
Remote oil filter ..... Spin on, full flow  
Diesel auxiliary engine fuel tank shared with cabover chassis, and independent from conventional cab chassis fuel tank.  
Aux. engine fuel tank capacity ..... 51 gal (193 L)  
DEF tank ..... Dedicated  
Capacity (volumetric) ..... 5.4 gal (20.6 L)  
Capacity (useable) ..... 3.8 gal (14.4 L)  
Auxiliary engine protection system  
Fuel/water separator and separate fuel filter  
Open crankcase ventilation (OCV) filter

**BLOWER, RUBBER LINED**

Aluminum alloy, high volume, open face turbine  
Purpose ..... Creates blast and suction  
Bearings ..... (2) sealed lifetime lube, anti-friction  
Bolt-on housing ..... Steel w/abrasion resistant, replaceable liner  
Drive ..... Heavy duty power band

**DUST SEPARATOR, HIGH CAPACITY**

Type ..... Cyclonic, multipass, centrifugal separation  
Size ..... 20 x 61 in cylindrical area (508 x 1549 mm)  
Located adjacent to blower within hopper  
Particulate removal achieved through 61 in (1549 mm) skimmer slot into skimmer hood  
Hinged inspection door opened from hopper exterior  
Abrasion resistant housing w/replaceable wear resistant liner

**HOPPER**

Capacity (volumetric) ..... 7.3 yd<sup>3</sup> (5.6 m<sup>3</sup>)  
Capacity (useable) ..... 6 yd<sup>3</sup> (4.6 m<sup>3</sup>)  
Construction ..... Welded steel plate with integral stiffeners  
Floor angle ..... 22°  
Dump door opening ..... 84 x 44 in (2134 x 1118 mm)  
Dumping method ..... Hydraulic with raker bar  
Dumping height ..... 36 in (914 mm)  
Abrasion protection package  
Hopper deluge system

**BROOM ASSIST PICK-UP HEAD (BAH<sup>®</sup>)**

Type ..... Dual chamber with broom assist  
Function ..... Delivers air blast and suction  
Width ..... 87 in (2210 mm)  
Pick-up head area ..... 3567 in<sup>2</sup> (2.3 m<sup>2</sup>)  
Broom ..... 12 x 79 in (305 x 2007 mm) enclosed in rear of pick-up head  
Suspension ..... 4 springs 2 drag links  
Suction hose diameter ..... 14 in (356 mm)  
Pressure hose diameter ..... 14 in (356 mm)  
Skids ..... DUO SKID<sup>®</sup>, long-life carbide  
Pick-up head deluge  
Reverse pick-up head system

**GUTTER BROOM, TWIN, Patented**

Standard equipment, includes floodlights and parabolic mirrors  
Drive ..... Variable speed non-reversible hydraulic motor  
Adjustment ..... Adjustable for down pressure, pattern and wear  
Down pressure ..... Automatically adjusts to requirement  
Flexibility ..... All directions, integral anti-damage "swing away" relief valve  
Brooms ..... 43 in dia. (1.1 m) steel wire, vertical diggers  
Hydraulic tilt ..... Twin gutter brooms adjust for curb depth

**HYDRAULIC SYSTEM**

Operates gutter broom(s), dump and pick-up head  
Drive ..... Gear driven from auxiliary engine  
Flow rate ..... 8 GPM (30.3 LPM)  
Reservoir ..... 25 gal (94.6 L) with 80 mesh suction strainer, sight/temperature gauge, cooler  
Filter ..... 3 micron in-line  
Auxiliary hydraulic system  
Temperature shutdown system

**DUST CONTROL SYSTEM**

Water spray nozzles for dust suppression  
Pump ..... Electric diaphragm  
Reservoirs ..... Polyethylene 220 gal (833 L), total  
Filter ..... 80 mesh in-line  
Low water shut-off ..... Safety shut-off with audible and visual indicator in cab  
Spray nozzles:  
Gutter brooms (each) ..... 3  
Hopper (inside) ..... 1  
High output water system  
Hydrant fill hose w/storage area ..... 20 ft (6 m)

**DUSTLESS FILTRATION SYSTEM**

An external mounted modular filtration system with automatic BlueLogic<sup>®</sup> control adjustment  
Capacity (volumetric) ..... 14 ft<sup>3</sup> (0.40 m<sup>3</sup>)  
Filters ..... (4) MERV 16 Rated  
Particulate removal efficiency ≥ 95% of 0.3 μm  
Long life filters, not affected by wet sweeping conditions.  
Filters cleaned by intermittent air pulse  
Air compressor ..... Belt driven, liquid cooled, engine lubricated  
Compression rate ..... 13.2 CFM (0.37 m<sup>3</sup>/minute) @ 1200 RPM  
Shop air connection  
Dust box deluge washout system

**CONTROL SYSTEM**

**BlueLogic<sup>®</sup> Control System**  
Multiplexed electrical system includes hardware and TYMCO designed software that integrates the in-cab controls to the auxiliary engine and all sweeper functions; as well as provides intelligent safety features and on-board diagnostics (OBD) for the auxiliary engine and sweeper through the BlueLogic display. Specific to the DST-6, BlueLogic

also monitors and automatically controls the adjustments for the DST system, requiring no operator adjustments.

**BlueLogic Display**

Pedestal mounted touchscreen display provides sweeper and auxiliary engine data to the operator and includes hour meters (trip and total) for the auxiliary engine, gutter brooms, pick-up head, blower, water pump, BAH broom if applicable, and DST filters; sweeper odometer (records curb miles swept and sweeping hours), service reminders, custom reminders, overspeed warning, low water audible alarm, dust control system winterization guide, and OBD.

**Interior Components**

BlueLogic display, auxiliary fuse panel, illuminated control switches: Pick-up head, gutter brooms, auxiliary engine RPM, DST mode, purge system, variable speed gutter brooms, dust control water system nozzles, safety lights

**Exterior Components**

Dump switch, BlueLogic multiplex modules

**SAFETY/WARNING DEVICES**

Alternating LED rear flashers (2)  
Back-up alarm  
SAE Class 1/California Title 13 amber beacon light with limb guard - LED

**OPTIONAL EQUIPMENT**

AOD water pump w/washdown hose/spray gun  
Auto Sweep Interrupt (ASI)  
Auxiliary hand hose 8 in dia. (203 mm)  
Auxiliary hand hose hydraulic boom assist  
Camera/monitor system  
Gutter broom drop-down  
Hi/Low pressure washdown system  
Hopper drain system  
Magnet (various options available)  
Pick-up head curtain lifter  
Pick-up head deluge (BAH<sup>®</sup>)  
Shop air purge, dust control system  
Stainless steel options:  
Hopper & dust box:  
Hopper weldment  
Dump door  
Inspection doors  
Raker plate  
High capacity dust separator  
Hopper screen  
Dust box  
Blower housing  
High capacity dust separator  
Hopper drain  
Dust box  
Paint color (other than TYMCO standard white)

*Special options are available for your individual requirements. Contact your local dealer or TYMCO.*

**CHASSIS AVAILABLE**

Peterbilt 220  
International MV607  
Freightliner M2-106

