



VMI Horizontal Dredge Specifications

MD-415**MD-615****MD-815**

GENERAL			
Length	33' 6" (10.21 m) O.A.	37' 6" (11.43 m) O.A.	38' 6" (11.73 m) O.A.
Height (without A/C)	8' (2.44 m)	8' 6" (2.59 m)	8' 10" (2.69 m)
Width	8' 6" (2.59 m) (transport)	9' (2.74 m) (transport)	9' 11" (3.02 m)
Weight (Approx.)	20,000 lbs (9,100 kg)	23,000 lbs (10,400 kg)	26,500 lbs (11,800 kg)
Draft	22" (55.88 cm)	22" (55.88 cm)	25" (63.5 cm)
Fuel Capacity	160 U.S. gallons (606 L)	244 U.S. gallons (923 L)	325 U.S. gallons (1230 L)
ENGINE			
Type	Cummins	Cummins	Cummins
Model	QSB 6.7	QSB 8.3	QSL 9
Power	173 BHP (129 kW) @ 2500 RPM	260 BHP (194 kW) @ 2200 RPM	325 BHP (242kW) @ 2100 RPM
PUMP			
Type	Hi-chrome cast iron, centrifugal, recessed impeller		
Impeller	18" (45.72 cm)	22" (55.88 cm)	25" (63.5 cm)
Suction	4" (10.16 cm)	6" (15.24 cm)	8" (20.32 cm)
Discharge	4" (10.16 cm)	6" (15.24 cm)	8" (20.32 cm)
Capacity (water @ 68°F)	3.75" (95mm) Sphere - Variable to 1,000 GPM (3,785 L/min) @ 130' (39.6 m) head @ 1400 RPM	5.75" (146mm) Sphere - Variable to 2,000 GPM (7,570 L/min) @ 140' (42.7 m) head @ 1140 RPM	7.75" (196mm) Sphere - Variable to 3,000 GPM (11,355 L/min) @ 140' (42.7 m) head @ 1030 RPM
CUTTER ASSEMBLY			
Type	Horizontal with full-width, flow-through suction (Paddle and cutting teeth available)		
Size	8' 6" (2.59 m) wide x 21" (53.34 cm) diameter	9' (2.74 m) wide x 21" (53.34 cm) diameter	9' 11" (3.02 m) wide x 21" (53.34 cm) diameter
Speed	Variable 0-80 RPM (forward and reverse)		
Torque	30,348 in-lbs. (3,429 N·m)		
Operating Depth	Variable to 15' (4.57 m) maximum (optional depths available upon request)		
PONTOONS			
Dimensions	Two - 32" (81.28 cm) x 34" (86.36 cm) x 30' 6" (9.30 m)	Two - 32" (81.28 cm) x 36" (91.44 cm) x 33' 6" (10.21 m)	Two - 34" (86.36 cm) x 40" (101.6 cm) x 34' 6" (10.52 m)
Description	10 gauge steel, integral bulkheads and stiffeners, formed for rigidity, cora-foam filled		
PROPULSION			
Type	Treble sheave hydraulic winch		
Traverse Speed	Variable 0-50 ft/min (0-15.2 m/min)		
Cutting Speed	0-15 ft/min (0-4.57 m/min)		
HYDRAULIC SYSTEM			
Pumps	Three - variable displacement, axial piston / One - fixed displacement		
Motors	Fixed displacement		
Capacity	Total, 80 GPM (302.8 L/min) @ 2200 RPM	Total, 130 GPM (492.1 L/min) @ 2200 RPM	Total, 170 GPM (681.3 L/min) @ 2200 RPM
Reservoir	100 U.S. gallons (378.5 L)		
DRIVE			
Description	Hydraulic pump drive, direct from engine		
FILTERS			
Description	Protected hydrostatic loop, high pressure suction & return		
RELIEF SETTINGS			
Centrifugal Pump	4000 psi (276 bar)		
Cutter Head	3000 psi (207 bar)		
Accessories	3000 psi (207 bar)		
Boom	1500 psi (103 bar)		
ELECTRICAL SYSTEM			
Alternator	Output - 100 amp		
Battery	Heavy Duty - 12 volt		
PRIME FINISH			
Lower Structure	Shear Tar Epoxy Paint		
Upper Structure	Blue and White Epoxy Paint		