



LIFTING CHARTS - Crawler Cranes

DEMAG MODEL CC 1800-1 - 330 TON CAPACITY

Technical description

Crawler carrier

	3-section carrier comprising of carbody and two crawlers. Hydraulic pin connections between crawlers and carbody provide for easy assembly and removal to minimise width and weight for transportation.
Carbody	Bending- and torsion-resistant welded structure of box type construction, fabricated of high-strength fine-grain structural steel.
Crawlers	Side frames: bending-resistant welded structure of high-strength fine-grain structural steel. Track shoes and idler tumblers are fabricated of heat-treated high-strength cast steel. 14 rollers on each side frame with hardened rolling surfaces. Automatic centralized lubrication is included as standard.
Power train	The tracks are powered by one hydraulic motor each through closed planetary gear reduction units running in oil bath, equipped with spring-applied hydraulically released holding brakes; the gear units are of extremely compact design to fit within the width of the crawlers. Each crawler is infinitely variable controlled, both independently and in opposite direction.

Superstructure

Counterweight	198,000 lb / 264,600 lb + 66,000 lb central ballast on carrier.
Frame	Torsion-resistant welded structure fabricated of high-strength fine-grain structural steel. Connected to carrier by triple-row roller bearing slew ring.
Drive	DaimlerChrysler diesel engine type OM 501 LA, 260 kW (353 hp) at 2000 1/min, torque 2000 Nm at 1080 1/min. The engine complies with EURO II / EPA regulations. Pump distribution gearbox with five variable displacement axial piston pumps incl. electronic control system, and gear pumps.
Rope drums	The standard superstructure equipment includes two rope drums – hoist 1 and boom hoist – and is prepared for hoist 2. The drums are powered by hydraulic motors through closed planetary gear units running in oil bath. All rope drums have spring-applied, hydraulically released multi-disk brakes and non-wearing hydraulic braking for load lowering. Rope ends H 1, 2 and W 1, 2 equipped with quick-connect rope end fittings. Hoist H 1 (and optionally H 2) is removable to minimise weight for transportation.
Slew unit	Powered by hydraulic motor through closed, planetary gear unit running in oil bath. Spring-applied, hydraulically released holding brake and non-wearing hydraulic braking.
Control	Electronic proportional valve pilot-control integrated into memory programmable control system with fault diagnostics. Automatic power control giving optimal utilisation of engine output.
Cabin	Comfortable cab with large windscreen. Safety-glazing all around, roof window, self-contained hot air heater, full instrumentation and crane controls, air-conditioning. The cab can be tilted back for improved operator view of boom point. A camera system is installed to monitor the rope drums. For transportation, the cab swings in front of the superstructure to minimise width.
Electrical equipment	24 V d. c. system.

Optional equipment

Track shoes	Optional width 3.28 ft.
Additional counterweight	Consisting of 66,000 lb (2 x 33,000 lb) counterweight and 66,000 lb (2 x 33,000 lb) central ballast.
Counterweight carrier	Drive 4 x 4, total weight max. 440,000 lb.
Hydraulic raising system for A-frame	
Assembly jacks	Four hydraulic foldaway jacks on carbody for easy assembly of crawlers.
Counterweight carrier	On request.
Quick-connection	Hydraulic quick-disconnect fittings on carrier and superstructure facilitate removal to minimise weight for transportation.
Cylinder on A-frame	For self-assembly of crawler side frames.
Self-assembly for counterweight	

Boom combinations S, S/L and L

	Lattice-type tubular chord structure fabricated of high-strength fine grain structural steel with quick-disconnect pinning.
SH	Main boom: foot section 34.4 ft (used to install winch W1), inserts 19.7 ft and 39.3 ft, tapered insert 19.7 ft, boom head 4.92 ft. Main boom lengths: 59.0-236.2 ft.
SH / LH (SGL variable)	Main boom: foot section 34.4 ft (used to install winch W1), inserts 19.7 ft and 39.3 ft, tapered insert 19.7 ft, extended by inserts 19.7 ft and 39.3 ft (type 2116), boom top section 24.6 ft. Main boom lengths: 137.8-315.0 ft.
SW	Main boom: foot section 34.4 ft (used to install winch W1), inserts 19.7 ft and 39.3 ft, tapered insert 19.7 ft, boom head 4.92 ft. Fly jib: foot section 14.8 ft, inserts 19.7 ft and 39.3 ft, jib top section 24.6 ft. Main boom lengths: 78.7-196.9 ft. Fly jib lengths: 59.0-236.2 ft.
LF	Main boom S: same as SH. Main boom S/L (SGL): same as SH/LH (SGL variable). Fly jib L: foot section 19.7 ft, inserts 39.3 ft, jib top section 19.7 ft. Main boom lengths: 98.4-236.2 ft for S version. Main boom lengths: 177.2-275.6 ft for S/L version (SGL variable). Fly jib lengths: 39.3-118.1 ft.
SSL	Main boom: foot section 34.4 ft (used to install winch W1), inserts 19.7 ft and 39.3 ft, tapered insert 19.7 ft, boom head 4.92 ft. Mast 98.4 ft, Superlift counterweight 88,200 - 396,800 lb. Additional winch W2 required on mast. Main boom lengths: 98.4-236.2 ft.
SSL / LSL (SGL 70.5 m)	Main boom: same as max. SSL, extended by inserts 19.7 ft and 39.3 ft (type 2116), boom top section 24.6 ft. Mast 98.4 ft, Superlift counterweight 88,200 - 352,800 lb. Additional winch W2 required on mast. Main boom lengths: 255.9-374.0 ft.
SWSL (SFSL)	Main boom: same as SSL. Fly jib: foot section 14.8 ft, inserts 19.7 ft and 39.3 ft, boom top section 24.6 ft. Mast 98.4 ft, Superlift counterweight 88,200 - 396,800 lb. Additional winches W1 and W2 required on mast and main boom. Main boom lengths: 98.4-236.2 ft. Fly jib lengths: 59.0-236.2 ft.
Safety devices	Electronic safe load indicator, hoist limit switch, limit switches for boom movements, hydraulic boom backstops, aircraft warning light, anemometer.

The Superlift counterweight is not included in our scope of supply.

Optional equipment

Auxiliary reeving winch

Hoist 2

Additional rope drum on superstructure (for LF or runner operation).

Runner