









# CONSULT THE IC-400-A ENGINEERING SPEC FOR ADDITIONAL INFORMATION.

# Main Features

RATED CAPACITY LIMITER
Standard

CAPACITY ON OUTRIGGERS 50,000 lbs. (22,700 kg)

PICK AND CARRY CAPACITY up to 24,400 lbs. (11,000 kg)

**HEIGHT** 9' 11" (2.96 m)

**WIDTH** 8' 6" (2.59 m)

**BOOM ROTATION** 360°

SHEAVE HEIGHT up to 95' (28.96 m)

HORIZONTAL REACH up to 84' 6" (25.76 m)

FOUR-WHEEL STEER
Standard

FOUR-WHEEL DRIVE Standard

POWERSHIFT TRANSMISSION
Standard

**TIGHT TURNING RADIUS** 

FULLY HYDRAULIC CONTROLS FOR SMOOTH, PRECISE OPERATIONS

INDEPENDENT OUTRIGGER CONTROLS

MODEL

IC-400-A Industrial Crane

**ENGINE OPTIONS** 

Spark Arrester Muffler Installed in addition to standard muffler.

**TIRE OPTIONS** 

Spare Tire & Wheel

**CHASSIS OPTIONS** 

**Auxiliary Winch** 

Mounted on front outrigger bumper, hydraulically driven with control in operator's console.

Pintle Hook

Rear and Front

Rearview Mirrors

One mounted on right-hand deck stake and one mounted on left-hand deck stake.

# **OPERATOR COMPARTMENT**

Floor Mat

Vinyl mat with foam backing.

Noise Reduction Kit

Includes floor mat, control valve cover and side panels of foam backed vinyl for noise reduction. Sun Visor

Adjustable sun visor for reducing glare mounted in roof of cab.

# **ELECTRICAL OPTIONS**

Strobe Lights

Yellow strobe light mounted on each side of turret weight box

Camera System

4-camera video system to assist operator with hard-to-see viewpoints

**Boom Work Lights** 

One worklight mounted to boom to light boom tip, and one work light mounted to turret to light ground under boom tip.

# **BOOM ATTACHMENTS:**

Boom Extension

20 ft. (6.1 m) Offset. Boom stowable. Boom extension is offsettable to 3 different positions; 0 degree (in line), 15 degree and 30 degree offset.

Broderson Cranes are designed and built to ISO 9001:2008 certified standards and have a market leading reputation for quality and reliability. Broderson Cranes are engineered for operating efficiency and are easy to operate and maintain.

An extensive network of full-service dealers offer parts and service support by factory-trained technicians.

For additional options or special equipment not listed, please consult your dealer salesperson or contact Broderson Manufacturing Corp.



(913) 888-0606 www.BMCcranes.com Dimensions and values shown are for reference purposes only. Specifications subject to change.





**Boom Movement** 

Weight Total

Front Axle

Gradeability

**Turning Radius** 

Displacement

HP @ Gov. Speed

**Fuel Tank Capacity** 

Rear Axle

Make

Model

Type Cylinder

Forward Deck Area: 74 sq. ft.(6.94m²) of deck area. 20,000 lbs. (91,000kg) area not included in capacity.)

Steel protective grilles for headlights & taillights. Easily removable for replacing bulbs.

with direct-connected holding valves. Independent controls for each outrigger. Outrigger pad dimension 11.5" (29cm) x 11.5" (29cm).

has hinged lockable cover.

# LIFTING RINGS

# 46'6" (14.17m)

**EXTENSION** 

 $0^{\circ}$  to  $75^{\circ}$ 

Turbocharged-Diesel, charge air cooled

54,900 lbs. (24,900 kg.)

29,400 lbs. (13,330 kg.)

25,500 lbs. (11,570 kg.)

QSB4.5 (US EPA Tier 3)

70% (34°)

Cummins

4.5L

160HP

50 gal.

15' 10" (4.83m)

**POWERSHIFT TRANSMISSION** with 6-speeds forward & 3-reverse. Provides power shifts at any engine speed in any gear. All shifting is done with a single lever electrical control. Equipped with torque convertor & transmission oil cooler. Torque convertor has stall ratio

GEAR	RATIO	SPEED (MPH)
1st	8.20	2.7 (4.3km/h)
2nd	4.64	4.8 (7.7km/h)
3rd	3.53	6.3 (10.1 km/h)
4th	2.00	11.2 (18 im/h)
5th	1.41	15.8 (25 km/h)
6th	0.80	23.0 (37 km/h)

# FORWARD GEAR RATIOS & SPEEDS: REVERSE GEAR RATIOS & SPEEDS:

GEAR	RATIO	SPEED (MPH)
1st	8.20	2.7 (4.3km/h)
2nd	3.53	6.3 (10.1 km/h)
3rd	1.41	15.8 (25 km/h)

Planetary drive/steer front axle with 16:42 to 1.0 ratio. Differential equipped with "limited slip" feature. Front axle mounted rigidly to frame.

# REAR

Planetary drive/steer axle with 16.42 to 1.0 ratio. Rear axle mounted with rubber elements to allow oscillation.

Hydraulic steering unit with two cylinders attached to each axle. Allows limited steering when engine is not running. A switch on the control panel is used to select rear-wheel steering, 4-wheel steering or crab steering. Electronic sensors and control box automatically align the steering after a new mode is selected.

Service: 4-wheel hydraulic disc-type brakes

Parking: Spring-applied & hydraulically released disc-type parking brake on transmission.

# Standard:

17.5 x 25, 20-ply rating, mud lug.

# **CARGO DECK**

capacity on deck when load is centered over or between axles. (Side deck

# **HEADLIGHT & TAILLIGHT GRILLES:**

**OUTRIGGERS** 

# Four hydraulic out & down outriggers of box beam construction

ACCESSORY STORAGE BOX One side deck compartment & one front deck compartment, each box

# Lifting rings at each corner of cargo deck so sling can be attached for lifting crane.

# Provides one-position access to all chassis & crane functions. Includes adjustable operator's seat, retracting seat belts, fire extinguisher, electronic level gauge & tilt steering wheel. DRUM ROTATION INDICATOR An indicator display light & joystick thumper indicates drum rotation. ALL WEATHER CAB

Consists of rigid mounted canopy section and removable hinged door with safety glass. Rugged canopy structure with laminated glass front & top. Door is equipped with a keyed lock to protect operator's station. Standard integrated heater and A/C system for operator comfort. Includes defroster fan, dome light, heater with 2-speed fan & 12V electric windshield wiper and windshield washer. CLIMATE CONTROL/OPERATOR COMFORT

Integrated heater and air conditioning standard.

RUBBER ISOLATORS

Reduce noise and vibrations. **ELECTRONIC CONTROLS** 

Two dual-axis joysticks provide control of boom motions and hoist.

# LIGHTING PACKAGE

One pair headlights with high & low beams; tail, brake & turn signal lights & back-up lights in rear; turn signals & emergency flasher switch at operator's station.

# INSTRUMENT PACKAGE:

Located on the dashboard at the operator's station is the key pad for outrigger operation, an engine display unit, rocker switches for various functions, and indicator lights. Included with the engine display are simulated gages displaying real-time values for engine RPM, battery voltage, engine hours, fuel level, oil pressure, and coolant temperature. Additional warning lamps monitor vitals like engine status, low fuel, low battery, low oil pressure, and high hydraulic fluid

# BACK-UP ALARM

Provides pulsating sound from 102dB alarm when transmission is in

# **OUTRIGGER ALARM SYSTEM:**

Two-tone alarm is activated when "jack down" or "beam out" controls are operated

# **EMERGENCY STOP SWITCH:**

A two-position push button switch located on the top left-hand of the dash panel. Designed to stop the engine & shut down the hydraulic system.

TRIPLE VANE PUMP delivers 13, 25 & 40 GPM (53, 106 & 151 L/min) at rated 3,000 PSI (207 bar) and 2,500 RPM engine speed. Hydraulic oil tank capacity of 81 gallons (307 L).

Five-section, high-strength steel construction, equipped with bearing pads for efficient support and extension. Second stage uses a doubleacting hydraulic cylinder to telescope sequentially. Double-acting hydraulic cylinder and chain system telescopes boom sections 3, 4, & 5 proportionally. The telescope cylinders and the double-acting boom elevation cylinders are equipped with cylinder-mounted holding valves. Boom angle indicator is on cab side of boom.

# **BOOM ROTATION**

Heavy-duty ball bearing rotation gear with external teeth. Rotation is powered by hydraulic motor & worm gear drive.

# **BOOM HOIST**

Turret-mounted 2-speed planetary gear hoist, is hydraulically powered to provide a low speed bare-drum line pull of 17,850 lbs(8100kg) and a speed of 123 ft/min(37m/min) and a high speed bare-drum line pull of 7,400 lbs(3350kg) and a speed of 300 ft/min(91m/min). Hoist drum is a grooved 10 5/8-inch(270mm) diameter by 17-1/8 in(435mm) long. The hoist includes 370 ft(113m) of 5/8in(16mm) wire rope, cable tensioner, downhaul weight and swivel hook.

# ANTI-TWO-BLOCK DEVICE

Prevents damage to hoist rope and/or crane components from pulling load hook against tip.

# RATED CAPACITY LIMITER

Warns operator of impending overload with audible & visual signals, stopping boom functions that will cause overloads.

# FOUR-PART-LINE SHEAVE BLOCK:

Double-sheave block for 4-part-line requirements. Downhaul weight and hook included as standard

BMC\_400a-ts\_1\_17