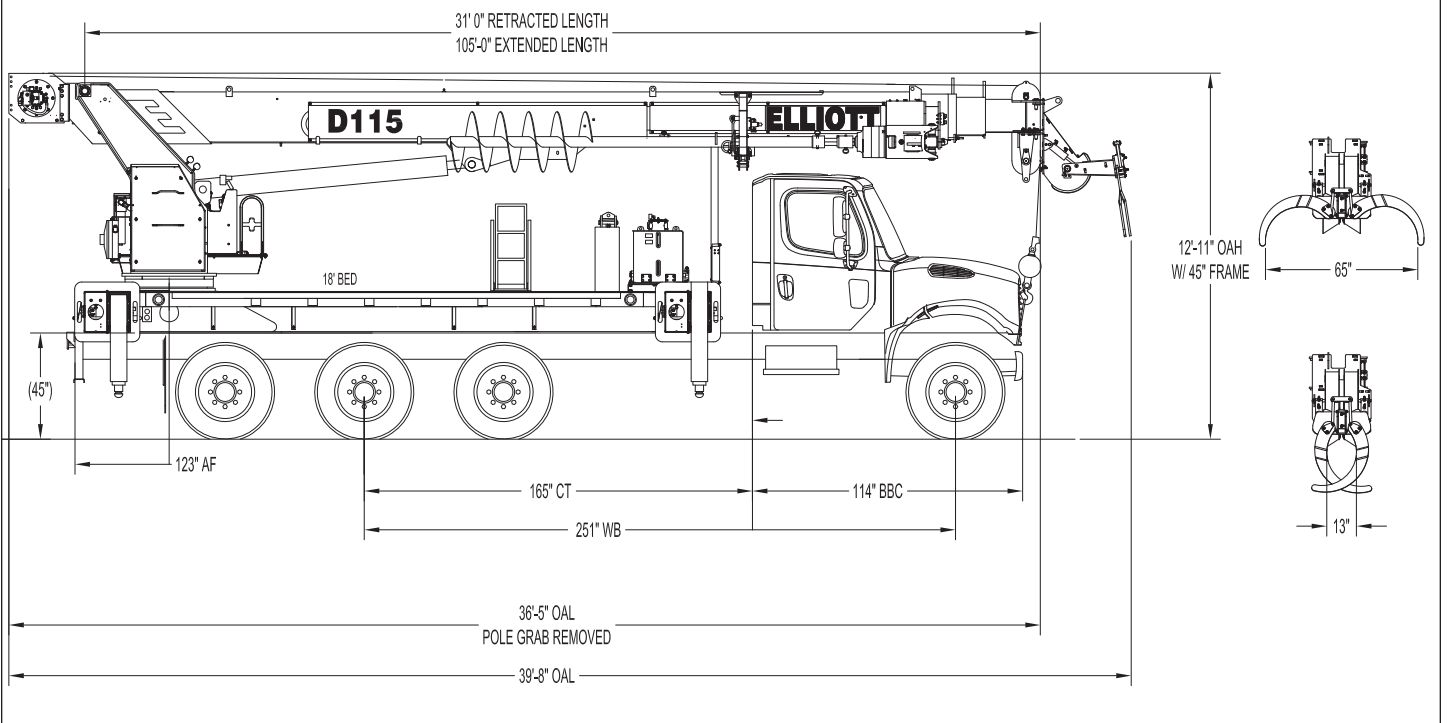




## D115 SIDE VIEW DIAGRAM



- **Sheave Height (Maximum)** 117'/35,7 m
- **Sheave Height (Retracted)** 43'/13,1 m
- **Horizontal Reach (Maximum)** 85'/25,9 m
- **Horizontal Reach (Intermediate)** 45'/13,7 m
- **Horizontal Reach (Retracted)** 28'/8,5 m
- **Lifting Capacity (Maximum)** 50,000 lbs/22 679 kg
- **Lifting Capacity @ 10' Radius** 29,000 lbs/13 154 kg
- **Boom Elevation Limits** -8/+80 Degrees
- **Winch Single Line Pull** 12,000 lbs/5443 kg

- **Boom Rotation** 360 Degrees Continuous
- **Digger Motor Torque** 20,000 ft-lb/27 116 Nm
- **Digger Speed (High/Low)** 80 RPM / 35 RPM
- **Digging Radius (Maximum)** 44'/13,4 m
- **Digging Radius (Minimum)** 27'/8,2 m
- **Outrigger Configuration** Out-Down
- **Outrigger Spread (Full-Span)** 20'/6,1 m
- **Outrigger Spread (Mid-Span)** 13'11"/4,2 m
- **Certification** ANSI A10.31 for Digger Derricks



Elliott Equipment Company Phone: 402-592-4500  
 4427 South 76th Circle Fax: 402-592-4553  
 Omaha, NE 68127 Email: sales@elliottequip.com

**Built for You.**  
[www.elliottequip.com](http://www.elliottequip.com)

## TECHNICAL SPECIFICATIONS

**Derrick Capacity:** 29,000 lbs at a 10' radius.

**Maximum Tip Height:** 117'

**Control Console:** Rotating open seated control station equipped with five single axis control levers for the main digger controls. Operator station includes LMI display, bubble level gauge, engine start/stop switch, signal horn button, variable speed throttle switch, lifting capacity chart, range diagram chart, boom angle indicator, system pressure gauge, 12V DC power source, and cup holder. Independent ground level electric operated outrigger controls.

**Boom:** Four-section 31' retracted to 105' extended, proportional high strength steel plated rectangular boom. A maximum boom tip height of 117'. The boom tip contains one upper sheave and two lower sheaves. Assembly includes heavy-duty cylinder fittings, pivot pins, and replaceable wear pads. Includes detachable hydraulic pole claw with gripping and tilting functions with pole guide. Enhanced arms for gripping wider poles.

**Winch:** Mounted at the base of the boom for a long fleet angle and flat level spooling of cable. Winch is driven by a planetary reducer and powered by a hydraulic motor. The winch brake is spring applied, pressure release design. Supplied with 335' of 7/8" diameter synthetic rope with a single line pull of 12,000 lbs, and a downhaul ball with swivel hook for single part line.

**Auger System:** 20,000 ft-lb hydraulic two-speed auger with 3" hex drive mounted at end of boom. Auger equipped with a 3" Kelly bar (auger extension bar) able to accept 24", 36", or 48" flightings. Auger and flighting to be stowed on side of boom from controls operated at main control station. Up to a 36" flighting to be stowed during transport. The auger provides a 44' digging radius. Auger is provided with radio remote control system with integral LMI display in transmitter.

Elliott Equipment Company reserves the right to change the specification of any unit at any time without prior notice. This brochure is only a statement of general specifications on the date of this publication. For more detailed info on specific Elliott trucks go to [www.elliottequip.com](http://www.elliottequip.com)

**Load Moment Indicator System:**

System senses hoist cylinder pressures, boom length and boom angle with hydraulic function lockout. The display console is equipped with a bar graph showing crane utilization, boom angle or boom length, mode select controls for main boom and optional platform operation, and an anti-two block with an audio/visual warning and shut-off functions to limit hook-boom point contact.

**Outriggers:** Two sets of out and down overframe outriggers with 20' span. Outriggers are configured for full span or mid span operation. Outriggers equipped with ball socket aluminum removable pads that stow on vertical outrigger legs.

**Frame:** Full length, all welded rigid 4-plate design sub-frame. Sub-frame allows for bolt-on addition of 18' bed wings, with top plate of subbase serving as a portion of the bed deck to form a three-piece bed.

**Turret:** Reverse offset turret is one-piece weldment. Turret rotates on large diameter ball bearing.

**Rotation:** Hydraulic motor drives turret through double reduction planetary swing drive for 360 degree continuous rotation.

**Lift:** One double-acting long stroke cylinder provides smooth and stable boom elevation. Holding valve prevents boom from falling in event of hose failure.

**Boom Extension:** Incorporates a 2-stage hydraulic extension cylinder, attached to the largest boom section, with a proportional cable extension system driving the outermost sections.

**Hoses:** All high pressure hoses are wire braid reinforced with a minimum safety factor of 4 to 1.

**Cylinders:** All cylinders use microhoned cylinder tubing, chrome shafts, top grade packing and protective rod wipers.

Cylinder-mounted holding valves provided on all load-holding cylinders.

**Hydraulic System:** Equipped with air-shift PTO, piston pump, SAE O-ring face seals on pressure lines, and a 10-micron return line filter. The control valve distributes all flow to hoist system, swing circuit, and other crane functions. System is closed center type.

**Oil Tank Capacity:** 119 gallon mounted on top of front outriggers.

**Cab Equipment:** PTO switch with indicator lights installed in truck cab. U/L approved 5:BC dry chemical fire extinguisher installed in truck cab.

**Operators Manual & Video:** Two CD copies and one hard copy of operation, maintenance, safety and parts manual provided with each unit.

**Installation:** Unit installed on chassis, painted, system and tank filled with oil, tested, inspected, and ready to operate.

**Standard Paint:** Paint turret and boom white, outriggers red, and bed and boxes black. Top of bed painted with black nonskid surface.

**Bumper:** Bureau of Motor Carrier Safety rear bumper.

**Weight:** Approximately 31,850 lbs with 18' steel-floor bed less truck.

**Truck Chassis Required:** Approx. 192" C.T. RBM 3,300,000 in-lb. per rail, 20,000 lb front axle and 60,000 lb GVWR required. Recommended GVWR is minimum with flatbed only. Contact factory when additional equipment is to be added.

**Available Options:**

EZ-CRIB 2 Stage Vertical Outriggers

15 or 25-Ton Hook Blocks

2-Person Detachable Work Platform

Multiple Auger Flightings to 48"

Wireless Outrigger Controls

Underbody Toolboxes

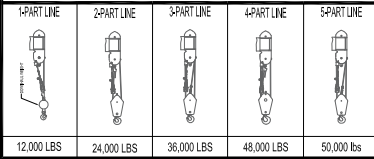
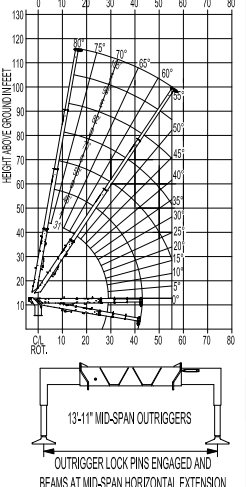
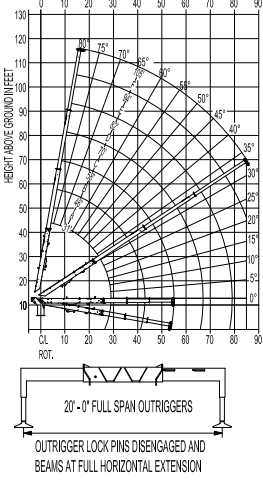
Much more...

LOAD AND RANGE CHART

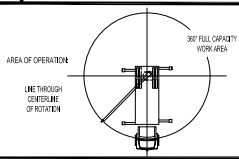


MODEL D115 DIGGER DERRICK

MAIN BOOM LOAD RATINGS WITH FULLY EXTENDED OUTRIGGERS											RANGE DIAGRAM WITH OUTRIGGERS		MAIN BOOM LOAD RATINGS WITH OUTRIGGERS AT MID-SPAN POSITION											RANGE DIAGRAM WITH OUTRIGGERS																																																	
MAIN BOOM LOAD RATINGS											AT FULL SPAN POSITION		MAIN BOOM LOAD RATINGS											AT MID-SPAN POSITION																																																	
LOAD RATINGS IN LBS WITH OUTRIGGERS AND STABILIZERS EXTENDED											LOAD RADIUS FROM CENTERLINE OF ROTATION IN FEET		LOAD RATINGS IN LBS WITH OUTRIGGERS AND STABILIZERS EXTENDED											LOAD RADIUS FROM CENTERLINE OF ROTATION IN FEET																																																	
LOAD HOIST FEET	LOADED BOOM ANGLE	31'-R	46'-R	58'-R	70'-R	82'-R	94'-R	105'-R			LOAD HOIST FEET	LOADED BOOM ANGLE	31'-R	46'-R	58'-R	70'-R	82'-R	94'-R	105'-R			LOAD HOIST FEET	LOADED BOOM ANGLE	31'-R	46'-R	58'-R	70'-R	82'-R	94'-R	105'-R																																											
5	80.0	50,000									5	80.0	50,000										5	80.0	50,000									5	80.0	50,000																																					
6	78.0	40,000									6	78.0	40,000										6	78.0	40,000									6	78.0	40,000																																					
8	74.2	30,000	79.2	17,000							8	74.2	30,000	79.2	17,000								8	74.2	30,000	79.2	17,000							8	74.2	30,000	79.2	17,000																																			
10	70.3	29,000	76.6	16,800							10	70.3	29,000	76.6	16,800								10	70.3	29,000	76.6	16,800							10	70.3	29,000	76.6	16,800																																			
12	66.2	26,100	74.0	16,400	77.4	16,500					12	66.2	26,100	74.0	16,400	77.4	16,500					12	66.2	26,100	74.0	16,400	77.4	16,500					12	66.2	26,100	74.0	16,400	77.4	16,500																																		
14	62.0	22,600	71.3	16,000	75.4	16,000	78.0	16,000			14	62.0	19,900	71.3	16,000	75.4	16,000	78.0	16,000			14	62.0	19,900	71.3	16,000	75.4	16,000	78.0	16,000			14	62.0	19,900	71.3	16,000	75.4	16,000	78.0	16,000																																
16	57.6	19,400	68.6	15,700	73.3	15,500	76.3	15,500	78.3	12,000	16	57.6	18,100	68.6	15,700	73.3	15,500	76.3	15,500	78.3	12,000		16	57.6	18,100	68.6	15,700	73.3	15,500	76.3	15,500	78.3	12,000	16	57.6	18,100	68.6	15,700	73.3	15,500	76.3	15,500	78.3	12,000																													
18	52.9	16,500	65.8	15,300	71.1	15,000	74.5	15,000	76.9	12,000	18	52.9	14,400	65.8	14,800	71.1	15,000	74.5	15,000	76.9	12,000	78.6	12,000	18	52.9	14,400	65.8	14,800	71.1	15,000	74.5	15,000	76.9	12,000	78.6	12,000	18	52.9	14,400	65.8	14,800	71.1	15,000	74.5	15,000	76.9	12,000	78.6	12,000																								
20	47.8	14,200	62.9	15,000	69.0	14,500	72.8	14,500	75.4	12,000	20	48.9	10,800	62.9	12,000	69.0	12,500	72.8	12,700	75.4	12,000	77.3	12,000	20	48.9	10,800	62.9	12,000	69.0	12,500	72.8	12,700	75.4	12,000	77.3	12,000	20	48.9	10,800	62.9	12,000	69.0	12,500	72.8	12,700	75.4	12,000	77.3	12,000																								
22	42.3	11,700	60.0	14,500	66.8	14,000	71.0	14,000	74.0	12,000	22	42.3	8,100	60.0	9,500	66.8	10,200	71.0	10,300	74.0	10,600	76.1	10,500	78.0	7,900	22	42.3	8,100	60.0	9,500	66.8	10,200	71.0	10,300	74.0	10,600	76.1	10,500	78.0	7,900	22	42.3	8,100	60.0	9,500	66.8	10,200	71.0	10,300	74.0	10,600	76.1	10,500	78.0	7,900																		
25	32.2	8,800	55.3	11,100	63.5	13,000	68.4	13,000	71.7	12,000	25	32.2	6,400	55.3	7,200	63.5	7,500	68.4	8,100	71.7	8,200	74.2	8,500	76.1	7,900	25	32.2	6,400	55.3	7,200	63.5	7,500	68.4	8,100	71.7	8,200	74.2	8,500	76.1	7,900	25	32.2	6,400	55.3	7,200	63.5	7,500	68.4	8,100	71.7	8,200	74.2	8,500	76.1	7,900																		
30		46.9	7.800	58.1	11,000	64.2	10,800	68.3	10,900	71.2	9,700	73.2	7,900	30		46.9	4,900	58.1	5,300	64.2	5,500	68.3	5,600	71.2	5,900	73.2	6,000	30		46.9	4,900	58.1	5,300	64.2	5,500	68.3	5,600	71.2	5,900	73.2	6,000	30		46.9	4,900	58.1	5,300	64.2	5,500	68.3	5,600	71.2	5,900	73.2	6,000																		
35		37.8	6,200	51.8	8,600	59.4	8,100	64.4	8,700	67.9	8,000	70.3	7,900	35		37.8	3,000	51.8	3,500	59.4	3,700	64.4	3,800	67.9	4,100	70.3	4,200	35		37.8	3,000	51.8	3,500	59.4	3,700	64.4	3,800	67.9	4,100	70.3	4,200	35		37.8	3,000	51.8	3,500	59.4	3,700	64.4	3,800	67.9	4,100	70.3	4,200																		
40		24.3	4,100	44.9	6,100	54.4	5,400	60.3	6,800	64.5	7,100	67.4	6,900	40		24.3	1,800	44.9	2,300	54.4	2,500	60.3	2,600	64.5	2,800	67.4	2,900	40		24.3	1,800	44.9	2,300	54.4	2,500	60.3	2,600	64.5	2,800	67.4	2,900	40		24.3	1,800	44.9	2,300	54.4	2,500	60.3	2,600	64.5	2,800	67.4	2,900																		
45			36.9	5,200	49.0	4,500	56.1	4,600	61.0	5,400	64.3	5,800	45			36.9	1,400	49.0	1,600	56.1	1,700	61.0	1,800	64.3	2,000	45			36.9	1,400	49.0	1,600	56.1	1,700	61.0	1,800	64.3	2,000	45			36.9	1,400	49.0	1,600	56.1	1,700	61.0	1,800	64.3	2,000																						
50			26.7	4,000	43.1	3,700	51.7	3,800	57.4	3,800	61.2	4,300	50			26.7	700	43.1	900	51.7	1,000	57.4	1,200	61.2	1,300	50			26.7	700	43.1	900	51.7	1,000	57.4	1,200	61.2	1,300	50			26.7	700	43.1	900	51.7	1,000	57.4	1,200	61.2	1,300																						
55				36.3	3,100	46.9	3,200	53.6	3,200	58.0	2,900	55				46.9	500	53.6	600	58.0	700	55				46.9	500	53.6	600	58.0	700	55				46.9	500	53.6	600	58.0	700																																
60				28.1	2,600	41.7	2,600	49.6	2,600	54.8	2,100	60													60				30.0	1,800	40.7	1,800	47.4	1,400	60				30.0	1,800	40.7	1,800	47.4	1,400																													
65				16.1	2,100	35.9	2,200	45.4	2,200	51.1	1,900	65													65				19.9	1,300	35.6	1,100	43.5	1,000	65				19.9	1,300	35.6	1,100	43.5	1,000																													
70								30.0	1,800	40.7	1,800	47.4	1,400	70													70								38.2	700	70								38.2	700																											
75								19.9	1,300	35.6	1,100	43.5	1,000	75													75													75																																	
80																										80																							80																								
85																											85																								85																						
0	5,800	0	4,000	0	2,500																					0	5,800	0	4,000	0	2,500																			0	5,800	0	4,000	0	2,500																		



NOTICE  
- DO NOT DEADHEAD LINE BLOCK AGAINST BOOM TIP WHEN EXTENDING BOOM.  
- KEEP AT LEAST 5 WRAPS OF LOADLINE ON THE WINCH DRUM AT ALL TIMES.  
- USE ONLY 7/8" DIAMETER ROPE, AS SPECIFIED BELOW, WITH THE PROPER BREAKING STRENGTHS LISTED.  
- ANTI-TWO-BLOCK SYSTEM MUST BE IN GOOD OPERATING CONDITION BEFORE OPERATING CRANE.  
SEE OPERATION & SAFETY MANUAL.  
7/8" ULTREX PLUS SYNTHETIC ROPE



- NOTES:  
1. CAPACITIES DO NOT EXCEED ANSI / ASSE A10.31 REQUIREMENTS.  
2. PERSONNEL HANDLING IS ALLOWED ONLY WITH FULL SPAN OUTRIGGERS  
3. BOOM LOAD RATINGS ARE BASED ON LOADED BOOM RADIUS.  
4. LOADED BOOM ANGLES ARE GIVEN AS REFERENCE ONLY.  
5. DEDUCT APPROPRIATE WEIGHT FOR DOWNHAUL WEIGHT AND SNATCH BLOCK

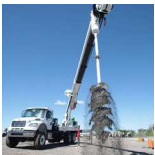
<p><b>⚠ DANGER</b></p> <p>OVERLOADING THE CRANE WILL RESULT IN DEATH OR SERIOUS INJURY</p> <p>Deductions must be made for boom and or loadline attachments to determine allowable load.</p> <p>Use deduct information provided on this label or on a loadline attachments for Elliott Equipment Company provided accessories.</p> <p>Refer to owner's manual for additional information.</p> <p>MEETS ANSI/ASSE A10.31 REQUIREMENTS AT TIME OF MANUFACTURE</p>	<p><b>ACCESSORY</b></p> <p>BOOM MOUNTED POLE GRAB 600 LB @ ANY BOOM LENGTH</p> <p>STOWED AUGER BIT SEE TABLE</p> <p>NOTE: THE WEIGHTS OF THE HYDRAULIC DIGGER DRIVE AND EXTENSION BAR ARE CALIBRATED INTO THE LOAD CHART AND DO NOT REQUIRE ADDITIONAL DEDUCTIONS, THIS CALIBRATION DOES NOT INCLUDE THE WEIGHT OF AN ATTACHED AUGER BIT.</p> <p>AN ADDITIONAL DEDUCTION MUST BE MADE WHEN AN AUGER BIT IS ATTACHED TO THE DIGGER DRIVE AND STOWED ON THE SIDE OF THE BOOM. THE DEDUCTION AMOUNT IS A PERCENTAGE OF THE WEIGHT OF THE AUGER BIT. THE FOLLOWING TABLE LISTS THE DEDUCTION PERCENTAGES FOR EACH BOOM LENGTH AND INCLUDES SAMPLE DEDUCTIONS FOR A 500 LB AUGER BIT:</p>	<p><b>DEDUCT FROM RATED LOAD</b></p> <p>600 LB @ ANY BOOM LENGTH</p> <p>SEE TABLE</p>	<p><b>STOWED AUGER DEDUCTIONS</b></p> <table border="1"> <thead> <tr> <th>BOOM LENGTH</th> <th>RET</th> <th>46'</th> <th>58'</th> <th>70'</th> <th>82'</th> <th>94'</th> <th>105'</th> </tr> </thead> <tbody> <tr> <td>DEDUCTION % OF AUGER BIT WEIGHT</td> <td>75%</td> <td>50%</td> <td>40%</td> <td>35%</td> <td>30%</td> <td>25%</td> <td>25%</td> </tr> <tr> <td>SAMPLE DEDUCTIONS FOR A 500 LB AUGER BIT</td> <td>375 LB</td> <td>250 LB</td> <td>200 LB</td> <td>175 LB</td> <td>150 LB</td> <td>125 LB</td> <td>125 LB</td> </tr> </tbody> </table> <p>AUGER BIT</p>	BOOM LENGTH	RET	46'	58'	70'	82'	94'	105'	DEDUCTION % OF AUGER BIT WEIGHT	75%	50%	40%	35%	30%	25%	25%	SAMPLE DEDUCTIONS FOR A 500 LB AUGER BIT	375 LB	250 LB	200 LB	175 LB	150 LB	125 LB	125 LB
	BOOM LENGTH	RET	46'	58'	70'	82'	94'	105'																			
DEDUCTION % OF AUGER BIT WEIGHT	75%	50%	40%	35%	30%	25%	25%																				
SAMPLE DEDUCTIONS FOR A 500 LB AUGER BIT	375 LB	250 LB	200 LB	175 LB	150 LB	125 LB	125 LB																				
<p>DO NOT PAINT OVER ANY LABELS 1214270 082116</p>																											

## MINIMUM TRUCK CHASSIS SPECIFICATIONS

	Digger Derrick D115
Wheelbase (WB)	258" / 655 cm
Cab to Tandem (CT)	192" / 488 cm
Cab to End of Frame (EOF)	286" / 726 cm
Frame Section Modulus	30.0 in3-110,000 psi
Front Axle Gross Weight Rating	20,000 lb / 9071 kg
Rear Axle Gross Weight Rating	40,000 lb / 18 144 kg
Integral Front Frame Rails	Not Required

Chassis data is minimum general requirements-not for engineering.  
Actual dimensions and truck data will depend on truck selection and axle configuration.  
\*Minimum chassis weight is required to meet 85% stability requirements.

## AVAILABLE OPTIONS



### Automatic Safety Rotation Lockout

Safely work where space is a concern using Elliott's rotation lockout system that permits operation with the outriggers extended on one side and retracted on the opposite side.



### Multiple Sizes of Auger Flightings

Choose from a wide range of auger flightings including a 24", 36", or 48" option. Flightings up to 36" will stow on the boom when using the standard 3" Kelly bar.



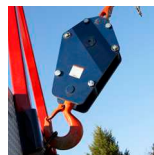
### EZ-CRIB Two-Stage Outriggers

Elliott's unique two-stage outrigger cylinder option provides both high ground clearance and increased ground penetration for working off-road with less cribbing.



### 2-Man Gravity-Leveled Work Platform

Add a 600 lb capacity 2-man platform with Elliott's hydraulic yoke lifting system for easy attachment to the boom tip. Fully OSHA compliant and heavy duty.



### Hook Blocks for Multi-Part Line

Elliott can add a 2-3 part hook block or a 4-part hook block to maximize your load chart to the full rated capacity. The blocks can be stored on the bed.



### Body Mounted Hose Reels and Circuits

Let us work with you to customize your tool compatibility by adding hose reels or hydraulic circuits to the flatbed in a variety of locations to provide power at ground level.



### Tool Boxes and Storage

Custom tool boxes and bed storage solutions can accommodate a wide range of storage needs. Available materials include steel, painted aluminum and aluminum treadplate.



### Hydraulic Oil Tank Heater

For work in colder climates, adding a hydraulic tank heater helps heat the oil quickly and allows you to start working quickly on the job site.