Illustrated Parts Manual

Models

40ic
45ic

P/N
3120735

September 30 2011

ANSI

An Oshkosh Corporation Company

MidWestTech | JLG 40ic, 45ic Boom Lift Parts Manual | Publication 3120735

Order the manual at mid-west-tech.com >

TABLE OF CONTENTS

SECTION 1 - FRAME 7

FIGURE 1-1. FRAME AND STEERING INSTALLATIONS 8
FIGURE 1-2. TIRE AND WHEEL DRIVE INSTALLATIONS 12
FIGURE 1-3. DRIVE HUB ASSEMBLY 16
FIGURE 1-4. DRIVE MOTOR ASSEMBLY 18
FIGURE 1-5. DRIVE BRAKE ASSEMBLY 20
FIGURE 1-6. VALVES, BATTERY AND TILT INDICATOR INSTALLATIONS (FRAME MOUNTED) 24
FIGURE 1-7. ACCESSORY VALVE ASSEMBLY 28
FIGURE 1-8. VANGUARD GAS ENGINE INSTALLATIONS 30
FIGURE 1-9. DUAL FUEL INSTALLATION (OPTION FOR VANGUARD GAS MACHINES) 36
FIGURE 1-10. YANMAR DIESEL ENGINE INSTALLATION 38
FIGURE 1-11. PISTON PUMP ASSEMBLY 42
FIGURE 1-12. GEAR PUMP ASSEMBLY 44
FIGURE 1-13. TANK INSTALLATIONS 46
FIGURE 1-14. FRAME COVERS INSTALLATIONS 48

SECTION 2 - TURNTABLE 51

FIGURE 2-1. TURNTABLE MOUNTED COMPONENTS INSTALLATION 52
FIGURE 2-2. CONTROL VALVE ASSEMBLY 56
FIGURE 2-3. SWING DRIVE AND TURNTABLE BEARING INSTALLATIONS 58
FIGURE 2-4. SWING MOTOR ASSEMBLY 60
FIGURE 2-5. SWING BEARING ASSEMBLY 62
FIGURE 2-6. GROUND CONTROL BOX ASSEMBLY 64
FIGURE 2-7. TURNTABLE AND HOODS INSTALLATION 68

SECTION 3 - BOOM 71

FIGURE 3-1. BOOM AND LIMIT SWITCHES INSTALLATIONS 72
FIGURE 3-2. MAIN BOOM COMPONENTS ASSEMBLY 76

SECTION 4 - PLATFORMS 79

FIGURE 4-1. PLATFORM COMPONENTS INSTALLATION 80
FIGURE 4-2. ROTATOR MOTOR/PUMP/TANK ASSEMBLY 84
FIGURE 4-3. PLATFORM CONSOLE ASSEMBLY 86
FIGURE 4-4. CONTROLLER ASSEMBLY - DRIVE/STEER 90

SECTION 5 - CYLINDER 93

FIGURE 5-1. UPPER LIFT CYLINDER ASSEMBLIES 94
FIGURE 5-2. MID LIFT CYLINDER ASSEMBLIES 96
FIGURE 5-3. LOWER LIFT CYLINDER ASSEMBLIES 100
FIGURE 5-4. MASTER CYLINDER ASSEMBLY 104
FIGURE 5-5. PLATFORM ROTATOR CYLINDER ASSEMBLY 106
FIGURE 5-6. SLAVE (PLATFORM LEVEL) CYLINDER ASSEMBLY 108
FIGURE 5-7. STEER CYLINDER ASSEMBLY 110
FIGURE 5-8. TELESCOPE CYLINDER ASSEMBLIES 112
FIGURE 5-9. OPTIONAL CYLINDER BELLOWS INSTALLATION 114

SECTION 6 - HYDRAULICS 117

FIGURE 6-1. HYDRAULICS DIAGRAM LIST 118
FIGURE 6-2. HYDRAULIC DIAGRAM (SHEET 1 OF 2) 120

SECTION 7 - ELECTRICAL 125

FIGURE 7-1. ELECTRICAL DIAGRAMS AND DIAGRAM LIST 126
FIGURE 7-2. ELECTRICAL DIAGRAM - STANDARD (SHEET 1 OF 2) 128
FIGURE 7-3. HARNESS INSTALLATIONS 130

SECTION 8 - DECALS 137

FIGURE 8-1. DECALS INSTALLATION - ANSI SPEC 138
FIGURE 8-2. DECALS INSTALLATION - JAPANESE AND LATIN AMERICA 140

MidWestTech | JLG 40ic, 45ic Boom Lift Parts Manual | Publication 3120735 Order the manual at mid-west-tech.com >

TABLE OF CONTENTS

SECTION 9 - RECOMMENDED SERVICE PARTS STOCK 143

FIGURE 9-1. MODELS 40IC/45IC LIFTS STANDARD PARTS 144
FIGURE 9-2. MODELS 40IC/45IC LIFTS VARIABLE PARTS 148

SECTION 10 - SPECIAL OPTIONS 149

FIGURE 10-1. SPECIAL OPTIONS LIST 150

PART NUMBER INDEX 153

MidWestTech | JLG 40ic, 45ic Boom Lift Parts Manual | Publication 3120735 Order the manual at mid-west-tech.com >

FIGURE 1-1. FRAME AND STEERING INSTALLATIONS

ITEM	PART NUMBER	QTY	DESCRIPTION	REV
		Ref	**FRAME WELDMENT OPTIONS:**	
	2360402	Ref	Frame Weldment Model 40ic	
	2360403	Ref	Frame Weldment Model 45ic	
		Ref	**STEERING AND SPINDLES INSTALLATION**	
	0256855	Ref	**(ANSI Spec)**	3
	0252856	Ref	**(CSA Spec)**	B-3
1	2780201	2	Hub Assembly (See Items 101-105 for Breakdown)	
3	3421988	2	Kingpin	
4	3450810	2	Pin, Cotter 1/4in x 2 1/3in	
5	3313003	2	Nut, Slotted 1 1/4 -7NC	
6	0440162	2	Washer, Thrust	
7	0642016	2	Bolt 5/8in-11NC x 2in	
8	3312005	2	Locknut 5/8in-11NC	
9	3841146	2	End, Rod	
10	3322002	2	Nut, Jam 5/8in-18NF	
11	1683487	1	Steer Cylinder Assembly (See CYLINDER SECTION for Breakdown)	
12	3340644	1	Pad, Wear	
13	3020022	AR	Grease	
14	4070809	AR	Shim	
15	4712400	2	Flatwasher 7/8in	
16	3450506	2	Pin, Cotter	
17	3780182	4	O-Ring	
18	0641510	1	Bolt 5/16in-18NC x 1 1/4in	
19	4751500	1	Flatwasher 5/16in	
20	3311505	1	Locknut 5/16in-18NC	
21	0630016	12	Bolt, Wheel 1/2in-20NF x 1in	
22	4060808	2 ft/.61m	Trim	
23	1120457	2	Cap, Dust	
52		Ref	Spindle Weldment Options: (See Items 201-202 for Breakdown)	
52	4130319	2	ANSI Spec	
52	4130302	2	CSA Spec	
	2780201	Ref	**HUB ASSEMBLY**	D
101	Kit	2	Cup, Bearing - Inner (1 Per Hub)	
102	Kit	2	Cone, Bearing - Inner (1 Per Hub)	
103	Kit	2	Cup, Bearing - Outer (1 Per Hub)	
104	Kit	2	Cone, Bearing - Outer (1 Per Hub)	
105	Kit	2	Seal (1 Per Hub)	
	2900842	2	Bearing Kit (Includes Item 101-105)	
		Ref	**SPINDLE ASSEMBLY**	
201	0961621	4	Bushing (2 Per Spindle)	
202	3322403	2	Nut, Slotted 7/8in-14NF (1 Per Spindle)	
	0253613	Ref	**AXLE INSTALLATION**	D
301	4844324	1	Axle Weldment (Includes Item 301A)	
301A	0961621	2	Bushing	
302	0940048	2	Bumper	
303	4070832	AR	Shim 1/2in-13mm	
304	4070833	AR	Shim 1/16in-1.6mm	
305	0641814	4	Bolt 1/2in-13NC x 1 3/4in	
306	3311805	4	Locknut 1/2in-13NC	

MidWestTech | JLG 40ic, 45ic Boom Lift Parts Manual | Publication 3120735 Order the manual at mid-west-tech.com >

FIGURE 3-2. MAIN BOOM COMPONENTS ASSEMBLY

ITEM	PART NUMBER	QTY	DESCRIPTION	REV
		Ref	**MAIN BOOM ASSEMBLY**	
	0800832	Ref	**Main Boom Assembly Model 40ic**	O-12
	0800853	Ref	**Main Boom Assembly Model 45ic**	J-12
5	1180302	1	Power-Track	
5	7019698	40	Links	
5	7019699	1	Bracket, End (Sold in Pairs)	
6	4844579	1	Holder, Wear Pad (Base Front Bottom)	
7	3340663	8	Pad, Wear (Base Front Top and Sides/Fly Rear Sides and Bottom)	
8	3340666	2	Pad, Wear (Fly Rear Top) **(Prior to SN 31965)**	
8	3340820	2	Pad, Wear (Fly Rear Top) **(SN 31965 to Present)**	
10	1760160	8	Disc	
11	0630487	6	Bolt, Special	
12	3311602	8	Nut, Jam 3/8in-16NC	
13	0641818	4	Bolt 1/2in-13NC x 2 1/4in	
14	4761800	4	Lockwasher 1/2in	
15	3760115	2	Ring, Retaining	
16	0641405	2	Bolt 1/4in-20NC x 5/8in	
17	0641404	2	Bolt 1/4in-20NC x 1/2in	
18	4761400	7	Lockwasher 1/4in	
19	0641606	7	Bolt 3/8in-16NC x 3/4in	
20	4761600	7	Lockwasher 3/8in	
21	0100011	AR	Loctite #242	
22	1670678	1	Cover, Boom	
23	1670698	1	Cover, Boom	
24	4751400	7	Flatwasher 1/4in	
25	3311401	3	Nut 1/4in-20NC	
26		Ref	Casting, Wear Pad Holder (Base Front Left Side) Options:	
26	4844383	1	Casting, Wear Pad Holder (Base Front Left Side) **(Prior to SN 35014)**	
26	1220038	1	Casting, Wear Pad Holder (Base Front Left Side) **(SN 35014 to Present)**	
27		Ref	Casting, Wear Pad Holder (Base Front Right Side) Options:	
27	4844384	1	Casting, Wear Pad Holder (Base Front Right Side) **(Prior to SN 35014)**	
27	1220039	1	Casting, Wear Pad Holder (Base Front Right Side) **(SN 35014 to Present)**	
28		Ref	Casting, Wear Pad Holder (Base Front Top) Options:	
28	4844386	1	Casting, Wear Pad Holder (Base Front Top) **(Prior to SN 35014)**	
28	1220040	1	Casting, Wear Pad Holder (Base Front Top) **(SN 35014 to Present)**	
29	0630399	2	Bolt 3/8in-16NC x 2 1/4in	
30	0100009	AR	Silicone (Not Shown)	
31	4740413	5	Spacer	
32	4751600	5	Flatwasher 3/8in	
33	0641608	5	Bolt 3/8in-16NC x 1in	
34	3520034	4	Plug, Hole	
51		Ref	Base Weldment Options:	
51	0800833	1	Base Weldment Model 40ic	
51	0800854	1	Base Weldment Model 45ic	

MidWestTech | JLG 40ic, 45ic Boom Lift Parts Manual | Publication 3120735 Order the manual at mid-west-tech.com >

FIGURE 5-1. UPPER LIFT CYLINDER ASSEMBLIES

ITEM	PART NUMBER	QTY	DESCRIPTION	REV
		Ref	**UPPER LIFT CYLINDER ASSEMBLIES**	
	1683337	Ref	**Upper Lift Cylinder Assemblys (Prior to SN 29899)**	-
	1683506	Ref	**Upper Lift Cylinder Assemblys (SN 29899 through 33089)**	-
	1683520	Ref	**Upper Lift Cylinder Assemblys (SN 33090 to Present)**	1-A
3	1120108	1	Retainer	
4	3480115	1	Piston	
6	3300279	1	Nut, Hex	
10	4640936	1	Cartridge, Holding Valve	
10	2900770	1	Seal Kit - 4640936 Valves	
11	2220885	1	Plug	
12	3900170	1	Setscrew 3/8in-16NC x 3/8in	
13	3951402	1	Setscrew 1/4in-20NC x 1/4in	
14	Kit	2	Ring, Lock	
15	Kit	2	Seal, Piston	
16	Kit	1	O-Ring	
17	Kit	1	Ring, Wear	
18	Kit	1	O-Ring	
19	Kit	1	Seal, Rod	
20	Kit	1	Wiper Rod	
21	0100011	AR	Loctite #242	
22	0100038	AR	Primer, Locking	
23	0100035	AR	Loctite #222	
51		Ref	Barrel Weldment Options:	
51	1682868	1	Barrel Weldment **(Prior to SN 33090)**	
51	1683514	1	Barrel Weldment **(SN 33090 to Present)**	
51A	0961726	2	Bushing, Teflon	
52		Ref	Rod Weldment Options:	
52	1682870	1	Rod Weldment **(Prior to SN 29899)**	
52	1683505	1	Rod Weldment **(SN 29899 to Present)**	
52A	0961726	2	Bushing, Teflon	
53		Ref	Head Options:	
53	1681344	1	Head **(Prior to SN 29899)**	
53	1683504	1	Head **(SN 29899 to Present)**	
54	4740394	1	Washer	
55		Ref	Spacer Options:	
55	4566009	1	Spacer **(Prior to SN 29899)**	
55	4567177	1	Spacer **(SN 29899 to Present)**	
100		Ref	Seal Kit Options: (Not Shown)	
100	2900371	1	1683337 Cylinder **(Prior to SN 29899)**	
100	2901496	1	1683506 & 1683520 Cylinders **(SN 29899 to Present)**	

MidWestTech | JLG 40ic, 45ic Boom Lift Parts Manual | Publication 3120735 Order the manual at mid-west-tech.com >