

MAN 4158519
Rev. A 4-2007



MODELS:

75-70506

DOZER BLADE-48" BD248

75-70526

DOZER BLADE-60" BD260

75-70546

DOZER BLADE-72" BD272



OP/PARTS MANUAL

CALIFORNIA
Proposition 65 Warning

Diesel engine exhaust and some of its constituents are known to the State of California to cause cancer, birth defects and other reproductive harm.

 WARNING

The engine exhaust from this product contains chemicals known to the State of California to cause cancer, birth defects or other reproductive harm.

Californie Proposition 65
Avertissement

Les échappements des moteurs diesel et certains de leurs composés sont reconnus par l'Etat de Californie pour être cancérigènes, provoquer des défauts congénitaux et d'autres dangers en matière de reproduction.

 AVERTISSEMENT

L'émission du moteur de ce matériel contient des produits chimiques que l'Etat de Californie considère être cancérigènes, provoquer des défauts congénitaux et d'autres dangers en matière de reproduction.

California Advertencia
de la Proposicion 65

El estado de California hace saber que los gases de escape de los motores diesel y algunos de sus componentes producen cáncer, defectos de nacimiento y otros daños en el proceso de reproducción humana.

 ADVERTENCIA

El estado de California hace saber que los gases de escape de este producto contienen productos químicos que producen cáncer, defectos de nacimiento y otros daños en el proceso de reproducción humana.

CALIFORNIA
Proposition 65 Warning

Battery posts, terminals, wiring insulation, and related accessories contain lead and lead compounds, chemicals known to the State of California to cause cancer and birth defects or other reproductive harm.
WASH HANDS AFTER HANDLING.

IMPORTANT MESSAGE

Thank you for purchasing this Schiller Grounds Care, Inc. product. You have purchased a world class product, one of the best designed and built anywhere.

This product comes with an Owner/Operator's Manual. The useful life and good service you receive from this product depends to a large extent on how well you read and understand this manual. Treat this product properly and adjust it as instructed, and it will give you many years of reliable service.

See a Schiller Grounds Care, Inc. dealer for any service or parts needed. Schiller Grounds Care, Inc. service ensures that you continue to receive the best results possible from Schiller Grounds Care, Inc. products. You can trust Schiller Grounds Care, Inc. replacement parts because they are manufactured with the same high precision and quality as the original parts.

Schiller Grounds Care, Inc. designs and builds its equipment to serve many years in a safe and productive manner. For longest life, use this product only as directed in the manual, keep it in good repair and follow safety warnings and instructions. You'll always be glad you did.

Schiller Grounds Care, Inc.
One Bob Cat Lane
Johnson Creek, WI 53038-0469

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DESCRIPTION

The Power Angle Blade is designed to be used on Steiner power units equipped with a front lift quick hitch and auxiliary hydraulic outlets. Fast, simple installation provides reliable dozing for light landscaping or snow removal. The Power Angle Blade allows the operator many choices of blade position. The blade may be power angled straight ahead, to the right or left, and any angle in between. The Manual Angle Blade allows the operator three choices of blade position. The blade may be angled straight ahead, to the right or to the left. Skid shoes are adjustable for various surface conditions to minimize cutting edge wear. The blade is equipped with safety springs for protection in the event that the blade strikes a solid object.



SPECIFICATIONS

	Manual Angle	Power Angle
Overall Width: BD148.....	48"	
BD160.....	60"	
Overall Width: BD248.....		48"
BD260.....		60"
BD272.....		72"
Overall Height:.....	19"	19"
Overall Length:.....	26"	32"
Blade height from cutting edge:.....	19"	19"
Manual angling:.....	25° left & right	
Hydraulic angling:.....		30° left & right
Cutting width, Angled 30°:.....		BD248 36"
		BD260 48"
		BD272 60"
Skid Shoes:.....	Adjustable	Adjustable
Forward Tilt:.....	Spring-loaded	Spring-loaded
Reversible cutting edge:.....	3" hardened	3" hardened
Ground clearance:.....	14"(Model 420/430)	14"(Model 420/430)
Weight: BD148.....	135 lbs.	
BD160.....	160 lbs.	
Weight: BD248.....		160 lbs.
BD260.....		185 lbs.
BD272.....		205 lbs.

*** These specifications are subject to change without notice.**



NOTICE !!!

Unauthorized modifications may present **extreme** safety hazards to operators and bystanders and could also result in product damage.

Schiller Grounds Care, Inc. strongly warns against, rejects and disclaims any modifications, add-on accessories or product alterations that are not designed, developed, tested and approved by Schiller Grounds Care, Inc. Engineering Department. Any Schiller Grounds Care, Inc. product that is altered, modified or changed in any manner not specifically authorized after original manufacture—including the addition of “after-market” accessories or component parts not specifically approved by Schiller Grounds Care, Inc.—will result in the Schiller Grounds Care, Inc. Warranty being voided.

Any and all liability for personal injury and/or property damage caused by any unauthorized modifications, add-on accessories or products not approved by Schiller Grounds Care, Inc. will be considered the responsibility of the individual(s) or company designing and/or making such changes. Schiller Grounds Care, Inc. will vigorously pursue full indemnification and costs from any party responsible for such unauthorized post-manufacture modifications and/or accessories should personal injury and/or property damage result.



This symbol means:
ATTENTION!
BECOME ALERT!

Your safety and the safety of others is involved.

Signal word definitions:

The signal words below are used to identify levels of hazard seriousness. These words appear in this manual and on the safety labels attached to Schiller Grounds Care, Inc. machines. For your safety and the safety of others, read and follow the information given with these signal words and/or the symbol shown above.

DANGER

DANGER indicates an imminently hazardous situation which, if not avoided, **WILL** result in death or serious injury.

WARNING

WARNING indicates a potentially hazardous situation which, if not avoided, **COULD** result in death or serious injury.

CAUTION

CAUTION indicates a potentially hazardous situation which, if not avoided, **MAY** result in minor or moderate injury. It may also be used to alert against unsafe practices or property damage.

CAUTION

CAUTION used without the safety alert symbol indicates a potentially hazardous situation which, if not avoided, **MAY** result in property damage

Schiller Grounds Care, Inc.

One Bobcat Lane
Johnson Creek, WI 53038 U.S.A
Phone: 920-699-2000
Fax: 920-699-3683

MODEL NUMBER

SERIAL NUMBER

MODEL NUMBER: This number appears on sales literature, technical manuals and price lists.

SERIAL NUMBER: This number appears only on your mower. It contains the model number followed consecutively by the serial number. Use this number when ordering parts or seeking warranty information.

GENERAL SAFETY

1. Read and understand the Owner's Manual before attempting to operate this machine.
2. Operate all controls from the operator's seat. **NO RIDERS.**
3. Keep all shields in place and safety switches adjusted properly.
4. Do not leave equipment unattended. STOP the engine and remove the key.
5. Do not allow minors or the inexperienced to operate this machine.
6. Keep people and pets a safe distance away from machine using power driven attachments. Injury could result from flying debris.

OPERATING SAFETY

1. **DO NOT** attempt to work on unit or any attachments with the engine running. **STOP ENGINE!**
2. Before leaving the tractor seat:
 - **Lower Blade**
 - **Set PARKING brake**
 - **Stop engine**

WARNING

To prevent damage to blade and possible injury to operator, always remove safety trip lock-out pin when operating at high speeds.

INSTALLATION INSTRUCTIONS

1. Attach blade to “quick hitch” front lift in the usual manner.
2. Raise the “kick stand” to transport position.
3. **Power Angle:** Connect the hoses to the auxiliary quick couplers.

NOTE: To reverse the auxiliary hydraulic lever action, switch the hoses at the quick couplers.

ASSEMBLY INSTRUCTIONS

Manual Angle Blade:

1. Remove blade and attaching parts from shipping container and place blade face down on a level floor.
2. See Figures 1 & 3 in the parts section for parts identification. Attach the subframe to the blade with rod and cotter pins as shown.
3. Hook safety trip springs over sub-frame arms and install adjusters through tabs on the blade. Tighten until about 1/2" of thread extends beyond the nut.
4. Install skid shoes as shown in Figure 1 using 2 bolts in each shoe and adjust as needed to minimize cutting edge wear.

Power Angle Blade:

1. Remove blade and attaching parts from shipping container and place blade face down on a level floor.
2. See Figures 1 & 2 for parts identification. Attach the subframe to the blade with rod and cotter pins as shown.
3. Hook safety trip springs over sub-frame arms and install adjusters through tabs on the blade. Tighten until about 1/2" of thread extends beyond the nut.
4. Connect hoses to the cylinder and pass them through the round hole in the side of the sub-frame. Install the blade on the tractor and hook up the hoses to the quick couplers.

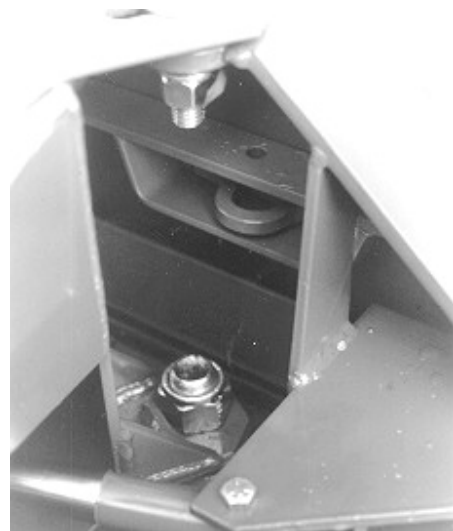
NOTE: To reverse auxiliary hydraulic lever action, switch the hoses at the quick couplers.

5. Leveling adjustment:
 - A. Place tractor with blade installed on a level floor.
 - B. Raise blade 1" off the floor and move to straight position.
 - C. Adjust to obtain equal blade corner heights, in this position, with the two small bolts at the top of the pivot ball.
 - D. Angle blade to the extreme right position. Adjust to obtain equal blade corner heights in this position using the 5/8" bolt in the top pivot ball. Angle to the extreme left position and check again. The ideal setting is to have the blade touch the floor equally in all positions.
6. Install skid shoes as shown in Figure 1 using 2 bolts in each shoe and adjust as needed to minimize cutting edge wear.

1. The **Power Angle** allows the operator many choices of blade position. The blade may be power angled straight ahead, to the right or left , or any position in between.
2. The **Manual Angle** allows the operator three choices of blade position. The blade may be angled straight ahead, to the right or left.
3. Skid shoes are adjustable for various surface conditions to minimize cutting edge wear.
4. Safety trip springs will allow the blade to trip when it hits a solid object. Provision is made to lock the safety trip device for dozing in dirt or heavy material, by inserting a 3/8 x 2" pin in a hole located near the center of the blade frame. **ALWAYS remove the safety trip lock-out pin when traveling at high speeds such as during snow removal!** Photo shows pin removed.

CAUTION

Remove safety trip lock-out pin for high speed operation of blade.



1. Check skid shoes and cutting edge periodically for wear and replace the cutting edge as required to prevent wear to the main blade edge.

NOTE: Cutting edge is reversible for additional wear life.

2. Check safety trip and springs to assure proper operation.
3. Grease pivot ball at 100 hour intervals.
4. Keep it clean!

Power Angle Blade Leveling Adjustment

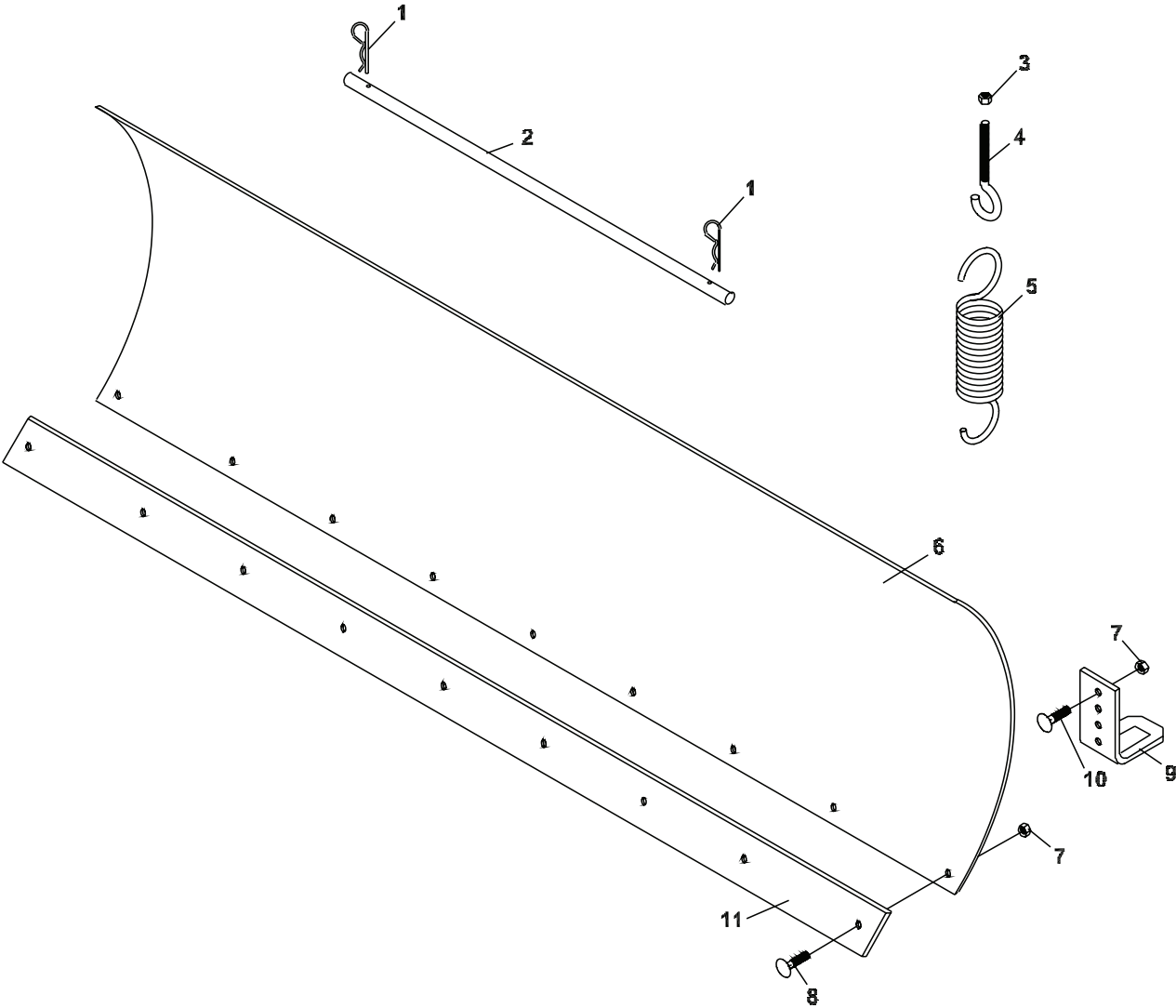
- A. Place tractor with blade installed on a level floor.
- B. Raise blade 1" off the floor and move to straight position.
- C. Adjust to obtain equal blade corner heights, in this position, with the two small bolts at the top of the pivot ball.
- D. Angle blade to the extreme right position. Adjust to obtain equal blade corner heights in this position using the 5/8" bolt in the top pivot ball. Angle to the extreme left position and check again. The ideal setting is to have the blade touch the floor equally in all positions.

**ANGLE
BLADE**

PARTS SECTION

PARTS SECTION

FIGURE 1



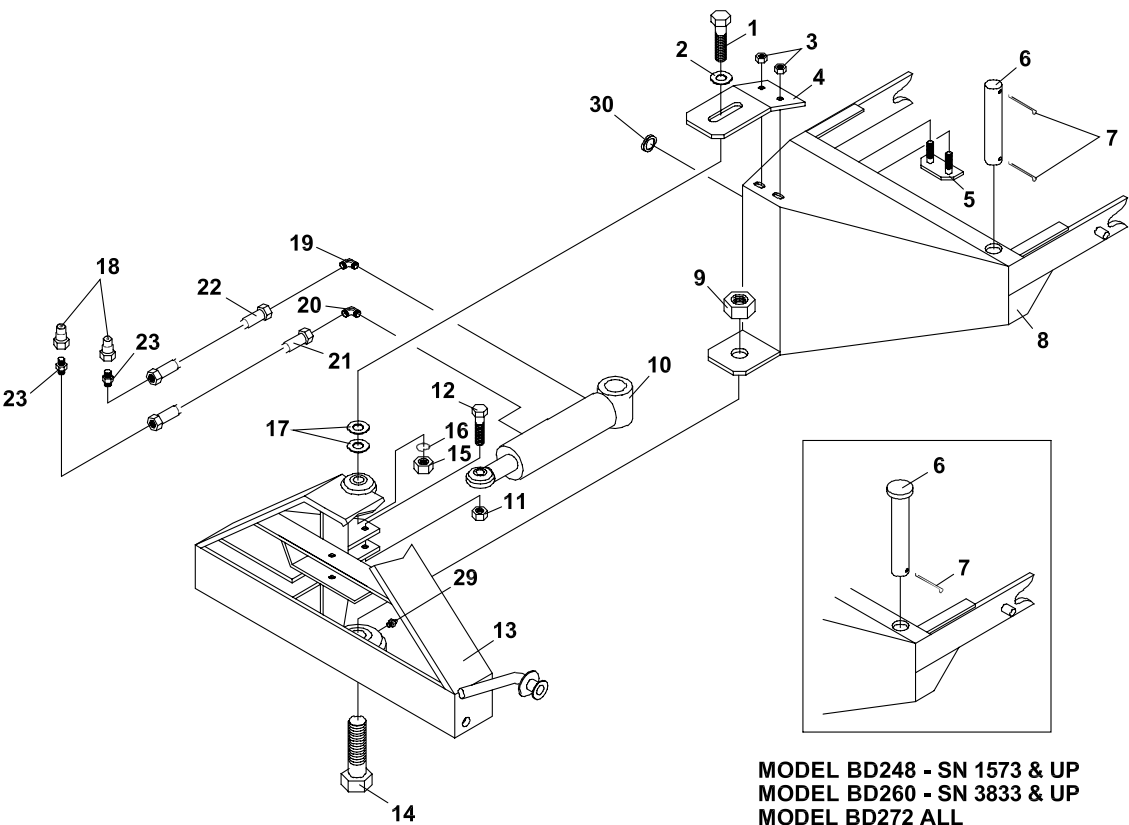
ANGLE BLADE

BLADE PARTS

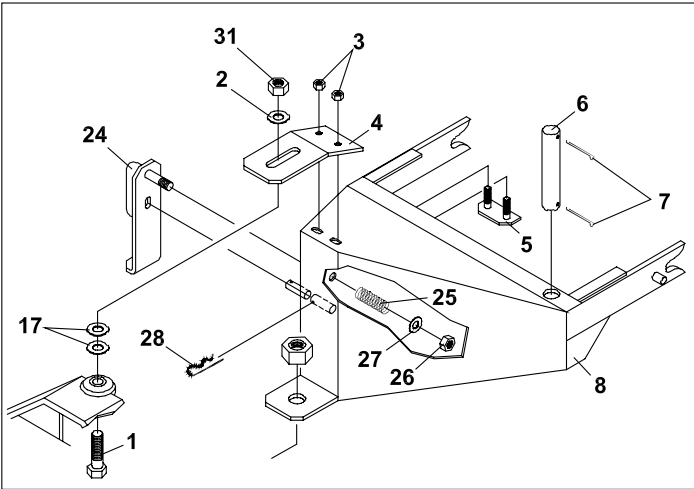
FIGURE 1

ITEM	PART NO.	DESCRIPTION	QTY	ITEM	PART NO.	DESCRIPTION	QTY
1-1	64168-1	COTTER PIN, 5/32 X 1	2	OPTIONS FOR BD260			
1-2	64-008.7	ATTACHING ROD	1	*	78-038	HD CUTTING EDGE 60"	1
1-3	64229-03	LOCKNUT-NYLON 3/8-16	2	*	99-17	BOLT, 3/8-16 X 1	9
1-4	64158-04	EYE BOLT, 3/8-16 X 6	2	*	78-040	SCARIFIER WEAR EDGE	1
1-5	41-012	SPRING	2	*	99-17	BOLT, 3/8-16 X 1	9
1-6	62-122.17	BLADE, 48"	1	*	64025-05	NUT-3/8-16 HEX	9
	62-123.17	BLADE, 60"	1	*	64006-03	LOCKWASHER, 3/8	9
	62-881.17	BLADE, 72"	1	OPTIONS FOR BD272			
1-7	64141-4	NUT-WLF 3/8-16 (48")	11	*	99-17	BOLT, 3/8-16 X 1	10
	64141-4	NUT-WLF 3/8-16 (60")	13	*	99-17	BOLT, 3/8-16 X 1	10
	64141-4	NUT-WLF 3/8-16 (72")	14	*	64025-05	NUT-3/8-16 HEX	10
1-8	99-17	BOLT-3/8-16X1 BTTN (48")	7	*	64006-03	LOCKWASHER, 3/8	10
	99-17	BOLT-3/8-16X1 BTTN (60")	9	* NOT ILLUSTRATED			
	99-17	BOLT-3/8-16X1 BTTN (72")	10				
1-9	78-021.7	BLADE SKID SHOE	2				
1-10	64018-3	BOLT-3/8-16X1CARG (48")	4				
	64018-3	BOLT-3/8-16X1CARG (60")	4				
	64018-3	BOLT-3/8-16X1CARG (72")	4				
1-11	78-004.7	BLADE WEAR BAR 48"	1				
	78-005.7	BLADE WEAR BAR 60"	1				
	78-049.7	BLADE WEAR BAR 72"	1				
1-12 *	4158620	LABEL-STEINER					
OPTIONS FOR BD248							
*	78-037	HD CUTTING EDGE 48"	1				
*	99-17	BOLT, 3/8-16 X 1	7				
*	99-17	BOLT, 3/8-16 X 1	7				
*	64025-05	NUT-3/8-16 HEX	7				
*	64006-03	LOCKWASHER, 3/8	7				

FIGURE 2



MODEL BD248 - SN 1573 & UP
MODEL BD260 - SN 3833 & UP
MODEL BD272 ALL



MODEL BD248 - SN 1535 & UP
MODEL BD260 - SN 3609 & UP
MODEL BD272 ALL

ANGLE BLADE

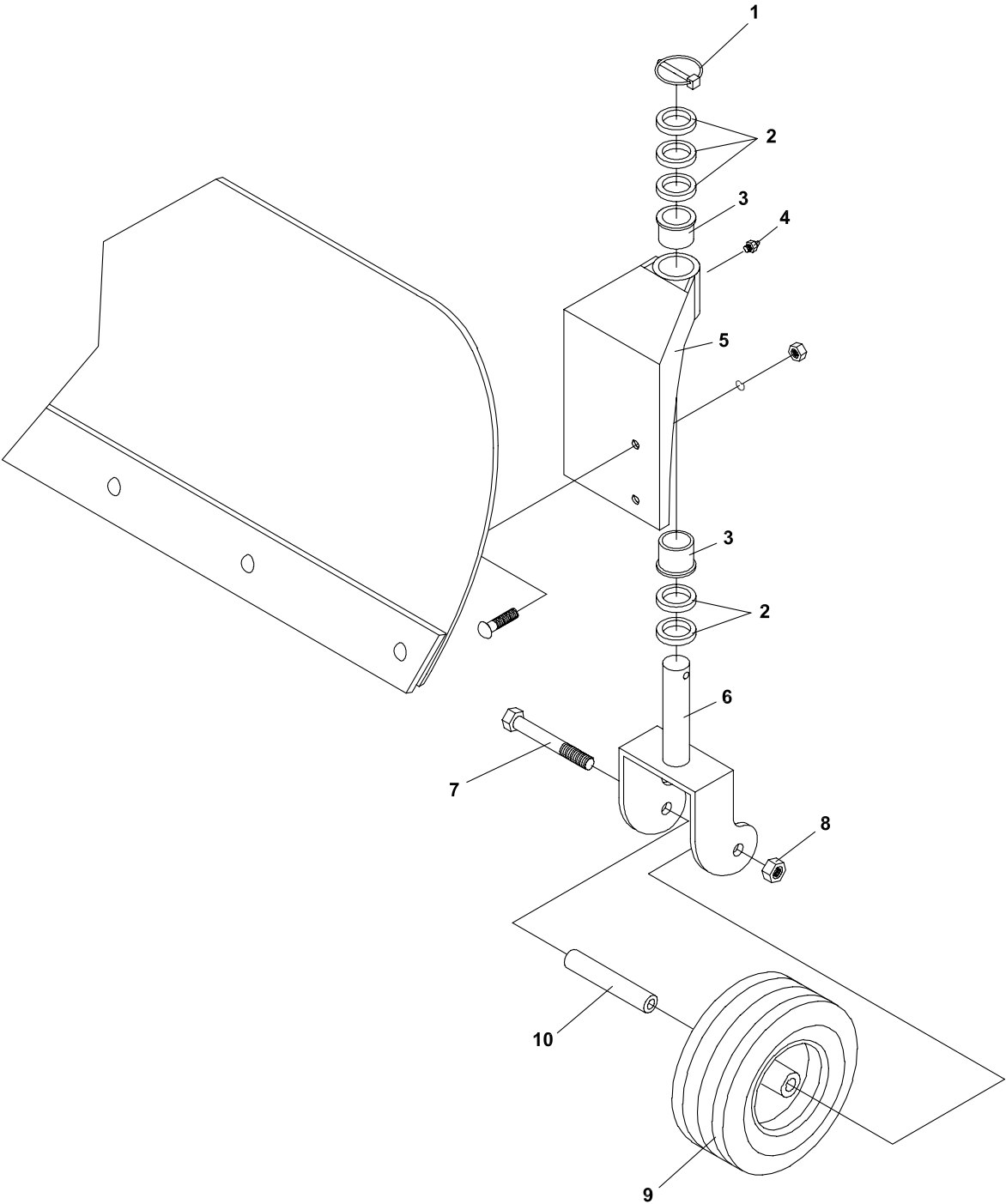
POWER ANGLE PARTS

FIGURE 2

ITEM	PART NO.	DESCRIPTION	QTY	ITEM	PART NO.	DESCRIPTION	QTY
2-1	90-1020	BOLT,5/8-11 X 2-1/2	1	2-13	62-201.7	SUB-FRAME	1
	(BD248, SN 1001 - 1616)			2-14	91-1628	BOLT,1-14 X 3-1/2	1
	90-1020	BOLT,5/8-11 X 2-1/2	1	2-15	64025-21	NUT-HEX 5/8-11	1
	(BD260, SN 1001 - 4448)				(BD248, SN 1001 - 1616)		
	90-1018	BOLT,5/8-11 X 2-1/4	1		64025-21	NUT-HEX 5/8-11	1
	(BD248, SN 1617 -)				(BD260, SN 1001 - 4448)		
	90-1018	BOLT,5/8-11 X 2-1/4	1	2-16	64006-04	LOCKWSHR-HELICAL 5/8	1
	(BD260, SN 4449 -)				(BD248, SN 1001 - 1616)		
	90-1018	BOLT,5/8-11 X 2-1/4	1		64006-04	LOCKWSHR-HELICAL 5/8	1
	(BD272)				(BD260, SN 1001 - 4448)		
2-2	94-10	FLAT WASHER, 5/8	1	2-17	64163-16	WASHER-41/64 X 1, 3/8 X 12	2
2-3	64141-4	NUT-WLF 3/8-16	2	2-18	23-004	MALE QUICK COUPLER	2
2-4	64-061.7	PLATE	1	2-19	25-2103-6-6	FITTING-90 DEG	1
2-5	64-240	TOP ADJUSTING BOLTS	1	2-20	25-3103-6-6	FITTING-45 DEG	1
2-6	03-1640	PIN-CYLINDER	1	2-21	20-020	HOSE-1/4 X 44	1
	(BD248, SN 1001 - 1572)			2-22	20-218	HOSE, 1/4 X 48 100R1 #6	1
	03-1640	CLEVIS PIN, 1" X 5"	1	2-23	25-0103-4-6	FITTING	2
	(BD248, SN 1573 -)			2-24	64-988.7	KICKSTAND	1
	64-062	PIN-CYLINDER	1		(BD248, SN 1535 -)		
	(BD260, SN 1001 - 3832)				64-988.7	KICKSTAND	1
	03-1640	CLEVIS PIN, 1" X 5"	1		(BD260, SN 3609 -)		
	(BD260, SN 3833 -)				64-988.7	KICKSTAND	1
	03-1640	CLEVIS PIN, 1" X 5"	1		(BD272)		
	(BD272)			2-25	41-081	SPRING, COMP	1
2-7	02-CP0612	COTTER PIN, 3/16 X 1-1/2	2		(BD248, SN 1535 -)		
	(BD248, SN 1001 - 1572)				41-081	SPRING, COMP	1
	02-CP0612	COTTER PIN, 3/16 X 1-1/2	1		(BD260, SN 3609 -)		
	(BD248, SN 1573 -)				41-081	SPRING, COMP	1
	02-CP0612	COTTER PIN, 3/16 X 1-1/2	2		(BD272)		
	(BD260, SN 1001 - 3832)			2-26	64229-05	LOCKNUT, 1/2-13 NYLON	1
	02-CP0612	COTTER PIN, 3/16 X 1-1/2	1		(BD248, SN 1535 -)		
	(BD260, SN 3833 -)				64229-05	LOCKNUT, 1/2-13 NYLON	1
	02-CP0612	COTTER PIN, 3/16 X 1-1/2	1		(BD260, SN 3609 -)		
	(BD272)				64229-05	LOCKNUT, 1/2-13 NYLON	1
2-8	62-200.7	ATTACHING FRAME	1		(BD272)		
2-9	64151-9	HEX LOCKNUT	1	2-27	64163-67	WASHER-.516X1X12GA	1
2-10	23-005	CYLINDER	1		(BD248, SN 1535 -)		
	(BD248, SN 1001 - 1168)				64163-67	WASHER-.516X1X12GA	1
	24-043	CYLINDER	1		(BD260, SN 3609 -)		
	(BD248, SN 1169 -)				64163-67	WASHER-.516X1X12GA	1
	23-005	CYLINDER	1		(BD272)		
	(BD260, SN 1001 - 1699)			2-28	02-PP0313	PIN, 3/16 x 1.5/8	1
	24-043	CYLINDER	1		(BD248, SN 1535 -)		
	(BD260, SN 1700 -)				02-PP0313	PIN, 3/16 x 1.5/8	1
	24-043	CYLINDER	1		(BD260, SN 3609 -)		
	(BD272)				02-PP0313	PIN, 3/16 x 1.5/8	1
	21-0A006763	SEAL KIT	1		(BD272)		
2-11	64229-03	LOCKNUT-NYLON 3/8-16	1	2-29	85010N	S/B GREASE FITTING	1
	(BD248, SN 1001 - 1168)			2-30	05-039	GROMMET, 1-5/16 ID X 2 OD	1
	64141-13	NUT WLF 1/2-13	1	2-31	F6010	NUT, FLANGED	1
	(BD248, SN 1169 -)				(BD248, SN 1617 -)		
	64229-03	LOCKNUT-NYLON 3/8-16	1		F6010	NUT, FLANGED	1
	(BD260, SN 1001 - 1699)				(BD260, SN 4449 -)		
	64141-13	NUT WLF 1/2-13	1		F6010	NUT, FLANGED	1
	(BD260, SN 1700 -)				(BD272)		
2-12	64123-67	BLT-HEX 3/8-16X2	1	*	4116761	LABEL-MADE IN USA	1
	(BD248, SN 1001 - 1168)						
	64123-24	BLT-HEX 1/2-13X2	1				
	(BD248, SN 1169 -)						
	64123-67	BLT-HEX 3/8-16X2	1				
	(BD260, SN 1001 - 1699)						
	64123-24	BLT-HEX 1/2-13X2	1				
	(BD260, SN 1700 -)						
	64123-24	BLT-HEX 1/2-13X2	1				
	(BD272)						

* NOT ILLUSTRATED

FIGURE 3



ANGLE
BLADE

OPTIONAL GAUGE WHEEL

FIGURE 3

ITEM	PART NO.	DESCRIPTION	QTY	ITEM	PART NO.	DESCRIPTION	QTY
4-1	03-015	CLIP	2				
4-2	48053-2A	SPACER	10				
4-3	85-B34	BUSHING	4				
4-4	85010N	S/B GREASE FITTING	2				
4-5	6101066.7	MOUNT, CASTER RH	1				
	6101067.7	MOUNT, CASTER LH	1				
4-6	6101065.7	YOKE, CASTER	2				
4-7	90-0836	BOLT, 1/2 UNC X 4.1/2	2				
4-8	64141-13	NUT WLF 1/2-13	2				
4-9	53-181	WHEEL, 6.25 X 3.00	2				
4-10	6101062	AXLE, CASTER WHEEL	2				

SCHILLER GROUNDS CARE, INC.
ONE BOB-CAT LANE
P.O. BOX 469
JOHNSON CREEK, WI 53038
920-699-2000
www.cgcequip.com

