

Installation Instructions



CP1000 Small Seeds Option

Used with:

- CP1000



When you see this symbol, the subsequent instructions and warnings are serious - follow without exception. Your life and the lives of others depend on it!

General Information

These instructions explain how to install the small-seeds attachment. The small-seeds box mounts on the main seed box and distributes very fine seeds accurately and evenly.

These instructions apply to:

133-109A	CP1000 157.9MM SGS DRP TB M
133-110A	CP1000 157.9MM SGS W/PW HOS
133-111A	CP1000 7 1/2 SGS DROP TB MN
133-112A	CP1000 7 1/2 SGS W/PW HOSE

Definitions

Right-hand and left-hand as used in this manual are determined by facing the direction the machine will travel while in use unless otherwise stated.

Manual Update

Refer to the drill operator's manual for detailed information on safely operating, adjusting, troubleshooting and maintaining the small-seeds attachment. Refer to the parts manual for part identification.

- CP1000 Drill and Hitch Operator's Manual 148-358M
- CP1000 Drill and Hitch Parts Manual. 148-358P

Before You Start

On page 3 are detailed listings of parts included in the option packages. Use these lists to inventory parts received.

Assembly Instructions

Box Assembly

Refer to Figure 1

1. Disassemble handles (1) and lights (2) from main drill box. Save handles, lights and hardware for later reassembly.
2. Assemble left-hand mount (3) onto main drill box where handles were mounted. Use 1/2-by-1 1/4-inch bolts and lock nuts. Bolt bottom of mount (4) to walkboard using 1/2-by-1-inch bolt, flat washer, lock washer and nut.
3. Assemble right-hand mount (5) onto main drill box where handles were mounted. Use 1/2-by-1 1/4-inch bolts and lock nuts. Bolt bottom of mount (6) to walkboard using 1/2-by-1-inch bolt, flat washer, lock washer and nut.
4. Assemble small-seeds box (7) onto left- and right-hand mounts through holes shown using 3/8-inch flange bolts, lock washers and nuts.
5. Refer to *Drive Assembly*, page 2, and assemble drive before proceeding with box assembly.
6. When drive and drive chain are installed, use hardware removed in step one to bolt chain guard (8), handle and light onto left-hand mount.
7. Use hardware removed in step one to bolt handle mount (9), light and handle onto right-hand mount.

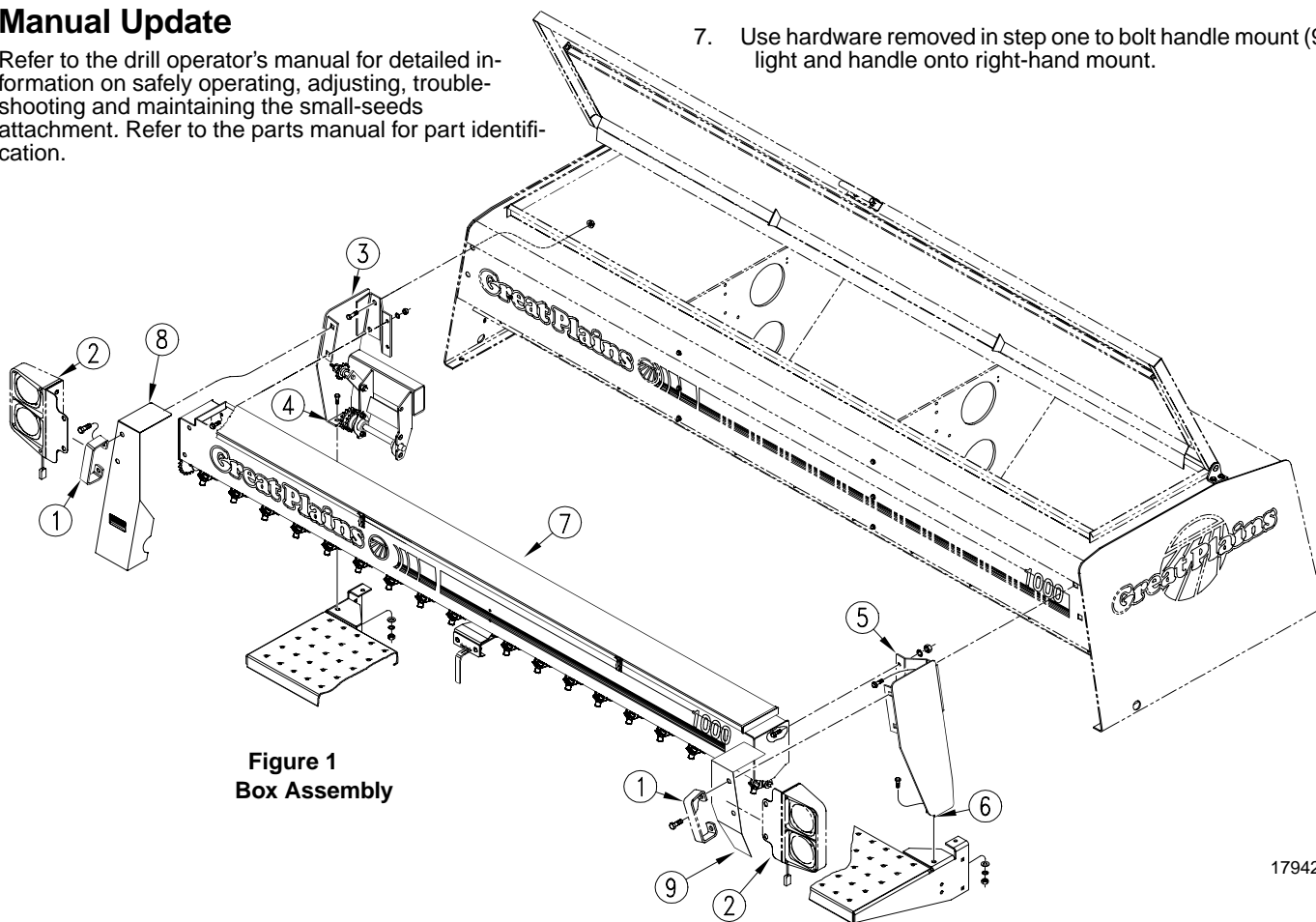


Figure 1
Box Assembly

17942

Assembly

Drive Assembly

Refer to Figure 2

1. At front of drill, remove chain guard (1) to access drive.
2. Assemble 17-tooth sprockets (2) onto bearing plate (3). Use 5/8-inch bolts (4) to assemble spacers (5) and sprockets onto bearing plate. Secure bolts with flat washers, lock washers and nuts. Leave nut on front sprocket loose for later adjustment.
3. Assemble 12-tooth, hex-bore sprocket (6) onto long drive shaft (7) so that sprocket hub is toward drill. Secure sprocket onto shaft with set screw.
4. Route drive chain (8) over sprockets as shown. Route chain under main drill seed box and back to small-grass sprocket (9). Connect chain.

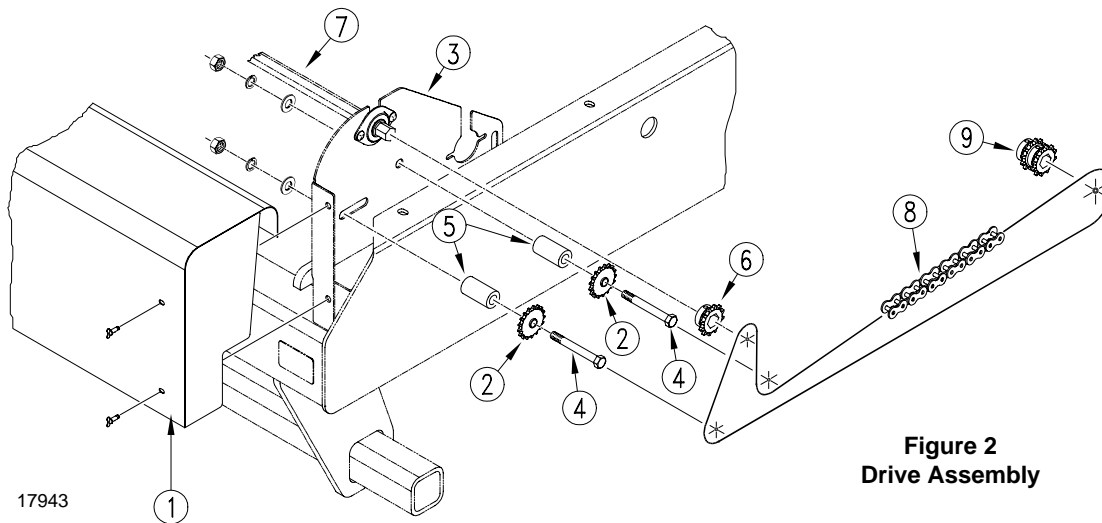


Figure 2
Drive Assembly

5. Side front idler sprocket ahead until chain has 1-inch slack in its lower span. Tighten bolt on idler sprocket.
6. Refer to *Box Assembly*, page 1, step 6, and complete box assembly.

Delivery Hose Assembly

Refer to Figure 3

Drop Tube Mount

1. Insert the seed tube (1) into the hole on the top of the opener. Secure in place with two number 10-16 x 1/2" screws (2).
2. Slide a hose clamp (4) over the hose (3). Slide the end of the hose over the seed tube (1) and secure it in place with the hose clamp (4).
3. Slide a hose clamp (4) over the other end of the hose (3) and slide the hose (3) over the seed outlet which corresponds with the appropriate opener. Secure hose in place with the hose clamp (4). Repeat the above steps to install the rest of the seed tubes and hoses.

Side Delivery Tube

4. Set the side delivery tube (5) down over the top of the opener directly in front of the fertilizer tube. Line up the holes with the holes in the opener and insert the 3/8" x 3 5/8" bolt (6) and secure bolt with a 3/8" lock nut flange (7).
5. Slide a hose clamp (9) over the hose (8). Slide the end of the hose (8) over the seed tube and secure it in place with the hose clamp (9).
6. Slide a hose clamp (9) over the other end of the hose (8) and slide the hose (9) over the seed outlet which corresponds with the appropriate opener. Secure hose (8) in place with the hose clamp (9). Repeat the above steps to install the rest of the seed tubes and hoses.

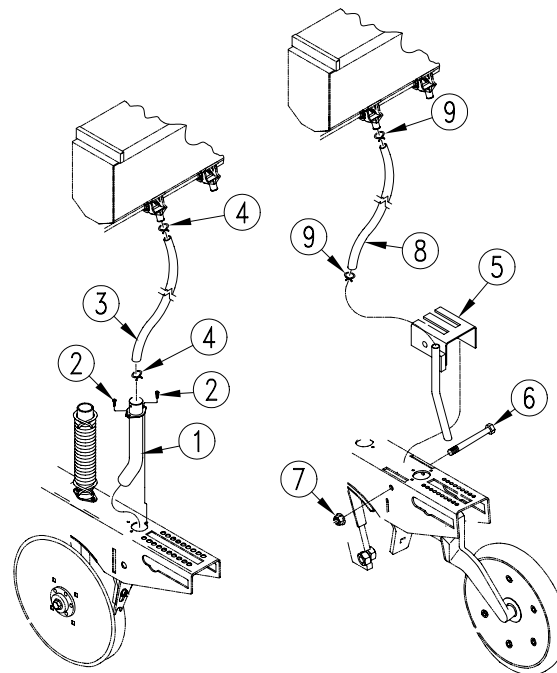


Figure 3
Delivery Hose Assembly

17944

Listing of Parts**133-109A CP1000 157.9mm, Drop Tube Mount***Your Kit Includes:*

Qty.	Part No.	Part Description
1	123-492D	HANDLE MOUNT RH CHAIN GUAR
19	123-939H	SMALL SEEDS TUBE WELDMENT
1	133-066H	1300 SML SDS BOX MOUNT RH
1	133-070K	1300 SML SDS MNT LH ASY
1	133-113M	MANUAL CP1000 SML GRS SEED
1	136-036D	CHAIN RL #40 70 PITCHES
1	136-154D	CHAIN RL #40 214 PITCHES
1	148-328K	1000 SMALL SEED BOX ASSY-6
1	148-622D	1000 SMALL SEEDS CHAIN GUA
2	148-624D	1000 SMALL SEEDS IDLER SPA
38	800-321C	HOSE CLAMP NO.12 3/4 ID
38	801-002C	SCREW HEX SLT10-16X1/2P.TH
4	802-034C	HHCS 1/2-13X1 1/4 GR5
2	802-151C	HHCS 5/8-11X4 1/4 GR5
2	802-258C	HHCS 1/2-13X1 GR5
4	802-388C	HFS 3/8-16X1 GR5
4	803-014C	NUT HEX 3/8-16 PLT
2	803-020C	NUT HEX 1/2-13 PLT
2	803-021C	NUT HEX 5/8-11 PLT
4	803-169C	NUT HEX FLG. LOCK 1/2-13 P
4	804-013C	WASHER LOCK SPRING 3/8 PLT
2	804-015C	WASHER LOCK SPRING 1/2 PLT
2	804-016C	WASHER FLAT 1/2 SAE PLT
2	804-019C	WASHER FLAT 5/8 USS PLT
2	804-022C	WASHER LOCK SPRING 5/8 PLT
2	808-046C	SPROCKET 40A17 IDLER
1	808-143C	SPKT 40B12 7/8 HEX BORE W/
19	816-358C	SGS HOSE 122 RIBS
1	818-518C	DECAL MOVING CHAIN DANGER

133-110A CP1000 157.9mm, Press Wheel Hose*Your Kit Includes:*

Qty.	Part No.	Part Description
1	123-492D	HANDLE MOUNT RH CHAIN GUAR
1	133-066H	1300 SML SDS BOX MOUNT RH
1	133-070K	1300 SML SDS MNT LH ASY
1	133-113M	MANUAL CP1000 SML GRS SEED
19	133-128H	SGS SIDE DELIVERY TUBE
1	136-036D	CHAIN RL #40 70 PITCHES
1	136-154D	CHAIN RL #40 214 PITCHES
1	148-328K	1000 SMALL SEED BOX ASSY-6
1	148-622D	1000 SMALL SEEDS CHAIN GUA
2	148-624D	1000 SMALL SEEDS IDLER SPA
38	800-321C	HOSE CLAMP NO.12 3/4 ID
4	802-034C	HHCS 1/2-13X1 1/4 GR5
2	802-151C	HHCS 5/8-11X4 1/4 GR5
2	802-258C	HHCS 1/2-13X1 GR5
4	802-388C	HFS 3/8-16X1 GR5
19	802-427C	HFS 3/8-16X3 5/8 SPTHD
4	803-014C	NUT HEX 3/8-16 PLT
2	803-020C	NUT HEX 1/2-13 PLT
2	803-021C	NUT HEX 5/8-11 PLT
4	803-169C	NUT HEX FLG. LOCK 1/2-13 P
19	803-209C	NUT FLANGE LOCK 3/8-16 PLT
4	804-013C	WASHER LOCK SPRING 3/8 PLT
2	804-015C	WASHER LOCK SPRING 1/2 PLT
2	804-016C	WASHER FLAT 1/2 SAE PLT
2	804-019C	WASHER FLAT 5/8 USS PLT
2	804-022C	WASHER LOCK SPRING 5/8 PLT
2	808-046C	SPROCKET 40A17 IDLER
1	808-143C	SPKT 40B12 7/8 HEX BORE W/
19	816-358C	SGS HOSE 122 RIBS
1	818-518C	DECAL MOVING CHAIN DANGE

Listing of Parts

133-111A CP1000 7 1/2, Drop Tube Mount

Your Kit Includes:

Qty.	Part No.	Part Description
1	123-492D	HANDLE MOUNT RH CHAIN GUAR
16	123-939H	SMALL SEEDS TUBE WELDMENT
1	133-066H	1300 SML SDS BOX MOUNT RH
1	133-070K	1300 SML SDS MNT LH ASY
1	133-113M	MANUAL CP1000 SML GRS SEED
1	136-036D	CHAIN RL #40 70 PITCHES
1	136-154D	CHAIN RL #40 214 PITCHES
1	148-344K	1000 SMALL SEED BOX ASSY-7
1	148-622D	1000 SMALL SEEDS CHAIN GUA
2	148-624D	1000 SMALL SEEDS IDLER SPA
32	800-321C	HOSE CLAMP NO.12 3/4 ID
32	801-002C	SCREW HEX SLT10-16X1/2P.TH
4	802-034C	HHCS 1/2-13X1 1/4 GR5
2	802-151C	HHCS 5/8-11X4 1/4 GR5
2	802-258C	HHCS 1/2-13X1 GR5
4	802-388C	HFS 3/8-16X1 GR5
4	803-014C	NUT HEX 3/8-16 PLT
2	803-020C	NUT HEX 1/2-13 PLT
2	803-021C	NUT HEX 5/8-11 PLT
4	803-169C	NUT HEX FLG. LOCK 1/2-13 P
4	804-013C	WASHER LOCK SPRING 3/8 PLT
2	804-015C	WASHER LOCK SPRING 1/2 PLT
2	804-016C	WASHER FLAT 1/2 SAE PLT
2	804-019C	WASHER FLAT 5/8 USS PLT
2	804-022C	WASHER LOCK SPRING 5/8 PLT
2	808-046C	SPROCKET 40A17 IDLER
1	808-143C	SPKT 40B12 7/8 HEX BORE W/
16	816-358C	SGS HOSE 122 RIBS
1	818-518C	DECAL MOVING CHAIN DANGER

133-112A CP1000 7 1/2, Press Wheel Hose

Your Kit Includes:

Qty.	Part No.	Part Description
1	123-492D	HANDLE MOUNT RH CHAIN GUAR
1	133-066H	1300 SML SDS BOX MOUNT RH
1	133-070K	1300 SML SDS MNT LH ASY
1	133-113M	MANUAL CP1000 SML GRS SEED
16	133-128H	SGS SIDE DELIVERY TUBE
1	136-036D	CHAIN RL #40 70 PITCHES
1	136-154D	CHAIN RL #40 214 PITCHES
1	148-344K	1000 SMALL SEED BOX ASSY-7
1	148-622D	1000 SMALL SEEDS CHAIN GUA
2	148-624D	1000 SMALL SEEDS IDLER SPA
32	800-321C	HOSE CLAMP NO.12 3/4 ID
4	802-034C	HHCS 1/2-13X1 1/4 GR5
2	802-151C	HHCS 5/8-11X4 1/4 GR5
2	802-258C	HHCS 1/2-13X1 GR5
4	802-388C	HFS 3/8-16X1 GR55
16	802-427C	HFS 3/8-16X3 5/8 SPTHD
4	803-014C	NUT HEX 3/8-16 PLT
2	803-020C	NUT HEX 1/2-13 PLT
2	803-021C	NUT HEX 5/8-11 PLT
4	803-169C	NUT HEX FLG. LOCK 1/2-13 P
16	803-209C	NUT FLANGE LOCK 3/8-16 PLT
4	804-013C	WASHER LOCK SPRING 3/8 PLT
2	804-015C	WASHER LOCK SPRING 1/2 PLT
2	804-016C	WASHER FLAT 1/2 SAE PLT
2	804-019C	WASHER FLAT 5/8 USS PLT
2	804-022C	WASHER LOCK SPRING 5/8 PLT
2	808-046C	SPROCKET 40A17 IDLER
1	808-143C	SPKT 40B12 7/8 HEX BORE W/
16	816-358C	SGS HOSE 122 RIBS
1	818-518C	DECAL MOVING CHAIN DANGE