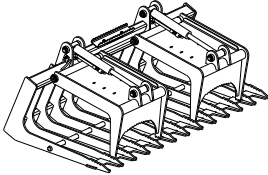
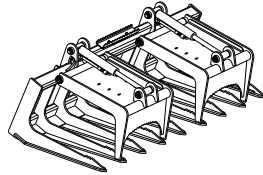


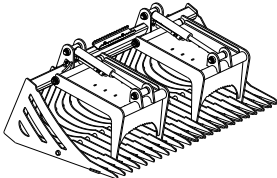
2 Cylinder Grapples



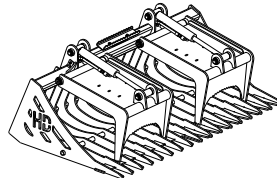
SGV



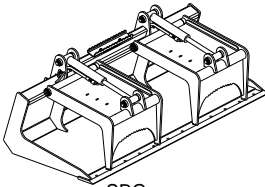
STG



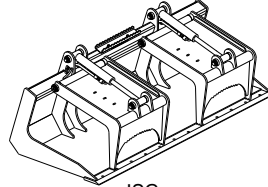
SRGV



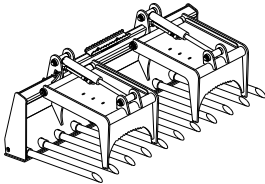
HSRGV



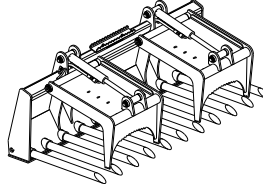
SBG



ISG



TBG



ITG

Model Number _____.

Serial Number _____.

Serial Number 80400 - 120591 **AND**
120609, 120630, 120735, 120736, 120737, 120750, 120751,
120819, 120820, 120821, 120822, 120823, 120891, 120892,
121074, 121075, 121076, 121077, 121190

Manufacture Date 03/13/14 - 02/17/17

Phone: 320-393-7080

1/25/12
Revised 3/13/14

2 CYL

Features of Virnig Mfg. Inc. 2 Cylinder Grapples include:

- 2" bore x 8 3/8" stroke cylinders.
- Optional cylinder guards.
- Jaw openings greater than 37" for all models.
- Greaseable pins with replaceable bushings at all pivot points.
- Skeleton style buckets have open back and bottom that allows dirt to fall through.
- Scrap style buckets have optional 5/8" x 8" reversible bolt on edge.
- Tooth style buckets have replaceable teeth.
- Constructed with heavy plate for strength and durability.

Initial Use

- See following pages for suggested hose routing.
- Check that quick-tach on grapple fits onto skid loader properly. Pins must engage through 3/8" plates at bottom of quick-tach.
- With bottom of attachment touching ground/floor, open jaw and slowly roll back bucket. Make sure there is no interference between attachment and loader with grapple jaws open and attachment fully rolled back.
- Make sure hoses do not pinch during roll back.
- Slowly roll bucket fully forward. Check that hoses are long enough so they do not stretch or bind.
- Do not connect this attachment to high flow couplers.
- Cycle jaw open/close. Check for oil leaks per instructions in "Maintenance" section.
- Read and understand all warning information in this manual before operating this attachment.
- Never exceed the maximum attachment operating pressure of 3500 psi.

Operation

- Always follow safety information.
- Keep bystanders back 50 feet.
- Never attempt to lift more than the operating capacity (attachment weight and load) of skid loader.
- Always follow all safety and operating instructions of skid loader.
- Always relieve pressure before disconnecting hydraulic hoses.
- Never hit or pound couplers.
- Never ram piles with jaw closed.
- Never hook a chain on jaws or bucket.
- Never use grapple jaws for hooking and/or pulling. Material should be clamped securely.
- Check for debris in quick-tach area before each hook-up.



Grapple shown Center Plumb works for Case, John Deere, New Holland, Mustang, Takeuchi, and Gehl skid loaders.

Hoses need to be secured so they do not get damaged during operation. Hoses can be routed as shown in the picture above. Hoses can also be tied or bungeed to the skid loader cross member (close to the lower pivot) to hold them from getting pinched or stretched.

Grapple can also be Left Side Plumb. Grapple can be converted to Left Side Plumb by following instructions located in this manual. Please see picture on the next page showing Left Side Plumb. Hoses should be run through the bracket on the skid loader arm, as shown, or the hoses can be tied or bungeed to the skid loader arm.



Into Auxillary Couplers
(NOT High Flow)

Through Loop on
Skid Loader Arm

Hoses From Attachment
(Plumbed Out Left Side)

Grapple shown Left Side Plumb, works for Cat, Bobcat, Kubota, Terex and ASV.

If there is too much slack hose, the amount of slack can be adjusted using the clamp on the attachment near the mount plate.



If needed, additional small elbows (Part No. 1012PP) are zip tied to the attachment and can be installed between hoses and couplers, as shown above, to improve hose routing at hydraulic coupler interface on loader. The additional elbows will not be required for most brands of skid loaders.

Maintenance

*Every 10 hours of operation

- Grease hinge pins and cylinder pins (8 grease fittings total).
- Inspect cylinders, hydraulic fittings, and hoses for leaks and damage. Replace as needed. Make sure skid loader is shut off and hydraulic pressure is relieved before checking for leaks. Never use hands to check for high pressure hydraulic leaks.

*Every 50 hours of operation

- Check that all cylinder and hinge pins are secure.
- Check for loose, worn, or missing parts. Repair or replace as needed.
- If equipped, check bolt on edge wear. Reverse or replace edge as needed.
- On tooth buckets, check that teeth are secure.
- Contact your dealer for replacement parts.

Warning Labels on Grapple Attachment



This label is located near hinge area on grapple.

Always keep hands clear of grapple when skid loader hydraulic system is operational.



This label is located on the front of each grapple jaw.

Always stay clear of grapple jaws. Never inspect grapple with skid loader running or with jaws open.



This label is located near the quick-tach on the grapple bucket. This label has several important instructions that must be followed for safe operation of this attachment.

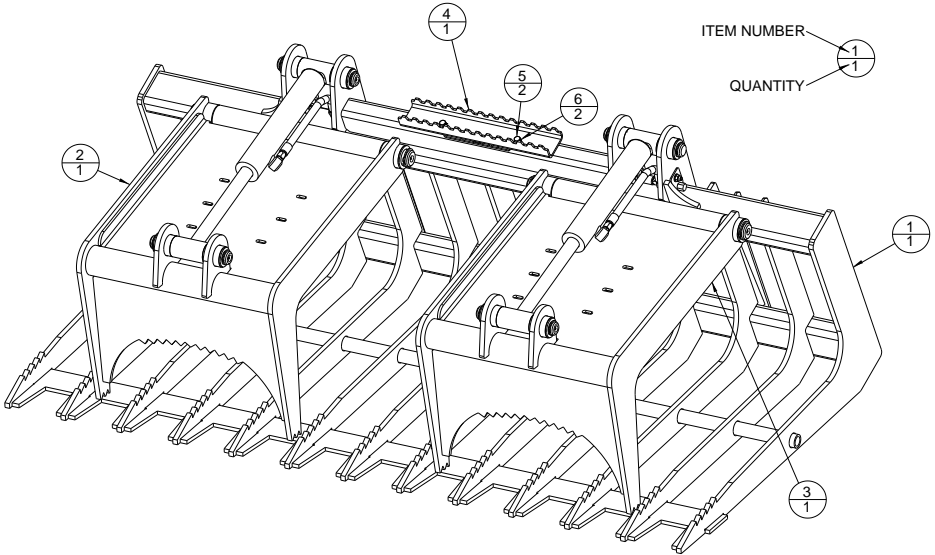
2 Cylinder Grapple Parts List

ITEM	PART NO.	QTY	DESCRIPTION	
1	-----	1	BUCKET WELDMENT	
2	5476VW	1	GRAPPLE JAW WELDMENT RH	
3	5475VW	1	GRAPPLE JAW WELDMENT LH	
4	9418VP	1	GRAPPLE BOLT ON CENTER STEP	
5	1116PP	2	3/8"-16 X 3/4" LG HHCS	
6	1075PP	2	3/8" LOCK WASHER	
7	5488VP	2	HINGE PIN STANDARD	
8	2137VP	4	CYLINDER PIN	
9	1112PP	8	1 9/16" DIA X 2" LG BUSHING	
10	1097PP	4	1 9/16" X 10GA MACH BUSHING	
11	1098PP	4	1 9/16" EXTERNAL SNAP RING	
12	1111PP	8	1 1/4" DIA X 1 9/16" LG BUSH	
13	1094PP	8	1 1/4" X 10GA MACH BUSHING	
14	1095PP	8	1 1/4" EXTERNAL SNAP RING	
15	1034PP	8	1/4"-28 STRAIGHT GREASE ZERK	
16	1150PP	2	CYL 2" BORE X 8 3/8" STROKE	
A	1101PP	2	HYD HOSE 1/4" X 14 1/2" LG 6FJX TO 6FJX	
	1103PP		HYD HOSE 1/4" X 15 1/8" LG 6FJX TO 6FJX	
A	1102PP	2	HYD HOSE 1/4" X 18" LG 6FJX TO 6FJX	
	1104PP		HYD HOSE 1/4" X 18 3/4" LG 6FJX TO 6FJX	
	1105PP	4	HYD HOSE 1/4" X 17" LG 6FJX TO 6FJX	
	1013PP	4	TEE THREE WAY 6MJ	
	1108PP	2	TEE BULKHEAD THREE WAY 6MJ	
	1109PP	4	CAP 6 JIC	
	9545VP	2	HOSE RETAINER CLIP	
	7850PP	2	3/8"-16 X 1 1/4" LG HHCS	
	6140PP	2	3/8"-16 TOP LOCK FLANGE NUT	
	1067PP	1	HOSE CLAMP FOR 1/4" HOSES	
	1117PP	1	5/16"-18 X 1 1/2" LG HHCS	
B	1131PP	1	3/32" DIA RESTRICTOR FITTING IN LINE 6 JIC	
B	1127PP	2	HYD HOSE 1/4" X 72" LG 6FJX TO 6FJX	
	1126PP		HYD HOSE 1/4" X 80" LG 6FJX TO 6FJX	
	1128PP		HYD HOSE 1/4" X 88" LG 6FJX TO 6FJX	
	1142PP		HYD HOSE 1/4" X 96" LG 6FJX TO 6FJX	
	1143PP		HYD HOSE 1/4" X 102" LG 6FJX TO 6FJX	
B	30	9333PP	1	COUPLER FEMALE STD 90 6MJ
B	31	9334PP	1	COUPLER MALE STD 90 6MJ

A - 1101PP and 1102PP used with SGV, STG, SRGV, HSRGV, SBG, and ISG models.
1103PP and 1104PP used with TBG and ITG models.

B - Item not shown.

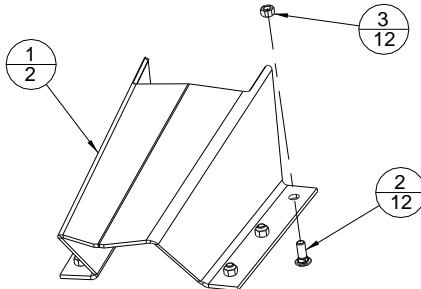
Main Component Assembly



SGV72 Shown

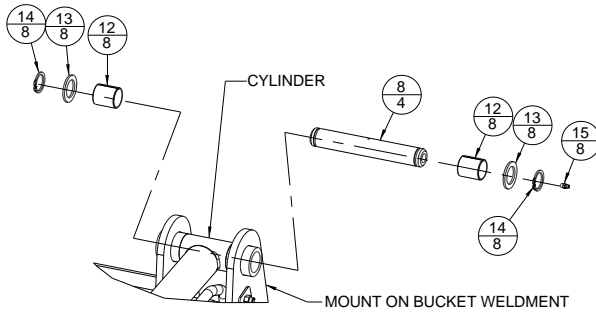
Optional Cylinder Guard Assembly

(Used on all models, Item CYL-GRD)

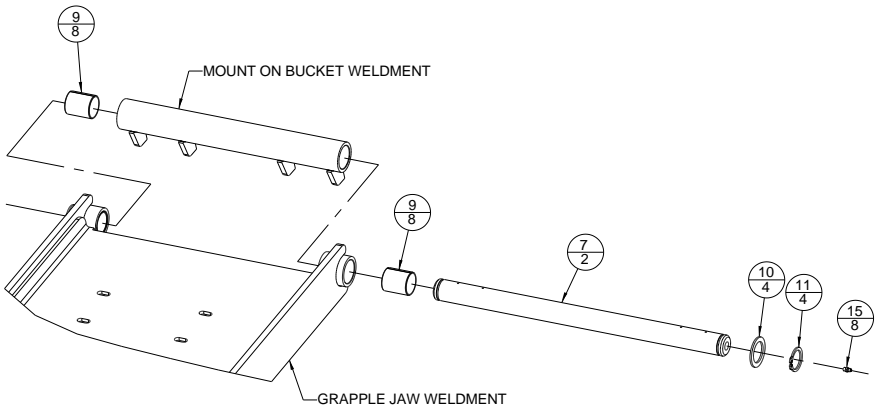


ITEM	PART NO.	QTY	DESCRIPTION
1	2318VP	2	CYLINDER GUARD
2	1089PP	12	3/8"-16 X 1" LG CARRIAGE BOLT
3	6140PP	12	3/8"-16 TOP LOCK FLANGE NUT

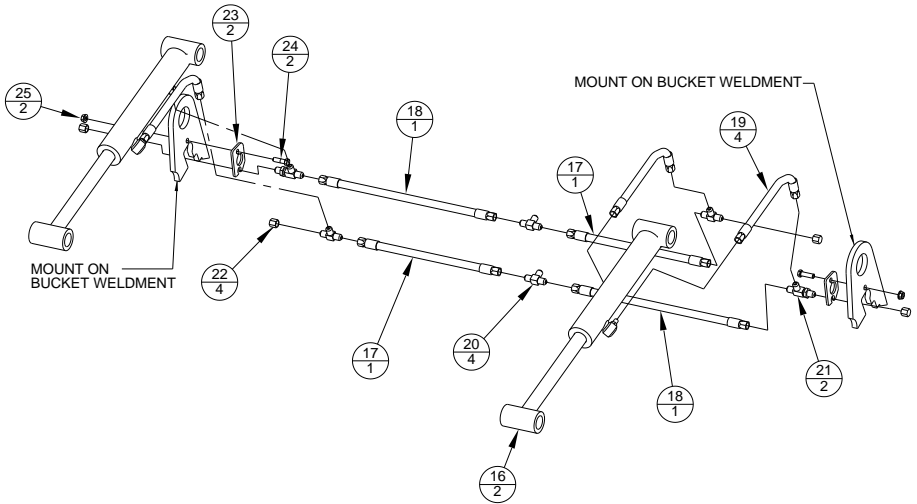
Cylinder Pin Installation



Hinge Pin Installation



Hydraulic Routing and Installation



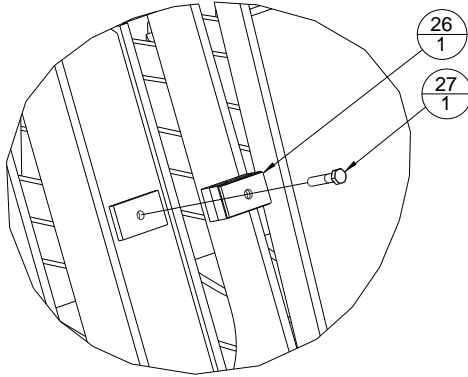
Note:

- Both right side cylinder ports must be plumbed together.
- Both left side cylinder ports must be plumbed together.
- Restrictor fitting (Item #28), plumbed to rod ends of cylinders.

Optional Plumbing Instructions

Grapples are shipped plumbed complete with restrictor fitting, lead hoses and couplers (Items #28, 29, 30 and 31) installed, either center or side plumbed. If the desired plumbing is different from the initial setup, converting the grapple is simple. Remove the restrictor, lead hoses and couplers from the grapple. Remove the caps (Item #22) from the desired location and reinstall caps in the location where the lead hoses were removed. Reinstall the restrictor fitting, lead hoses and couplers in the new location, making sure the restrictor fitting is connected to the rod ends of the cylinders.

Clamp Installation



Optional Bolt on Edge

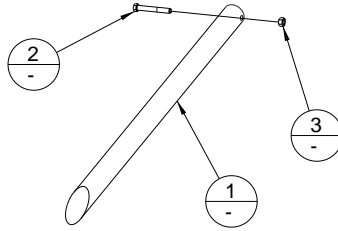
(Used on SBG and ISG models)

MODEL WIDTH	BOLT ON EDGE	HARDWARE QTY*
60	BEV60	10
66	BEV66	11
72	BEV72	12
78	BEV78	13
84	BEV84	14
90	BEV90	15

*5/8"-11 X 2" LG PLOW BOLT (1036PP) with
5/8"-11 TOP LOCK NUT (1008PP).

Tooth Assembly

(Used on TBG and ITG models)



TBG Replacement Tooth

ITEM	PART NO.	DESCRIPTION	TBG260	TBG266	TBG272	TBG278
1	1401VP	2" TBG TOOTH	9	10	11	12
2	1088PP	7/16"-14 X 3 1/4" LG HHCS				
3	1005PP	7/16"-14 REVERSE LOCK NUT				

ITG Replacement Tooth

ITEM	PART NO.	DESCRIPTION	ITG72	ITG78	ITG84	ITG90
1	1645VP	2 1/4" ITG TOOTH	11	12	13	13
2	1077PP	1/2"-13 X 3 1/2" LG HHCS				
3	1003PP	1/2"-13 REVERSE LOCK NUT				