INSTALLATION MANUAL
SVL REAR VIEW CAMERA KIT (77700-07933)
For KUBOTA SVL POWER MACHINES

CALIFORNIA PROPOSITION 65

⚠ **WARNING:**

Cancer and reproductive harm - www.P65Warnings.ca.gov

Note:

This kit is for the following machines.

- SVL65-2C Models
- SVL75-2C Models with SN ≥ 25743
- SVL75-2C Models SN ≤ 25743 with S6628A Replacement Cab
- SVL95-2sC Models
- Closed Cab Models Only

BEFORE INSTALLING THE CAMERA KIT

- Read all instructions and safety instructions in this manual.
- Refer to your machine's operator's manual and safety instructions on your machine's safety decals.
- Wear appropriate personal protective equipment (PPE) when performing work.
- Disconnect negative (-) terminal on battery before performing work.
- Hang a "**DO NOT OPERATE**" tag in operator station.

⚠ WARNING/CAUTION

To avoid personal injury and shock:

- Shut off machine and disconnect negative (-) terminal before working on the electrical circuit.
- Do not short circuit the battery, starter motor or electrical circuits.

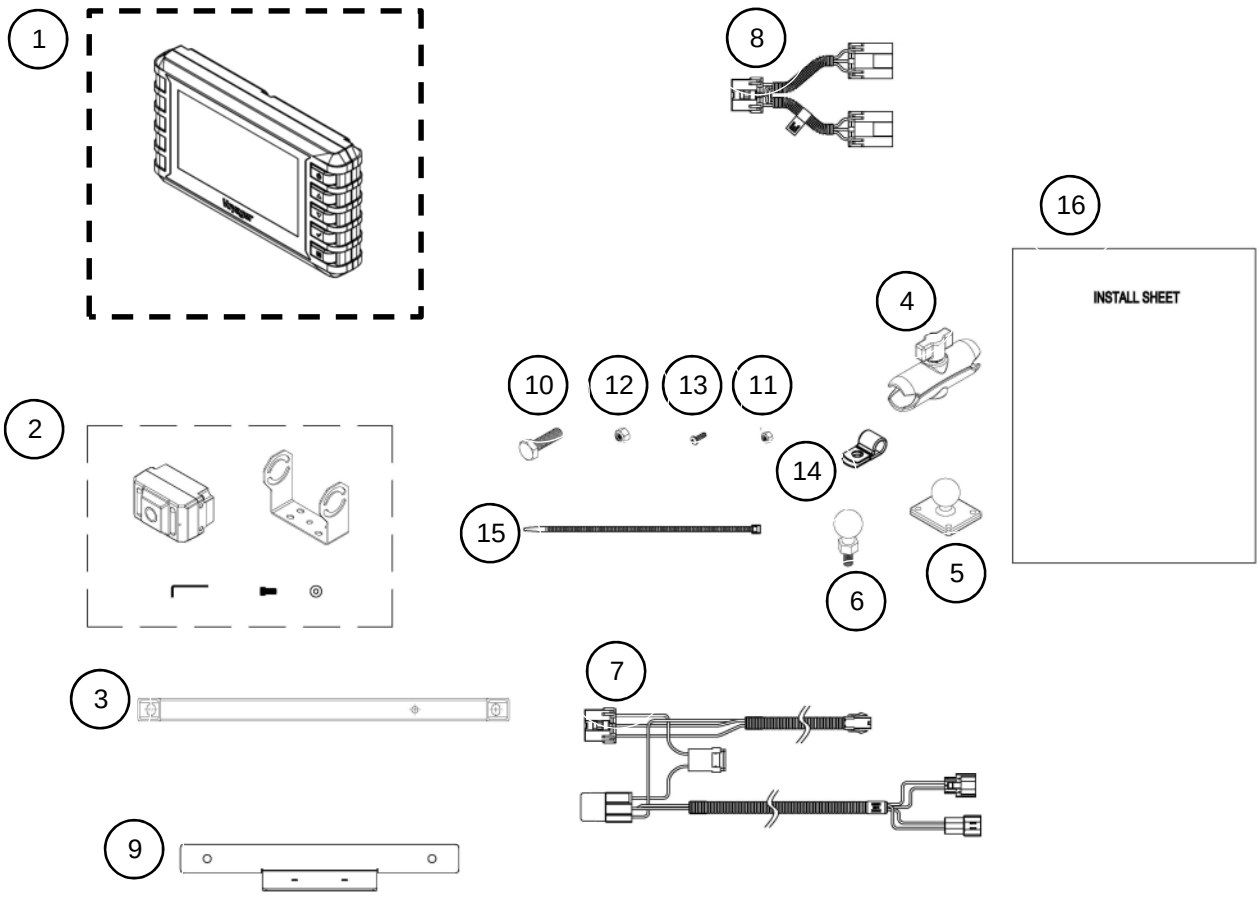
Estimated assembly time: 1 Hour

- CHECKING PARTS

[For SVL Rear View Camera Kit]

NOTE:

- Check the contents as shown in the parts list



■ PARTS LIST

Ref. No.	Part No.	Description	Q'TY	REMARKS
1	77700-08976	Monitor, 4.3 in	1	
2	77700-06202	Camera, Color CMOS Wide View	1	
3	77700-07934	Tube, Monitor Mount	1	
4	N/A	RAM 4" Double Mount	1	NSS
5	N/A	RAM 2 x 1.7 Ball Mount	1	NSS
6	N/A	RAM 1" Ball Mount 5/16-24	1	NSS
7	N/A	SVL Power Harness	1	NSS
8	N/A	SVL Y Adapter	1	NSS
9	N/A	Camera Mounting Bracket	1	NSS
10	N/A	Bolt, ¼-20 x ½ HHCS	2	NSS
11	N/A	Nut, ¼-20 Nylock	2	NSS
12	N/A	Nut, 5/16-24 Nylock	1	NSS
13	N/A	Screw, M4 – 0.7 x 10	4	NSS
14	N/A	Clamp, Rubber ¼	1	NSS
15	N/A	Cable Tie, 8"	10	NSS
16	77700-07935	Installation Instructions	1	

NSS: Not sold separately

■ MACHINE PREPARATION

WARNING

To avoid personal injury or death:

- Park the machine on a firm and level surface.
- Apply the parking brake if applicable.
- Stop the engine and remove the key from the machine is applicable.
- Disconnect negative (-) terminal on battery before performing work.

■ ASSEMBLY PROCEDURE

CAUTION

To avoid personal injury:

- Ensure engine components and coolant fluid has cooled before working around the engine.
- Disconnect the negative terminal from the battery before working on the electrical circuit.
- Do not short circuit the battery, starter motor or electrical circuits.
- Ensure all wiring has freedom of movement and will not rub against hot surfaces or sharp edges.

NOTE:

- **All assembly procedures listed within this manual are generally representative of the machine model for which the manual is written.** Your machine may be configured differently, but the outline for the procedure should still be followed. For further support for any issues not covered within the pages of this manual, please contact your local Kubota representative.

1. Disconnect the negative terminal of the battery prior to installation.

2. Lift the cab following the instructions in the machine's Work Shop Manual (WSM). Be sure to install the safety pin located behind the cab.

4. Cut a slit in the grommet so that the SVL Power Harness can be routed from the cab through the grommet to the rear of the engine compartment.

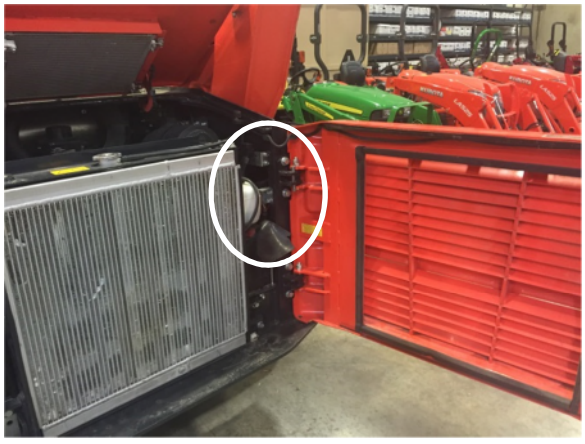
3. Dislodge the grommet shown below.

5. Following the instructions in the WSM, lower the cab.

6. Route the SVL Power Harness, provided with this kit (item 7), through the grommet from the inside of the cab. Make sure that the end with two (2) connectors is fed through the grommet first. Grommet is located in the rear corner of the cab from the inside.

7. Lift the cab, making sure to insert the safety pin.

8. Open the rear door of the machine and lift the engine cover. Be sure to install the door safety pin to prevent the door from closing while the kit is being installed.



9. Route the SVL Power Harness towards the rear of the machine to the backup alarm which is located in the rear door. Be sure to route the harness away from any moving parts or areas where engine heat can damage the harness.

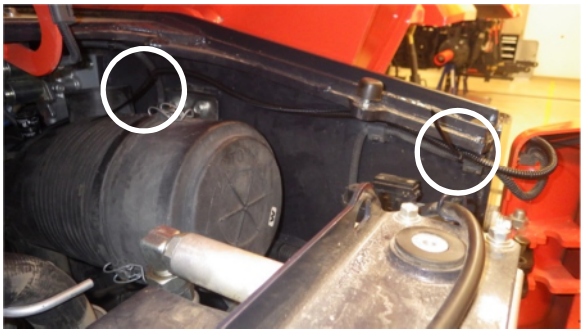
10. Remove the two (2) bolts from the backup alarm bracket using a 10mm socket.

11. Connect the SVL Power Harness to the backup alarm harness and the existing backup alarm power harness.

12. Reinstall the backup alarm bracket to the rear door using the bolts removed in step 9. Be sure to route the harness as shown below to prevent damage to the harness.

13. Secure the SVL Power Harness to the existing backup alarm power harness on the rear door as shown below with the cable ties that are provided in the kit (item 15). Ensure there is enough slack in the harness where the door pivots to allow the door to open and close fully without damaging the harness.

14. Follow the harness back to the cab and secure the harness where appropriate to ensure the harness is away from moving parts or areas where heat can damage the harness.



15. Secure the SVL Power Harness to the pilot control hydraulic lines as shown below.

16. Reinstall the grommet that was removed in step 3 to seal the cab and prevent the SVL Power Harness from damage.

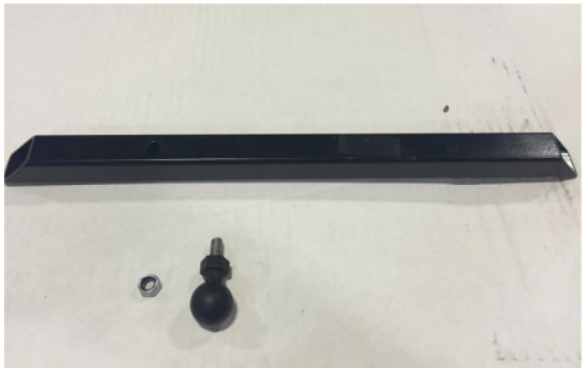
17. Lower the cab.

18. Remove the three bolts retaining the cover shown below with a Phillips head screwdriver or a 10 mm socket and remove the cover.

19. Disconnect the accessory harness shown below.

20. Connect the SVL Y Adapter that is provided with this kit (item 8). The female connector of the SVL Y Adapter is connected to the existing SVL Harness, and the male connectors of the SVL Y Adapter are connected to the existing accessory harness and the SVL Power Harness.

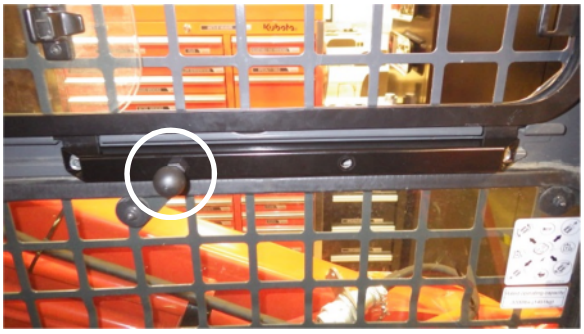
21. Locate the Monitor Mounting Bracket and the Ram Mount in the kit (items 3 and 6). Install the Ram Mount on the Monitor Mounting Bracket as shown below using the 5/16" nylock nut (item 12).



22. Locate the Monitor located in the kit (item 1). Mount the opposite end of the Ram Mount onto the monitor as shown below (item 5).

NOTE: Use the screws provided in the kit (item 13) for the Ram Mount.

23. Remove two (2) side window bolts shown below by using a 12 mm socket. Install the Monitor Mounting Bracket at these locations as shown below with the original hardware. Make sure the Ram Mount is towards the rear of the cab as shown.



24. Attach the Monitor to the Ram Mount using the Ram Double Mount included in this kit (item 4). Adjust the monitor so that the cab door and lap bars operate correctly without interference.

25. Connect the Monitor Harness, included with the Monitor, to the Monitor. Route the Monitor Harness as shown below. Use Cable Ties to secure the loose wires.

26. Remove the rear window bolt as shown below. Install the Harness Clamp, included in this kit, making sure to tighten slack in the Monitor Harness (item 14).

27. Route the SVL Power Harness as shown below. There will be two (2) separate wires running to the rear corner of the cab, the SVL Power Harness that connects to the backup alarm and a white, four (4) pin connector. Keep all other wires in the open area under the cover.

28. Replace the cover that was removed in step 17 as shown below.

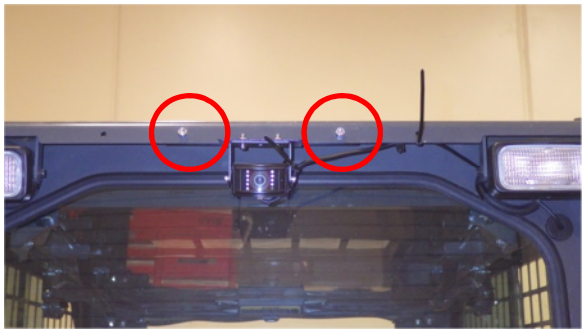
NOTE: Be sure to tuck the connectors under the cover as shown in step 27.

29. Connect the Monitor Harness to the SVL Power Harness with the white, four (4) pin connector.

30. Locate the Backup Camera, Camera Adjusting Bracket and Camera Mounting Bracket included in this kit (items 2 and 9). Mount the Camera Adjusting Bracket, included with the Backup Camera, to the Camera Mounting Bracket. Then mount the Backup Camera to the Camera Adjusting Bracket as shown below.

NOTE: Use hardware provided with the Backup Camera.

31. Install the Backup Camera assembly to the rear of the cab with the two (2) ¼"-20 bolts and nylock nuts, using a 7/16" socket and wrench, as shown below (items 10 and 11).



32. Remove the grommet located below the rear working light on the right side of the machine. Cut a hole in the middle of the grommet to allow the Camera Harness to pass through.

33. Route the Camera Harness as shown below and secure with a cable tie. Reseat the grommet that was removed in step 30 with the Camera Harness routed through the middle.

34. Connect the Camera Harness to the Monitor Harness connection designated as "CAMERA 1" as shown below.

35. Loop any excess harness in the rear corner of the cab and secure with a wire tie as shown below.

36. Connect the negative terminal of the battery.

37. Verify Backup Camera Kit operation with the following steps:

    a. Turn the ignition key to the “RUN” position. Do Not start the engine.

    b. Press the Monitor power button located on the bottom edge of the Monitor to turn the Monitor on.

    c. Verify that the Monitor displays an image on the monitor.

       NOTE: This is a good time to make any adjustments to the Backup Camera by loosening the mounting screws on the Camera Adjustment Bracket.

    d. Press the Monitor power button to turn the Monitor off.

    e. Start the engine and unlock the hydraulics.

    f. Backup the machine one (1) to two (2) feet, verifying that the Backup Alarm sounds and that the Monitor powers on automatically.

Torque Values Chart for Common Bolt Sizes

Bolt Size (inches)	Bolt Head Identification Grade 2		Grade 5		Grade 8	
in-tpi [1]	N · m [2]	ft-lb [3]	N · m	ft-lb	N · m	ft-lb
1/4" - 20	7.4	5.6	11	8	16	12
1/4" - 28	8.5	6	13	10	18	14
5/16" - 18	15	11	24	17	33	25
5/16" - 24	17	13	26	19	37	27
3/8" - 16	27	20	42	31	59	44
3/8" - 24	31	22	47	35	67	49
7/16" - 14	43	32	67	49	95	70
7/16" - 20	49	36	75	55	105	78
1/2" - 13	66	49	105	76	145	105
1/2" - 20	75	55	115	85	165	120
9/16" - 12	95	70	150	110	210	155
9/16" - 18	105	79	165	120	235	170
5/8" - 11	130	97	205	150	285	210
5/8" - 18	150	110	230	170	325	240
3/4" - 10	235	170	360	265	510	375
3/4" - 16	260	190	405	295	570	420
7/8" - 9	225	165	585	430	820	605
7/8" - 14	250	185	640	475	905	670
1" - 8	340	250	875	645	1230	910
1" - 12	370	275	955	705	1350	995
1-1/8" - 7	480	355	1080	795	1750	1290
1-1/8" - 12	540	395	1210	890	1960	1440
1-1/4" - 7	680	500	1520	1120	2460	1820
1-1/4" - 12	750	555	1680	1240	2730	2010
1-3/8" - 6	890	655	1990	1470	3230	2380
1-3/8" - 12	1010	745	2270	1670	3680	2710
1-1/2" - 6	1180	870	2640	1950	4290	3160
1-1/2" - 12	1330	980	2970	2190	4820	3560

Bolt Size (Metric)	Bolt Head Identification 5.8 Class 5.8		8.8 Class 8.8		10.9 Class 10.9	
mm x pitch [4]	N · m	ft-lb	N · m	ft-lb	N · m	ft-lb
M 5 X 0.8	4	3	6	5	9	7
M 6 X 1	7	5	11	8	15	11
M 8 X 1.25	17	12	26	19	36	27
M 8 X 1	18	13	28	21	39	29
M10 X 1.5	33	24	52	39	72	53
M10 X 0.75	39	29	61	45	85	62
M12 X 1.75	58	42	91	67	125	93
M12 X 1.5	60	44	95	70	130	97
M12 X 1	90	66	105	77	145	105
M14 X 2	92	68	145	105	200	150
M14 X 1.5	99	73	155	115	215	160
M16 X 2	145	105	225	165	315	230
M16 X 1.5	155	115	240	180	335	245
M18 X 2.5	195	145	310	230	405	300
M18 X 1.5	220	165	350	260	485	355
M20 X 2.5	280	205	440	325	610	450
M20 X 1.5	310	230	650	480	900	665
M24 X 3	480	355	760	560	1050	780
M24 X 2	525	390	830	610	1150	845
M30 X 3.5	960	705	1510	1120	2100	1550
M30 X 2	1060	785	1680	1240	2320	1710
M36 X 3.5	1730	1270	2650	1950	3660	2700
M36 X 2	1880	1380	2960	2190	4100	3220

[1] in-tpi = nominal thread diameter in inches-threads per inch

[2] N· m = newton-meters

[3] ft-lb= foot pounds

[4] mm x pitch = nominal thread diameter in millimeters x thread pitch

Torque tolerance + 0%, -15% of torquing values. Unless otherwise specified use torque values listed above.

KUBOTA TRACTOR CORPORATION
1000 Kubota Drive, Grapevine, TX 76051
Telephone: (817) 756-1171

Western Division: 1175 S. Guild Ave., Lodi, CA 95240
Telephone: (209) 334-9910

Central Division: 14855 FAA Blvd., Fort Worth, TX 76155
Telephone: (817) 571-0900

Northern Division: 6300 at One Kubota Way Groveport, OH 43125
Telephone: (614) 835-1100

Southeast Division: 1025 Northbrook Parkway, Suwanee, GA 30024
Telephone (770) 995-8855

 Code: 77700-07935 (37200059 RevB)