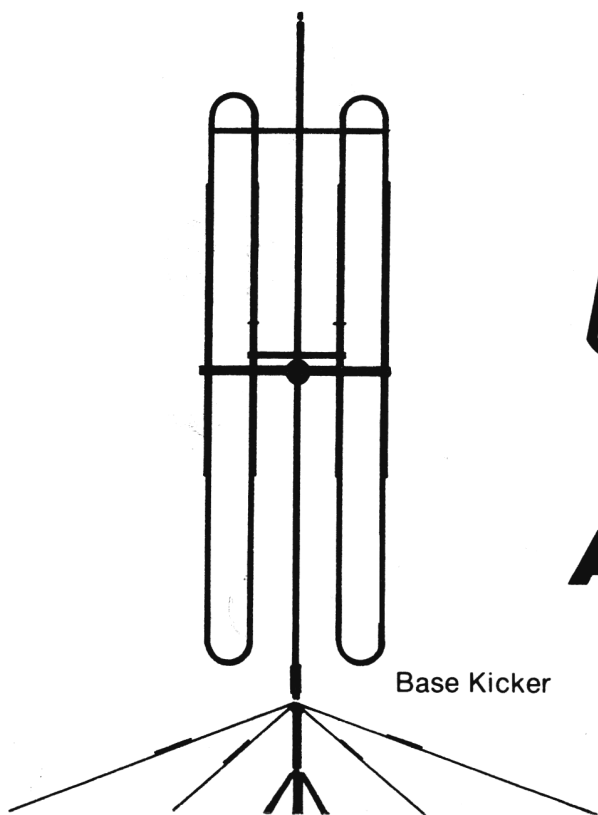


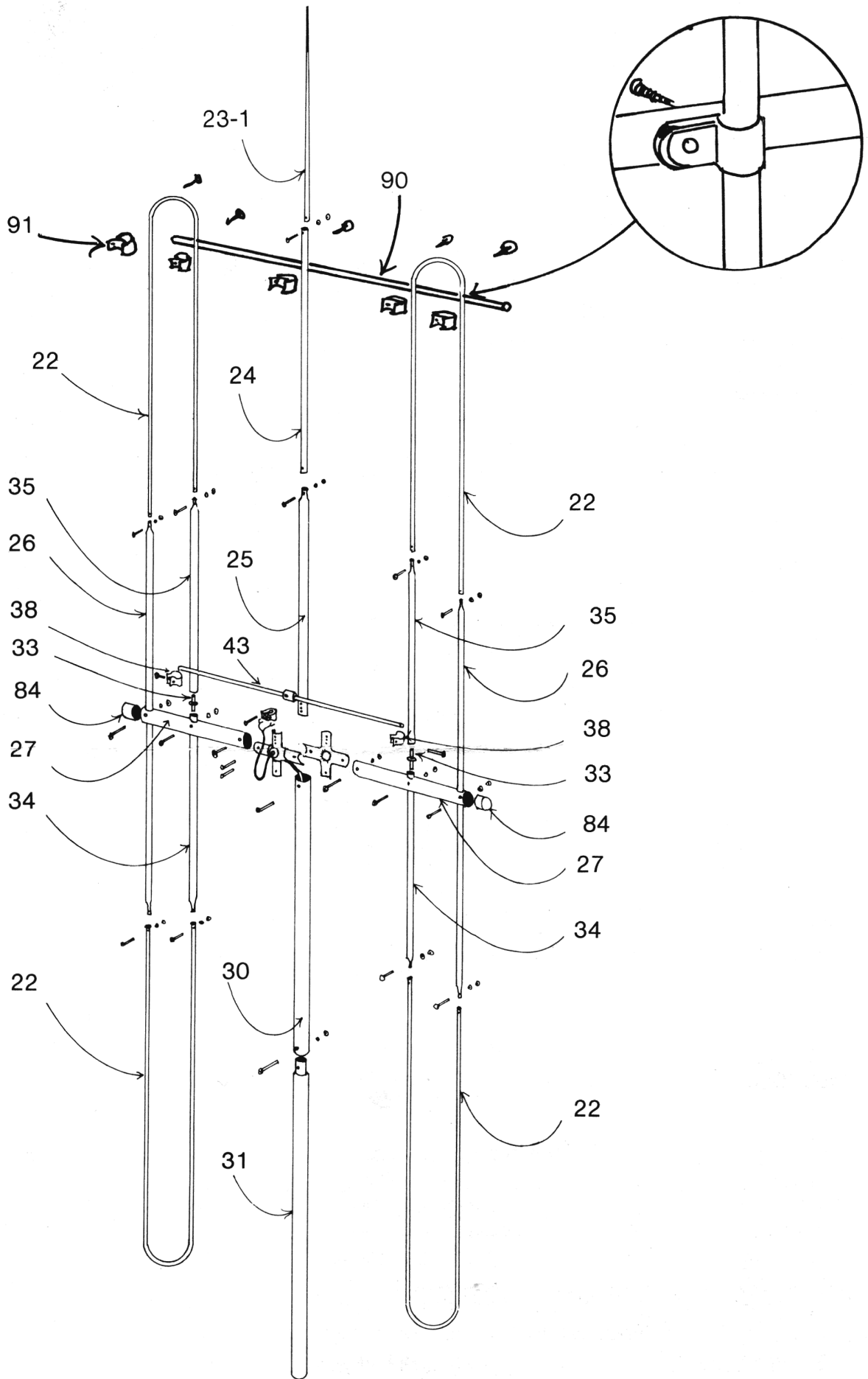
INSTALLATION GUIDE Base-Kicker



*Signal
Kicker*TM
ANTENNAS

BASE-KICKER PARTS LIST

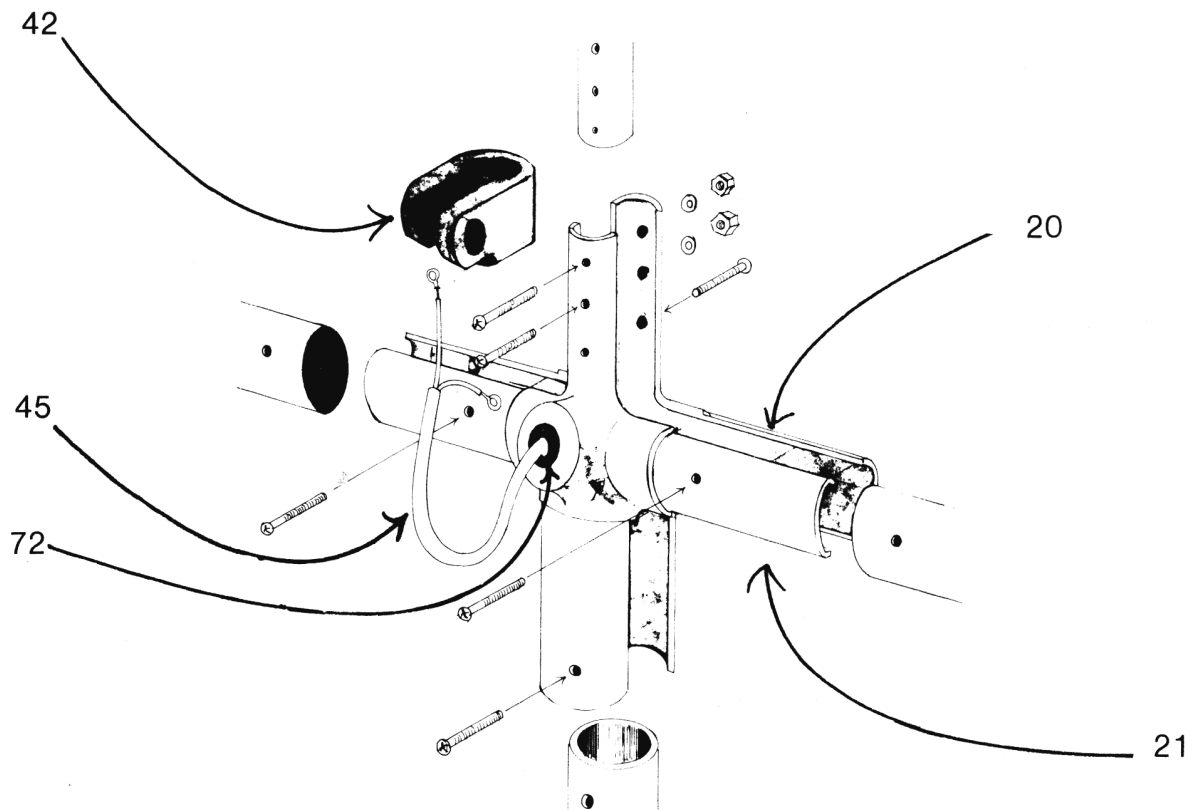
Quantity	Assembly Number	Description	Factory Part Number
1	20	Hub Half	CO9520
1	21	Hub Half (with hole for coax)	CO9521
1	45	Coax Harness	BO9545
1	72	Coax Grommet	CO1672-12
1	43	Feed Bar (23 5/8")	BO9543
1	42	Feed Bar Insulator	CO9542
2	38	Feed Bar Clamps	CO9538
2	27	Cross Arms (21 1/2" x 1 3/8")	CO9527-1
2	84	Cross Arm End Caps	CO9584
1	30	Upper Mast Section (60" x 2")	CO9530-1
1	31	Lower Mast Section (49" x 2")	CO9531-1
1	23	Top Section (40 1/4")	CO9523-1
1	24	Center Section (49 3/4")	CO9524-1
1	25	Bottom Section (37")	CO9525-1
4	22	Folded Dipole Rods	CO9522
2	26	Dipole Members (66 13/16")	CO9526-1
2	34	Dipole Members (35 1/2")	CO9534-1
2	35	Dipole Members (30 13/16")	CO9535-1
2	33	Dipole Insulators	CO9533
1	90	Dipole Brace	CO9790
1	#8	#8 Fasteners	CO1718-16
4	#8	#8 x 5/8" Self Tapping Screw	CO1010-32
3	#8	8-32 x 3/4" Screw	CO1010-30
3	#8	8-32 x 1/2" Screw	CO1010-36
7	#8	8-32 Nut	CO1005-6
9	#8	#8 Lock Washer	CO1082-5
9	#10	#10 Fasteners	CO1718-17
9	#10	#10 x 3/4" Self Tapping Screw	CO1082-6
2	1/4"	1/4" Fasteners	CO1010-88
2	1/4"	1/4-20 x 2 1/4" Screw	CO1005-4
14	1/4"	1/4-20 Nut	CO1082-7
12	1/4"	1/4" Lock Washer	CO1718-18
5	#8	1/4-20 x 5/8" Self Tapping Screw	CO1208-7
	#8	#8 x 1" Self Tapping Screw	CO9791-1
	91-1	Tube Clamp, 3/8"	CO9791-2
	91-2	Tube Clamp, 1/4"	



ASSEMBLING THE BASE-KICKER

- Step 1. To assemble the Base Kicker you'll need: 1 length of coax extension to fit your needs; 1 PL-259 connector; 1 PL-258 adaptor; 1 phillips screwdriver; 1 crescent wrench; 1 tape measure; 1 flat blade screwdriver.
- Step 2. Compare the pieces contained in the Base Kicker shipping carton with the exploded view drawing on the bottom of this page and the parts list to the left of this page. Separate the pieces into the categories outlined in the parts list and check to be sure that you have all the pieces required before attempting to assemble.
- Step 3. Insert **grommet** (72) into the hole in **hub half** (21).
- Step 4. Insert the end of the **coax harness** (45) that has lugs through the grommet from the inside of the hub half. The cable should extend approximately 6 inches.
- Step 5. Place both **halves** (21) and (20) together, insert the end of coax cable with set connector into **upper mast section** (30) and slide hub halves into end of mast section until holes in hub halves are aligned. Put **1/4" x 2 1/4" screw** (88) through aligned holes and using **1/4" nut** and **1/4" lock washer**, tighten.
- Step 6. Assemble **dipole insulator** (33) into **35 1/2" dipole member** (34) and **30 13/16" dipole member** (35). Fit **feed bar clamp** (38) over **dipole member** (35). Align holes in insulator and members and secure with **#8 x 3/4" screws** using **#8 nuts** and **#8 lock washers**.
- Step 7. Insert the above dipole member through the hole in the **cross arm** (27) that is near the center of the cross arm. Secure with **1/4 x 5/8" self tapping screw** using **1/4" lock washer** from each side.
- Step 8. Insert **66 13/16" dipole member** (26) into hole in cross arm that is closest to the end of cross arm, and secure in the same manner as Step 7.
- Step 9. Put **folded dipole rods** (22) into both ends of dipole members and secure with **#10 x 3/4" self-tapping screws** using **#10 lock washers**.
- Step 10. Insert **cross arm end cap** (84) into end of cross arm that is nearest the outer dipole member.
- Step 11. To assemble other dipole, repeat Steps 6 through 10.
- Step 12. Slip open ends of cross arms over the side arms of hub assembly. (NOTE: Dipole insulators should be positioned on top side of cross arm.) Align holes and secure with **1/4-20 x 5/8" self tapping screws** using **1/4" lock washers** from each side.
- Step 13. Slide **feed bar** (43) into **feed bar insulator** (42) and slide insulator over top of hub with feed bar on same side of hub as extending coax.
- Step 14. Insert **37" section** of upper element assembly (25) into top of hub. Align holes and place **#8 x 1 1/2" screw** through the lower hole in the top of the hub from the side opposite the feed bar. Place ground (outer conductor) lug of coax cable over the protruding screw and secure with **#8 nut** and **#8 lock washer**.
- Step 15. Align holes in feed bar insulator and secure with **#8 x 1 1/2" screws** using **#8 nuts**.
- Step 16. Connect coax cable center conductor to center of feed bar with **#8 x 1/2" screw** and **#8 lock washer**.

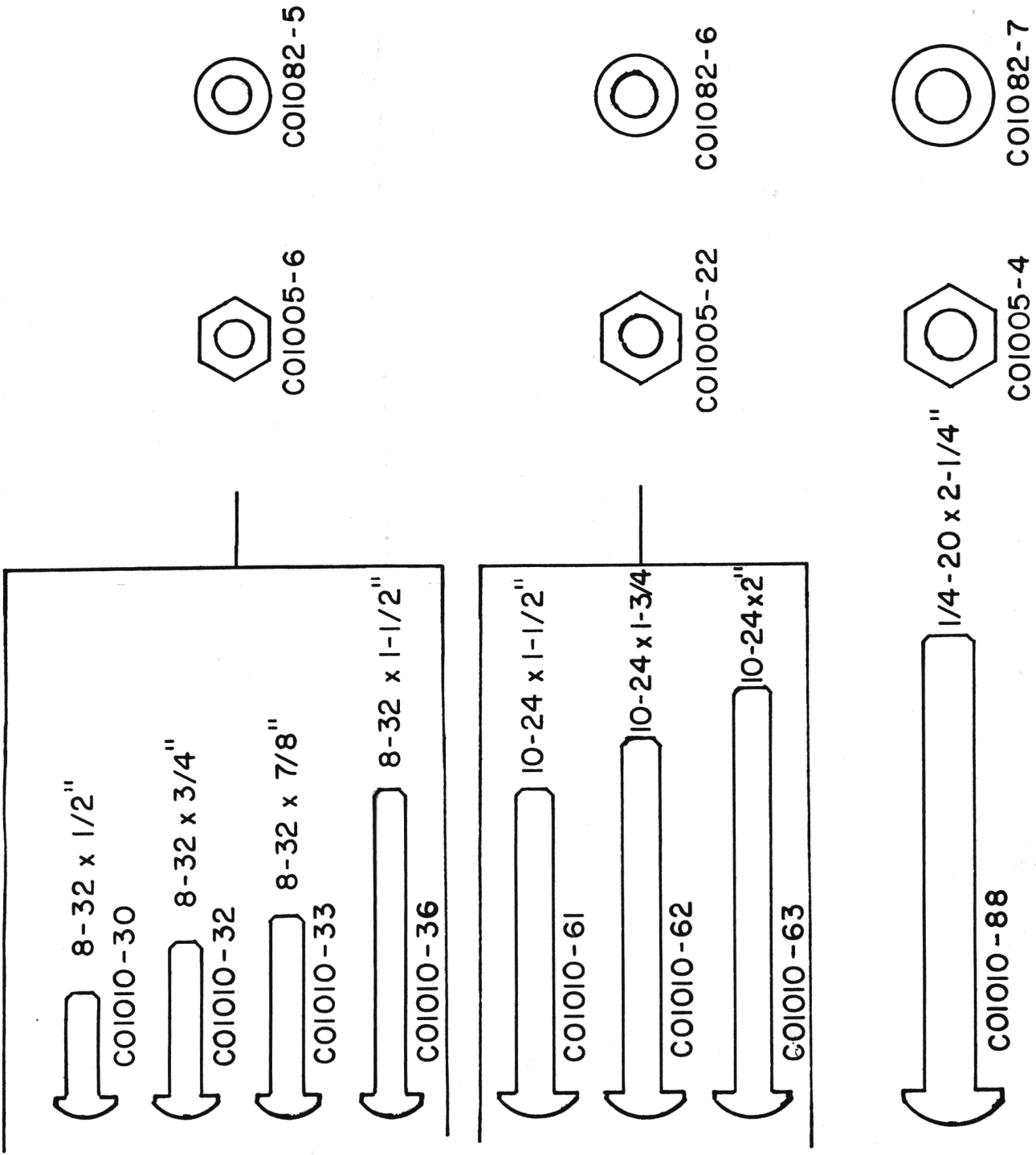
- Step 17. Fasten feed bar clamps to ends of feed bar with **#8 x 1/2" screw** and **#8 lock washer**.
- Step 18. Assemble **center section** of upper element assembly (24) to bottom section of upper element assembly with **#10 x 3/4" self tapping screw** using **#10 lock washer**.
- Step 19. Assemble **top section** of upper element assembly (23-1) to center section of upper element assembly with **#8 x 5/8" self tapping screw** using **#8 lock washer**.
- Step 20. Lay brace 90 across dipoles just below curve at top.
- Step 21. Place **clamp** (91) around dipole and align with hole in brace.
- Step 22. Install and tighten **self tapping screw #8 x 1"** through hole in brace.
- Step 23. Repeat this procedure at other dipole crossings and at top section (five places).
- Step 24. Feed your coax extension through **lower mast section** (31) from bottom.
- Step 25. Connect your coax extension to Base Kicker cable (see transmission line instructions on the back of this page).
- Step 26. Assemble lower mast section to upper mast section with **1/4" x 2 1/4" screw** using **1/4" nut** and **1/4" lock washer**.
- Step 27. Erect antenna.



HUB ASSEMBLY

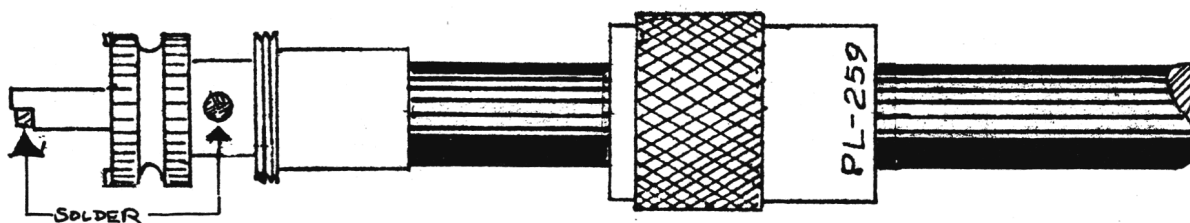
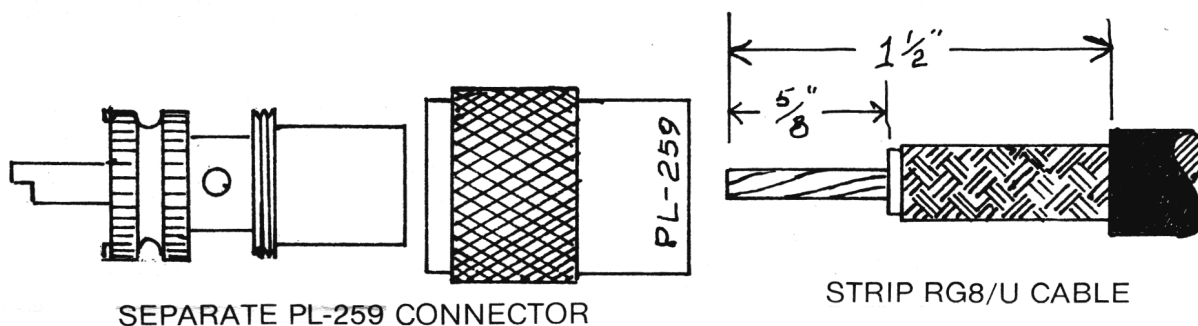
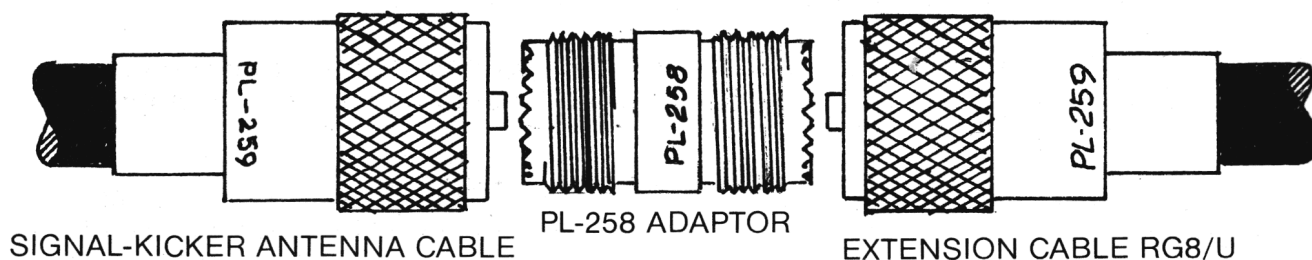
HARDWARE TEMPLATE

Signal-Kicker antenna hardware is packaged in 3 separate packages according to size. In order for you to more easily identify the different lengths of screws within the hardware packages, we are enclosing this template for your further convenience.



TRANSMISSION LINE

The coaxial transmission line descends through the inside of the antenna mast. This line has been pre-matched to the antenna to optimize the VSWR over citizens band channels 1 through 23. Unlike most CB antennas, no further matching should be required. Therefore, this line should not be modified at or above the first splice to avoid destroying the match. The coaxial cable terminates in a PL-259 plug. Additional line length may be added through use of a PL-258 (see drawings) or other adapter. This additional line should be 50 ohm coaxial cable, preferably RG8/U or similar to minimize transmission losses.



PLACE CONNECTOR SHELL OVER CABLE, INSERT CABLE INTO CONNECTOR INNER PART. SOLDER INNER AND OUTER CONDUCTORS TO CONNECTOR. REASSEMBLE CONNECTOR.

MAST ADAPTATION

The bottom end of the mast is 2" O.D. x 1-3/8" I.D. high strength aluminum tubing which may be cross drilled to suit the supporting structure. The supporting structure should be strong enough to withstand a load of 90 pounds applied at a point 107 inches above the bottom of the mast. Bracing used to support the mast should be as compact as is consistent with strength requirements so that the radiation pattern will not be distorted. A ground plane is not required but one will not affect the antenna. The antenna and supporting structure should be well grounded to earth.

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