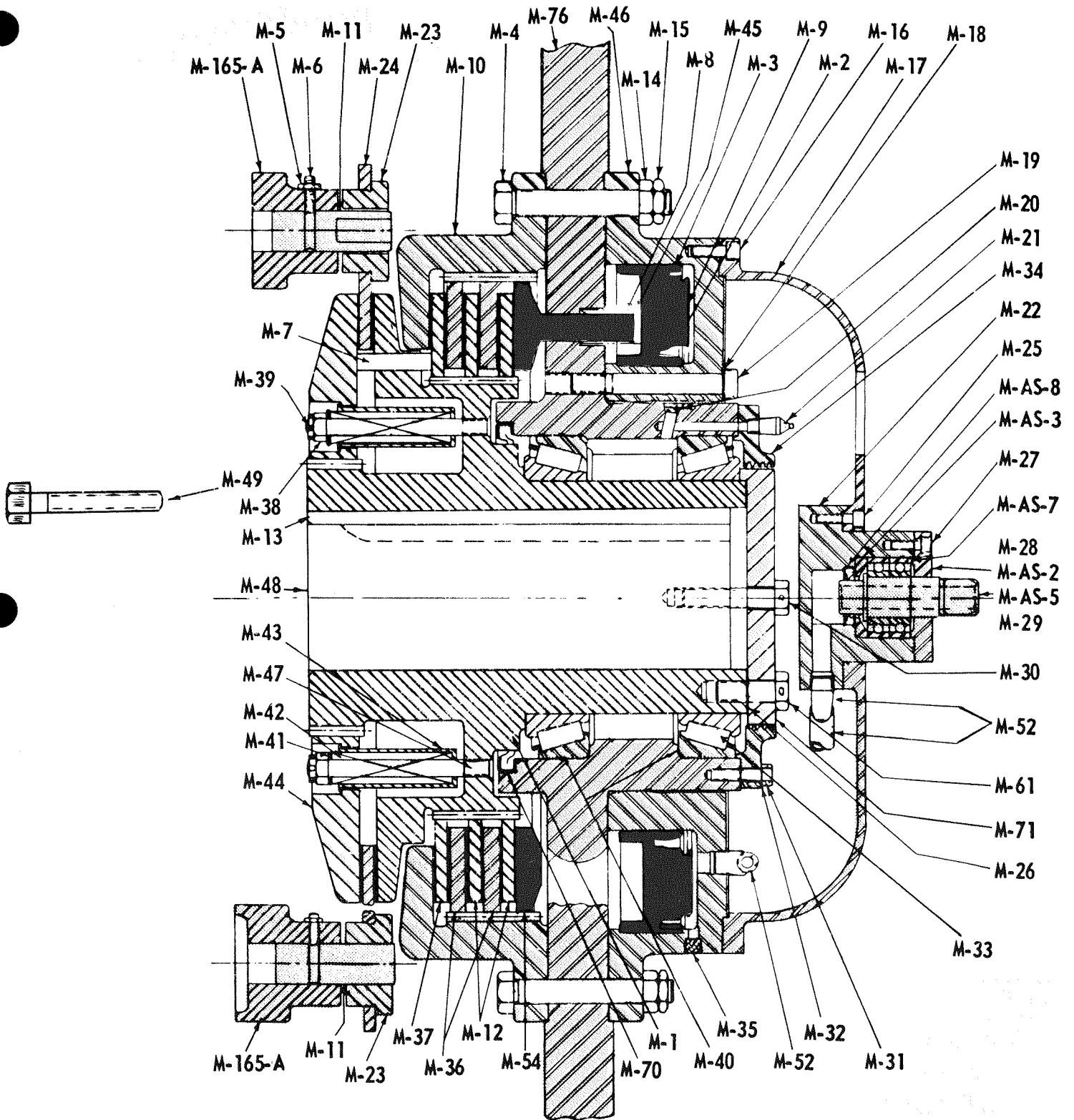


BLISS TYPE "M" FRICTION CLUTCH

SECTIONAL VIEW



SEE PAGE 4 FOR PARTS IDENTIFICATION

BLISS TYPE "M" FRICTION CLUTCH

PARTS LIST

M-1	CLUTCH HUB	M-42	BRAKE SPRINGS
M-2	PISTON PACKING	M-43	SPRING RETAINERS
M-3	"U" PACKING	M-44	INNER BRAKE DISC
M-4	HOUSING BOLT	M-45	PRESSURE PIN
M-5	HEX. JAM NUT	M-46	AIR CYLINDER
M-6	HEADLESS SET SCREW	M-47	STUDS
M-7	BRAKE DISC PIN	M-48	CRANKSHAFT END
M-8	PISTON SPRING	M-49	BRAKE SPRING ASSEMBLY SCREW
M-9	AIR PISTON	M-52	SWIVEL HOSE ASSEMBLY WITH ELBOW
M-10	CLUTCH HOUSING	M-54	PRESSURE DISC
M-11	BRAKE PIN	M-61	HEX HEAD CAP SCREWS
M-12	INNER FRICTION DISC	M-70	GARLOCK KLOZURE
M-13	TAPER KEY	M-71	BEARING RETAINER
M-14	HEX NUT	M-76	FLYWHEEL
M-15	PAL NUT	M-165-A	BRAKE PIN BRACKET
M-16	SOC. HEAD CAP SCREW	M-AS-2	END PLATE
M-17	AIR SWIVEL HOUSING	M-AS-3	THRUST WASHER
M-18	LOCK WASHER	M-AS-5	NOZZLE
M-19	SOC. HEAD CAP SCREW	M-AS-7	DUPLEX BEARING
M-20	FLUSH PLUG	M-AS-8	OIL SEAL
M-21	ALEMITE FITTING		
M-22	SWIVEL BLOCK		
M-23	BRAKE PIN BUSHING		
M-24	OUTER BRAKE DISC		
M-25	SOC. HEAD CAP SCREWS		
M-26	PLASTIC SHIMS		
M-27	CAP SCREWS		
M-28	ALEMITE FITTING		
M-29	ELBOW		
M-30	HEX. HEAD CAP SCREW		
M-31	HEX. HEAD CAP SCREW		
M-32	LOCK WASHER		
M-33	OUTSIDE TIMKEN BEARING		
M-34	BEARING CLOSURE		
M-35	PIPE PLUG		
M-36	OUTER DISCS		
M-37	INNER FRICTION RELEASE DISC		
M-38	COTTER PINS		
M-39	CASTLE NUTS		
M-40	INSIDE TIMKEN BEARING		
M-41	WASHER		

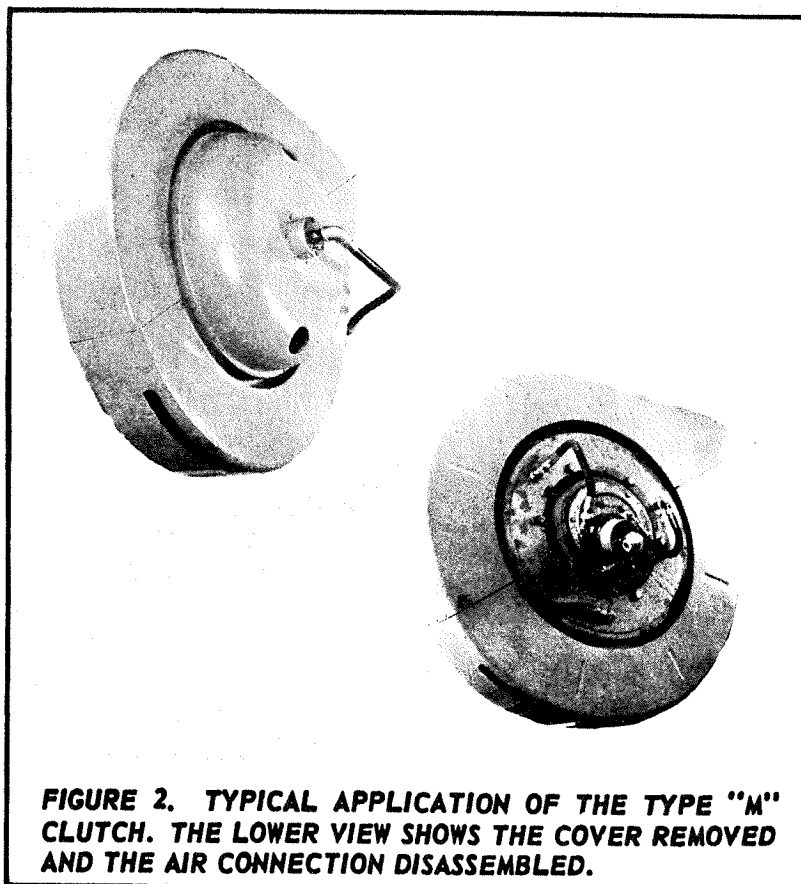


FIGURE 2. TYPICAL APPLICATION OF THE TYPE "M" CLUTCH. THE LOWER VIEW SHOWS THE COVER REMOVED AND THE AIR CONNECTION DISASSEMBLED.

BLISS TYPE "M" FRICTION CLUTCH

EXPLODED VIEW

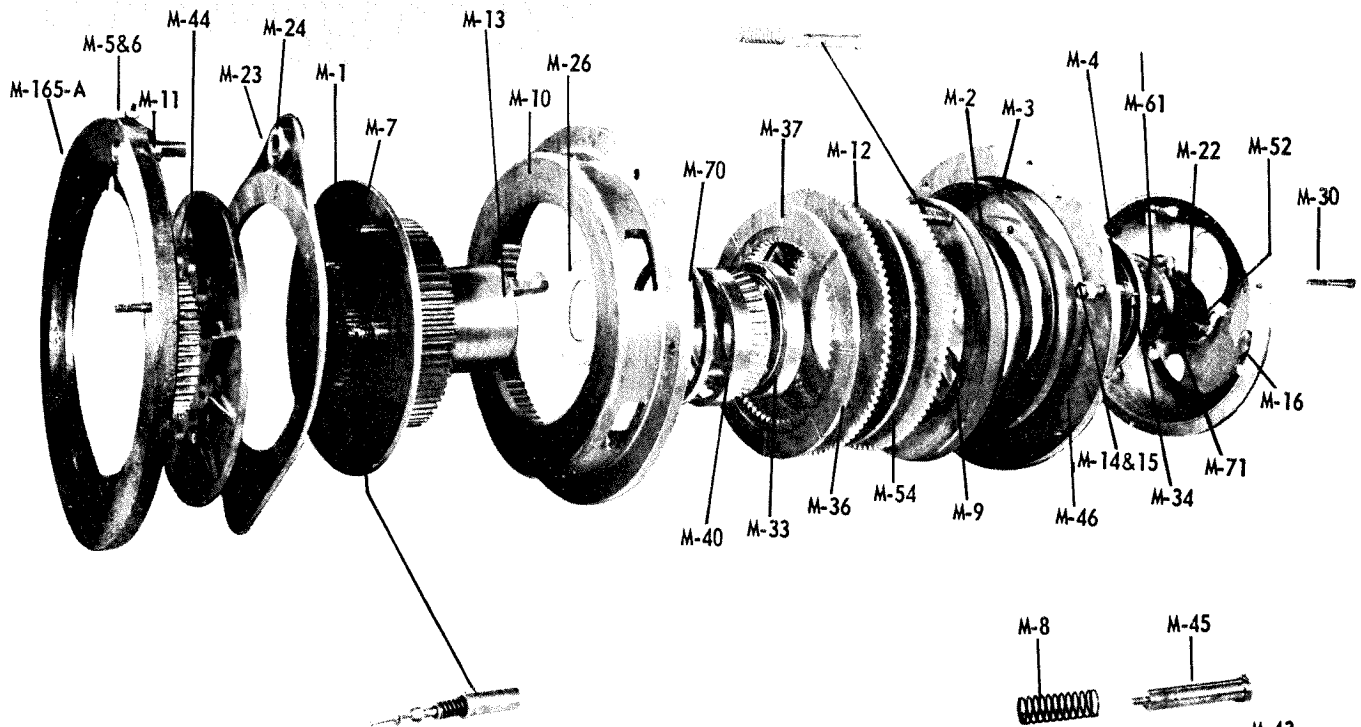


FIGURE 3. EXPLODED VIEW OF PARTS OF TYPE "M" CLUTCH.

Continued from Page 2

After all brake spring assemblies are in place, turn clutch hub (M-1) over. Insert brake disc pins (M-7) into clutch hub (M-1). Place clutch housing (M-10) over clutch hub (M-1) with flanged edge up. Place inner friction release disc (M-37) over hub so its teeth slip between teeth on hub. Next put an outer disc (M-36) on so its teeth slip between teeth in the clutch housing (M-10), then put an inner disc (M-12) and alternate outer and inner discs until they are all in place.

Place piston springs (M-8) on pressure pins (M-45) and slip pins through holes in flywheel (M-76). Screw pins into tapped holes in pressure disc (M-54). Peen ends of pressure pins (M-45) over.

Put "cone" of one Timken bearing (M-33) on clutch hub (M-1). Place bearing "cage" with "rollers" over "cone". Put "cup" part of bearing in flywheel hub. Put Garlock Klosure (M-70) in notch in flywheel hub. Set flywheel (M-76) over clutch hub being careful that Garlock Klosure (M-70) and Tim-

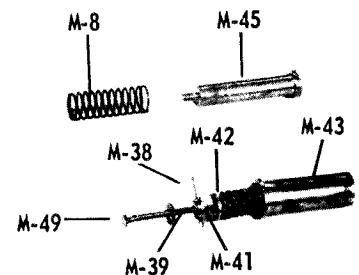


FIGURE 4. BRAKE SPRING ASSEMBLY.

ken bearing parts go into position correctly. Also line up teeth on pressure disc (M-54) so that they go between teeth in clutch housing (M-10). When all parts are in place, slip bolts (M-4) through clutch housing (M-10) and flywheel (M-76).

Put "U" packing (M-3) and piston packing (M-2) onto air piston (M-9) and place air piston into air cylinder (M-46). Slip air cylinder over bolts (M-4) and put on nuts (M-14) and (M-15) to hold clutch housing (M-10), flywheel (M-76) and air cylinder (M-46) together. Put in cap screws (M-19) with washers (M-18).

If a bearing spacer is used, slip it in next to the inner Timken bearing (M-40). Place "cup" of outer Timken bearing (M-33) into flywheel hub and against shoulder (or spacer). Put cage with rollers on "cone" of bearing and put on clutch hub (M-1).

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