



INSTRUCTION BOOK AND PARTS LIST

618V Power Feed . . . 618H Hand Feed

Reid Brothers



Company, Inc.

BEVERLY, MASSACHUSETTS

— EXPLODED VIEW CATALOGUE —

ONE SHOT LUBRICATING SYSTEM ...

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ONE SHOT
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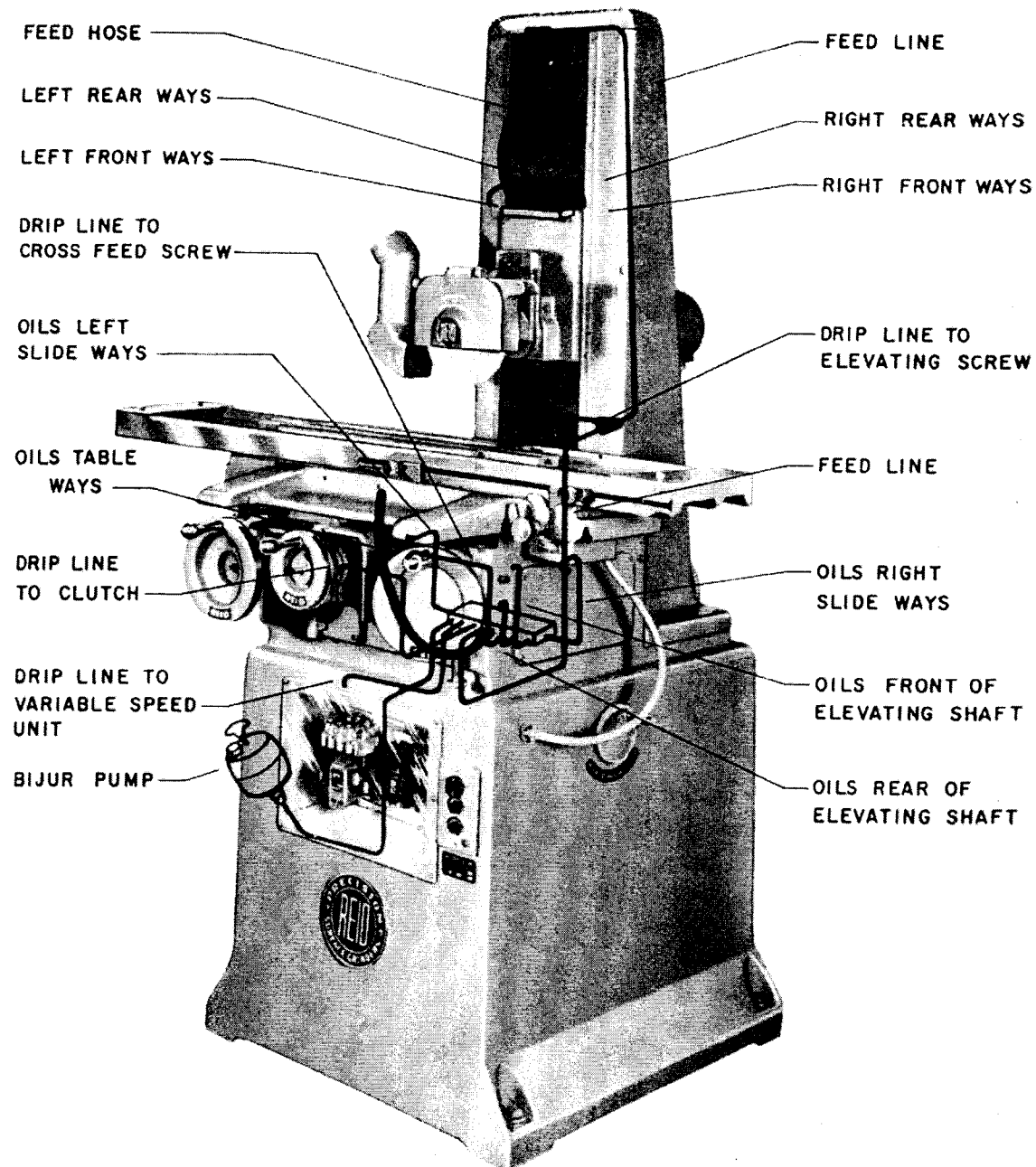
GRINDER "TIPS"

TABLE DRIVE
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618V POWER FEED...

618H HAND FEED...

INSTALLATION...

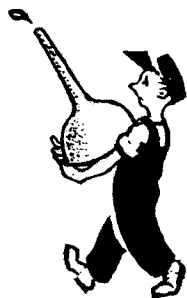


Mount the machine level on a firm foundation and bolt to the floor, if possible. Mounting pads will assist in eliminating excess vibration. Wiring diagrams (inside rear cover). Arrange wiring model

618H in switch box on the right side of column so that wheel turns clockwise. Model 618V, turn handle of limit switch to right, connect wires and start. If table moves to right exchange any two wires of 3-phase power supply, or only the two wires of 2-phase power supply.

LUBRICATION...

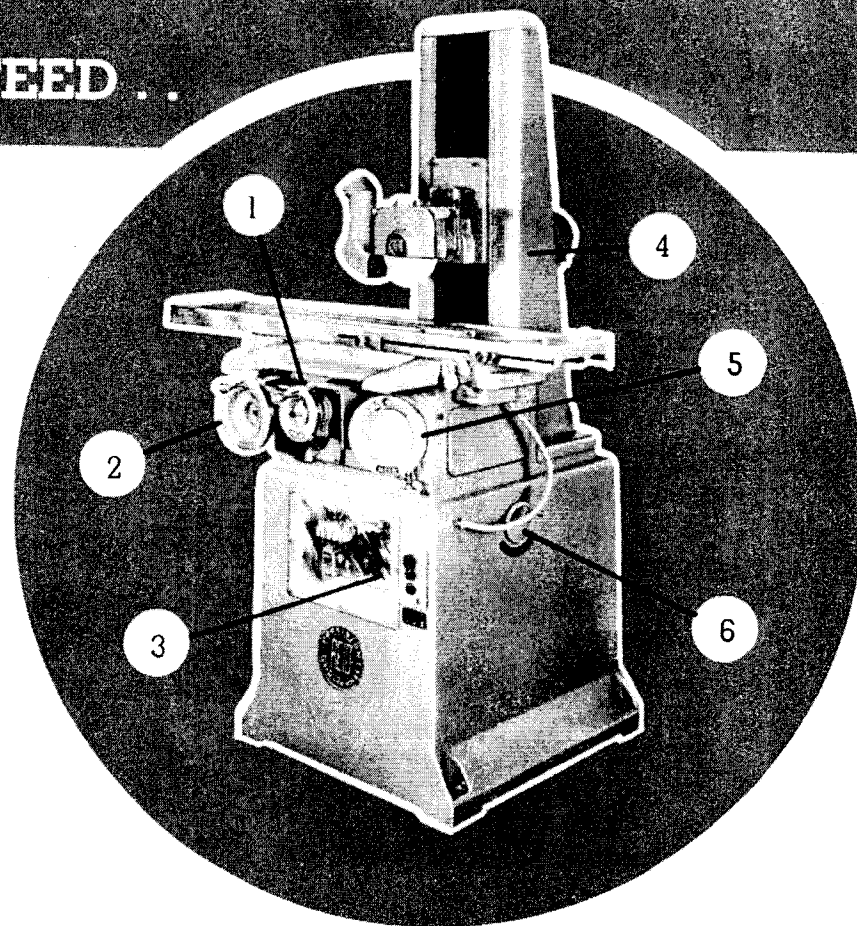
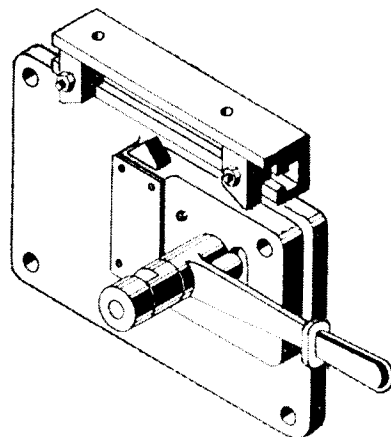
Oiling plates for regular and one shot oiling (see rear cover). Fill oil cups of regular system and check daily. Fill reservoir of one shot system weekly. One shot of the reservoir handle per day is sufficient.



STARTING...

Hand Feed Model — turn on switch for spindle and operate by hand.

Power Feed Model — turn on both motors at Rotary Selector Switch. Depress handle left side of machine (illustrated at right), for power feed table traverse. Set cross feed pawl (rear of cross feed handwheel) for power cross feed. To stop power feed of table — raise handle on left side of machine.



- ① Cross Feed handwheel
- ② Table traverse handwheel
- ③ Rotary selector switch
- ④ Spindle Switch (Hand Feed Model)
- ⑤ Variable table control
- ⑥ Head elevating handwheel

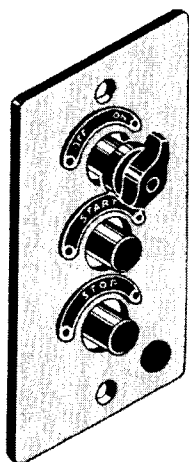
ADJUSTMENTS . . .



Power Cross Feed is adjusted from .010 to .115 by adjusting fulcrum screw from center of crank outward to edge of crank.

Table drive is adjustable at either end by nut and locknut (under ends of table).

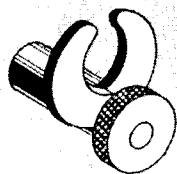
Sticking head assembly — loosen head back, cover screws, flush ways with kerosene, re-oil and re-tighten screws.



Power feed motor in base switch. Turn off for hand feed operation.

Spindle motor switch. ('ON')

'OFF' Switch. (All power to both motors).



Limit switch handle protruding from right front of cross slide.

Turn this to right under wiring installation instructions. Prongs are tripped by table dogs for table reversing.

IMPORTANT "DON'TS"



- *DON'T* overtighten table chain.
- *DON'T* adjust table dogs too close on power feed model — short stroke for an extended period will overheat motor.
- *DON'T* hold power feed control handle down when power cross feed engaged. Damage will occur if pin (see cut opposite page) forces outside dogs.

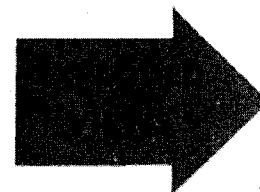
GRINDER "TIPS" . .

Use correct grade and grit of wheel for work to be ground. When wheel burns or glazes, wheel is too hard.

Wheels should be in balance.

True wheel with diamond dressing tool to clean cutting surface and correct wear in face.

Consult your wheel supplier for recommended grades of wheels for various materials to be ground.



REID MODEL 618 V & VL - - POWER FEED

SHOWING ARRANGEMENT OF
TABLE DRIVE MECHANISM AND
VARIABLE SPEED CONTROL . . .

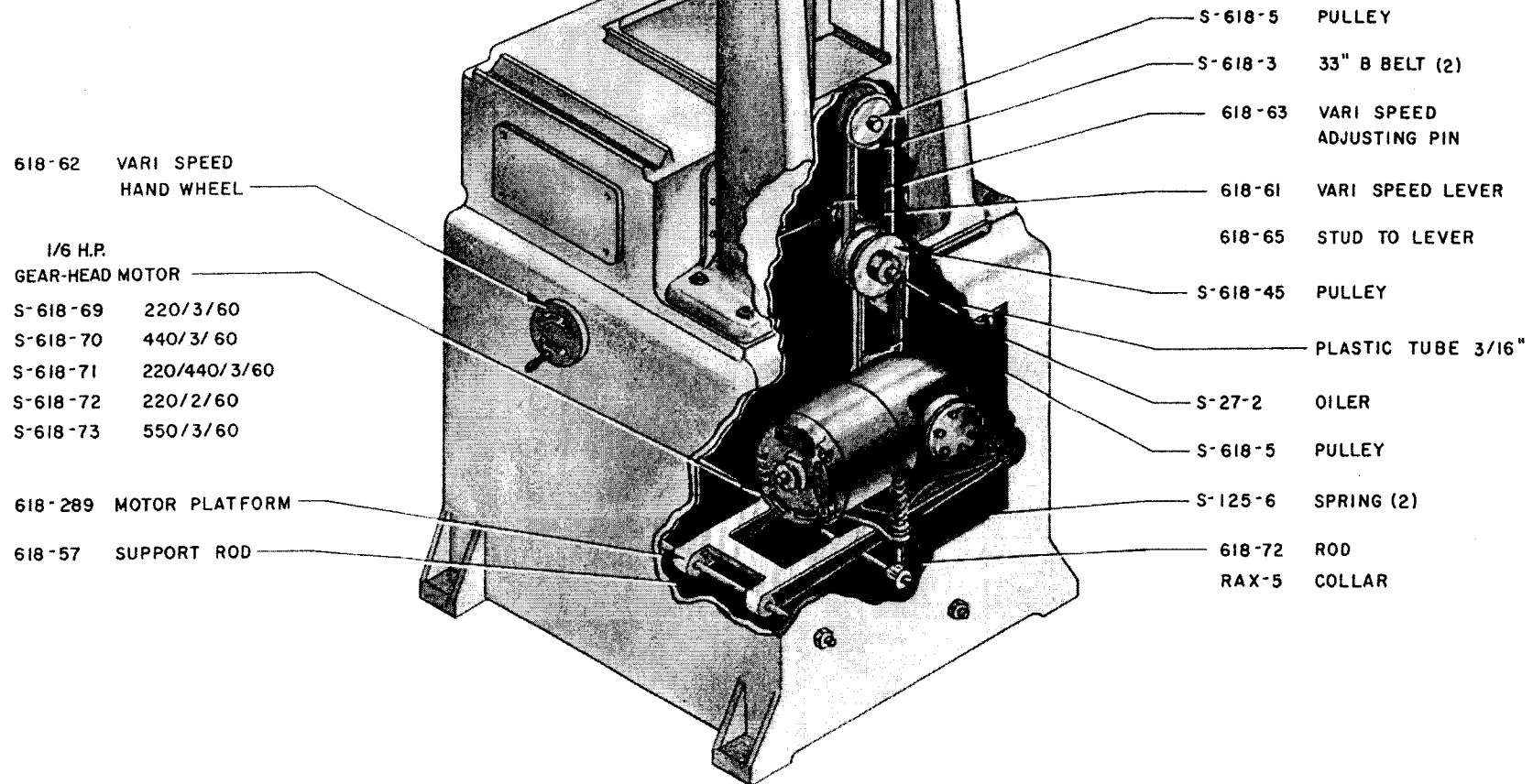
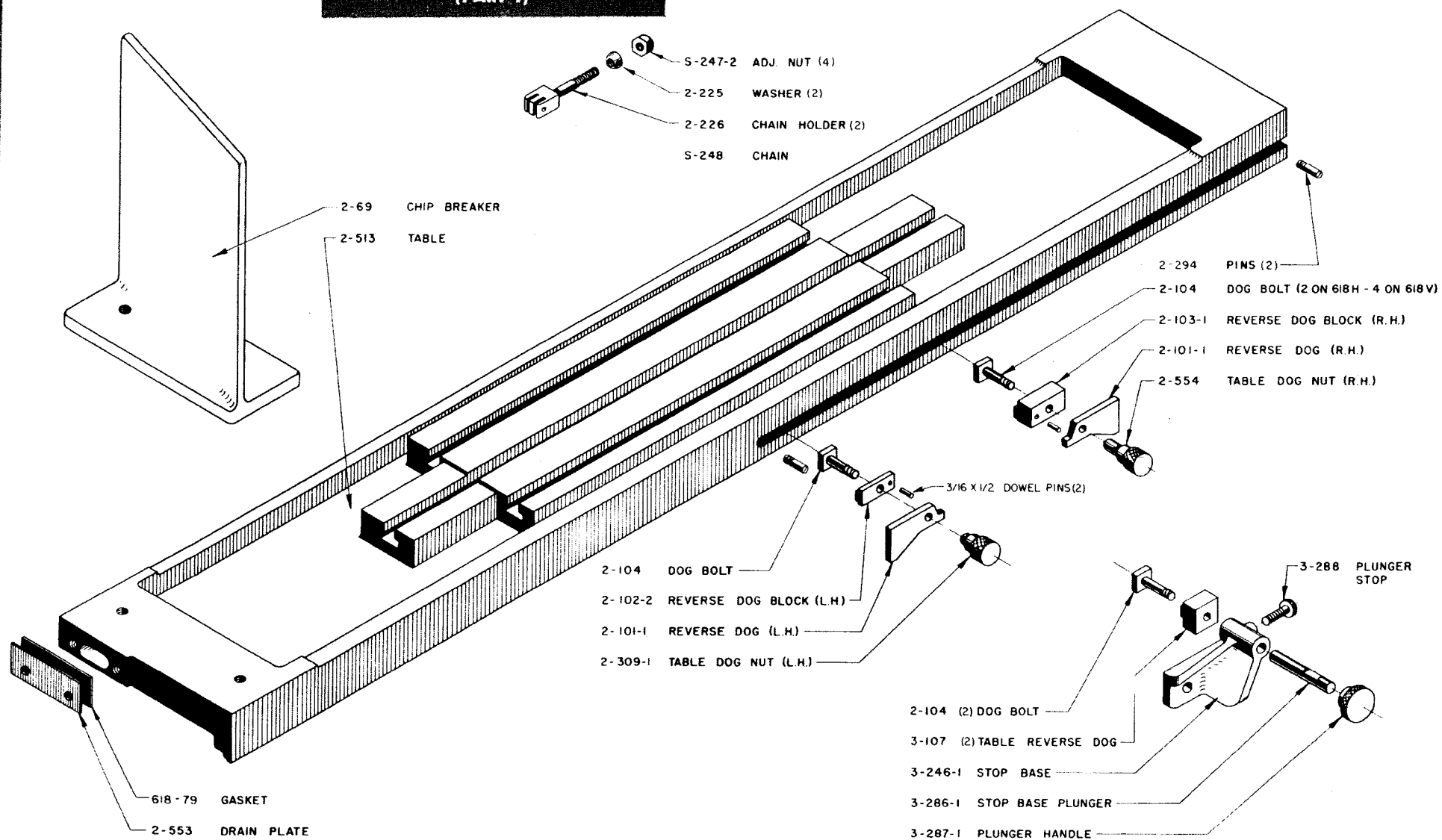
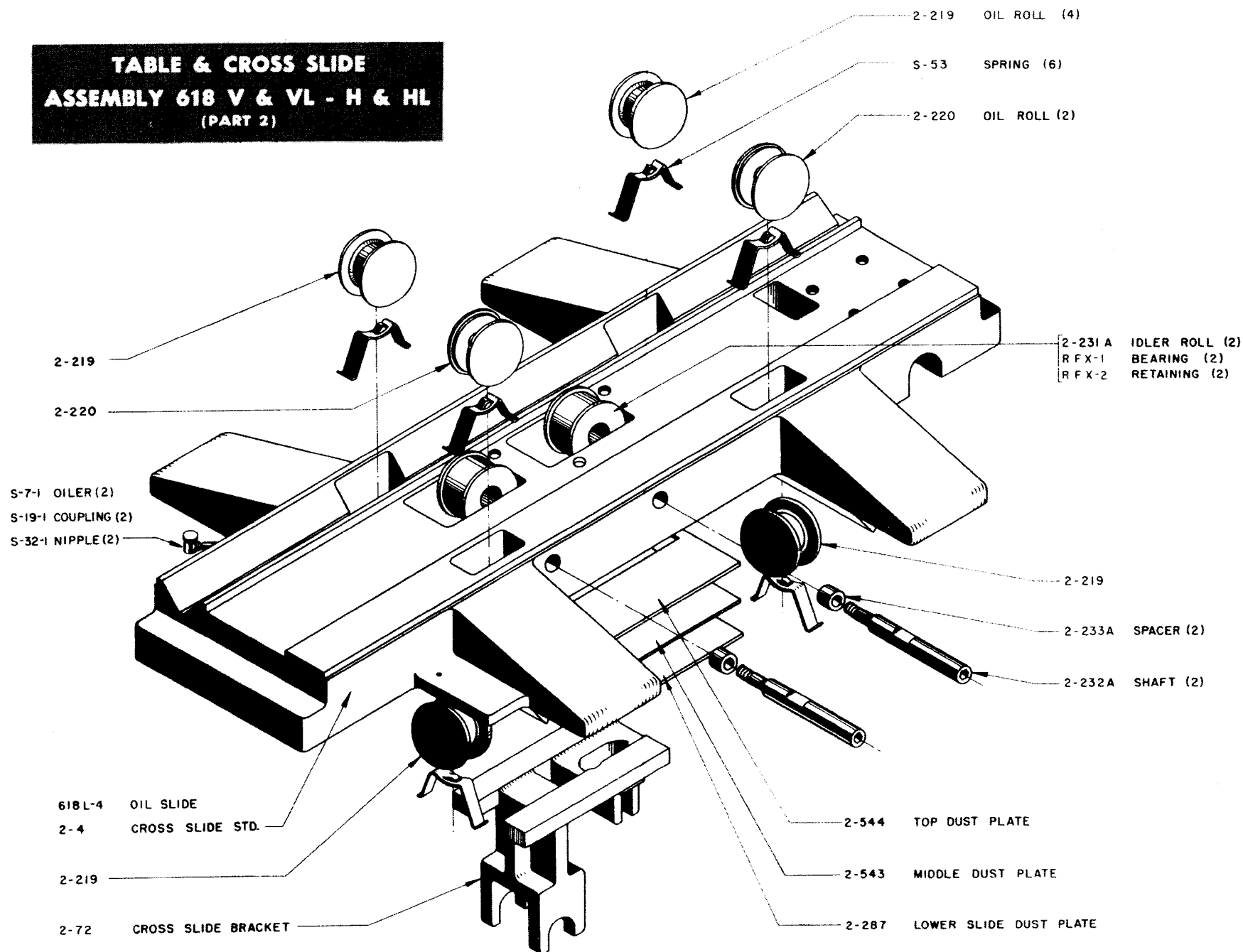


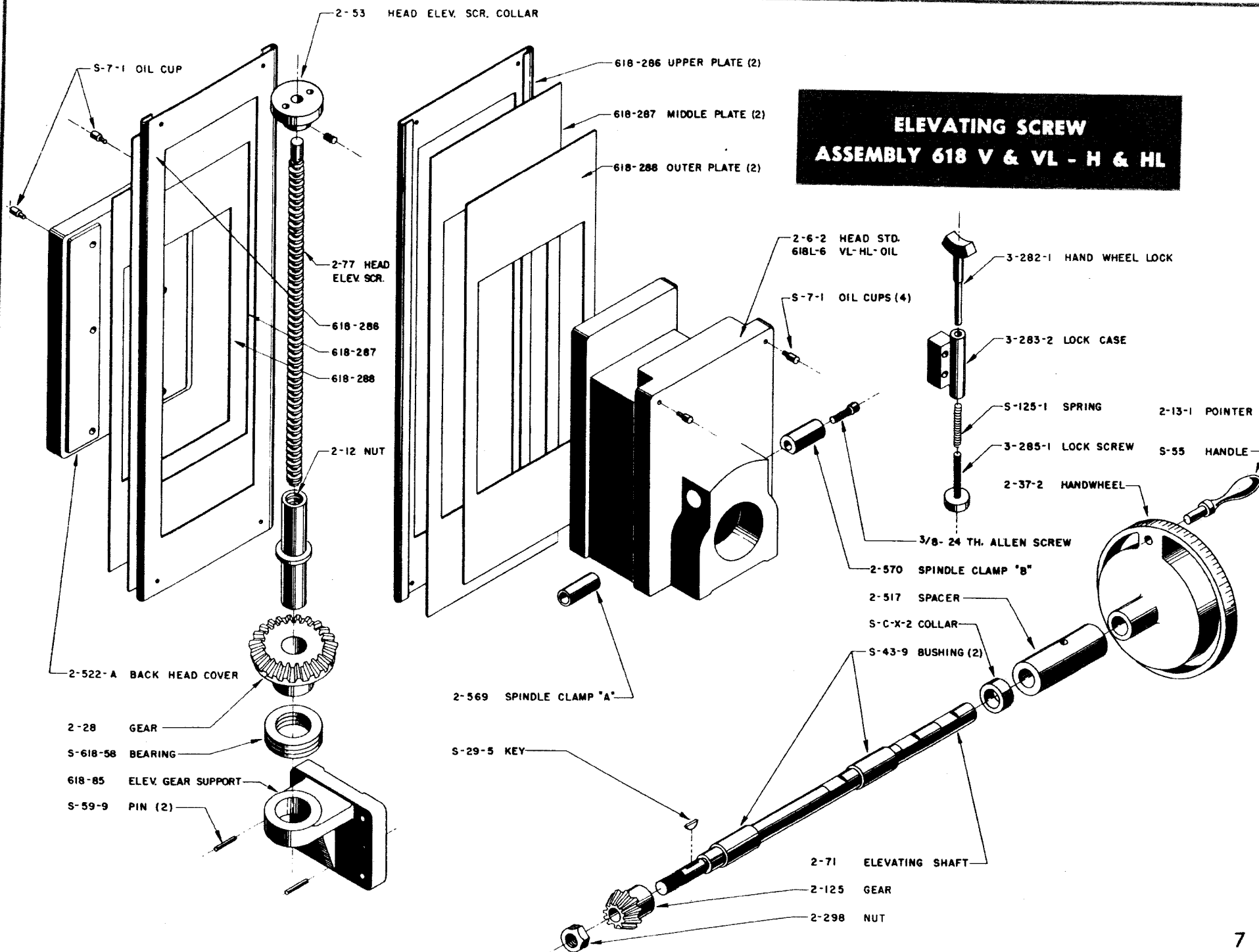
TABLE & CROSS SLIDE ASSEMBLY 618 V & VL (PART 1)



**TABLE & CROSS SLIDE
ASSEMBLY 618 V & VL - H & HL
(PART 2)**



ELEVATING SCREW ASSEMBLY 618 V & VL - H & HL



KNOCK OFF ASSEMBLY 618 V & VL

- 2-182 R.H. KNOCK OFF DOG
- 2-168 KNOCK OFF BAR
- 2-183 L.H. KNOCK OFF DOG
- 2-104 TEE BOLT

- 2-185-2 FEED STOP PIN COVER
- 2-171 STOP PIN (POWER FEED)
- 2-601 STOP PIN SHAFT (POWER FEED)

- S-59-6 PIN
- 2-170 CONTROL LEVER COLLAR
- 2-169-1 FEED POWER CONTROL LEVER
- S-44-28 PIN
- 2-180 KNOCK PAWL SHAFT
- S-57-1 BUSHING

- 618-80 HOUSING
- 2-600 SHAFT
- 618-207 SPACER
- S-618-5 PULLEY

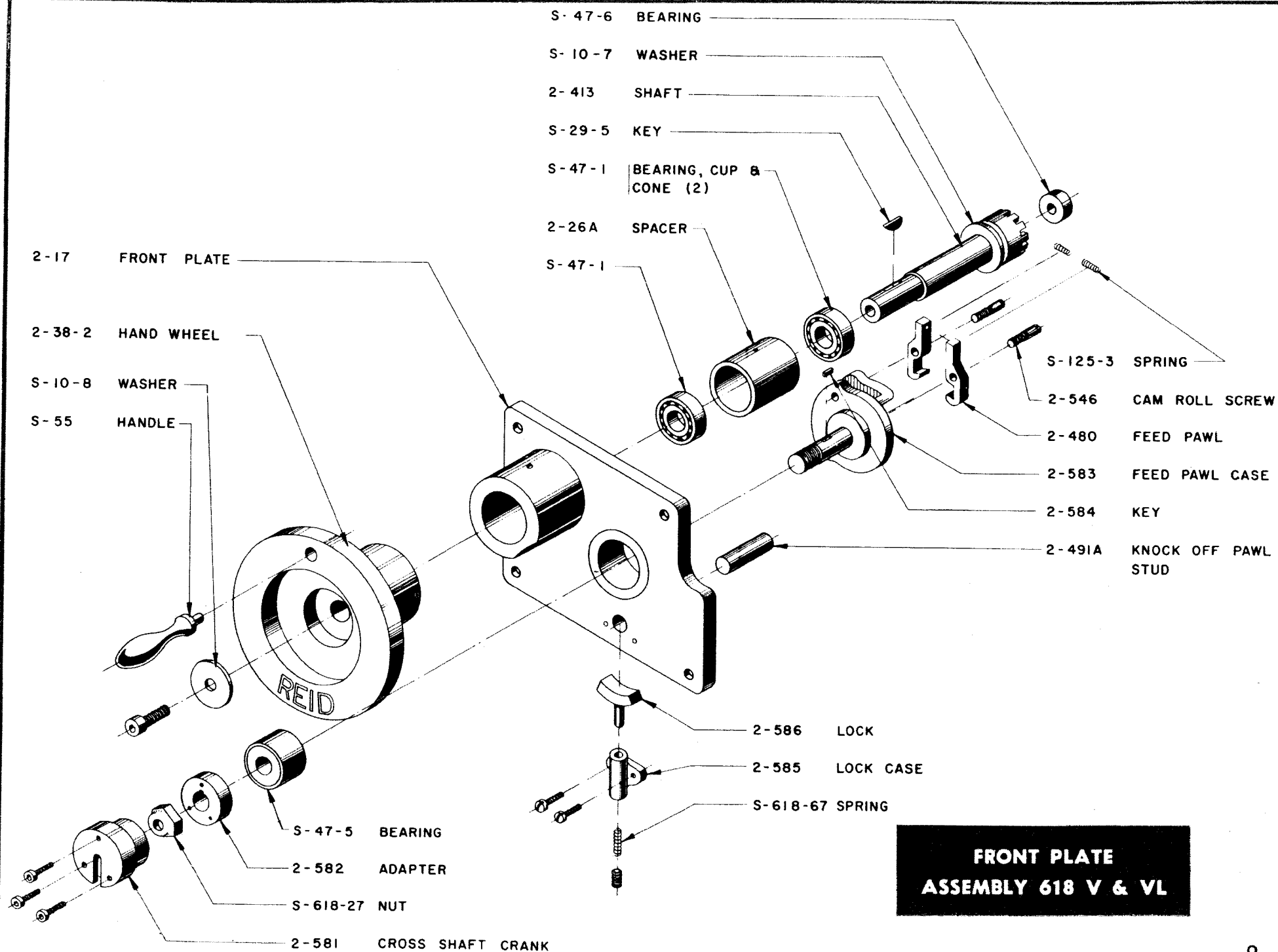
- S-618-68 BEARING
- 618-81 BEARING RETAINER
- 618-82 BEARING BUSHING
- S-59-11 PIN
- 2-411 CLUTCH
- 2-501 SLIDING GEAR & CLUTCH PART

- 618-84 LATCH
- 618-83 LATCH STUD

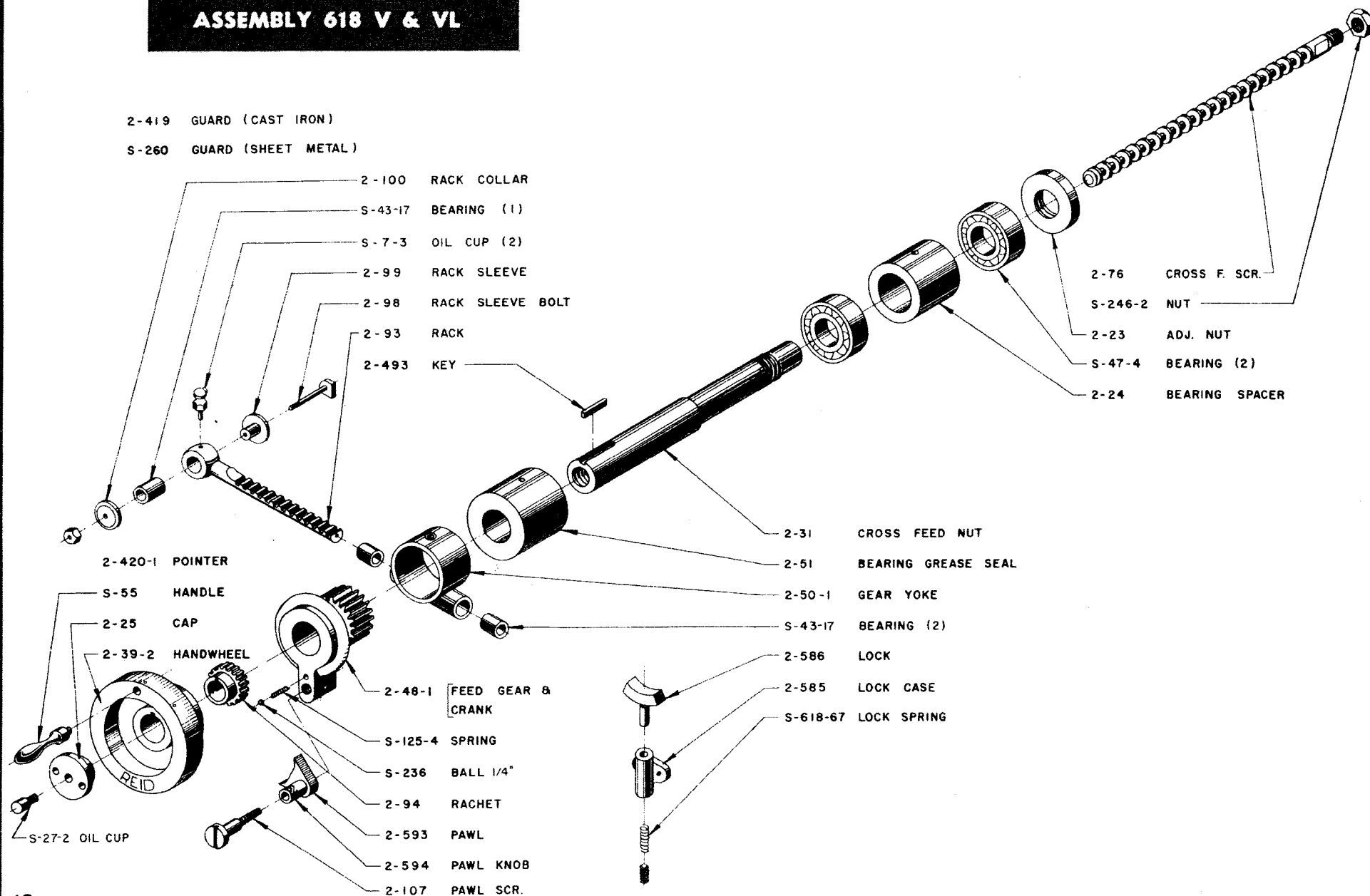
- 2-178 LIFTER STUD
- 2-176 STOP LATCH LIFTER

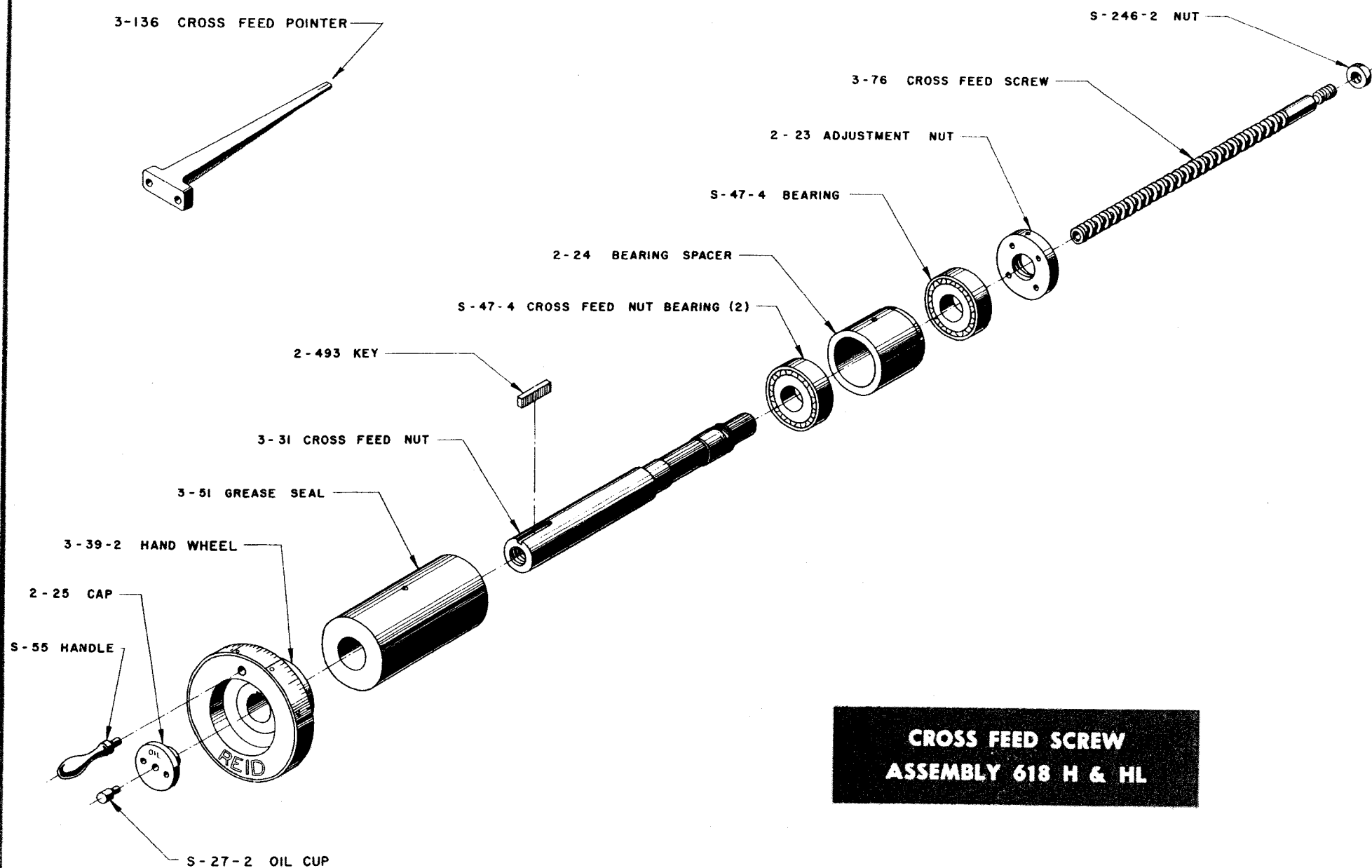
- 2-165 KNOCK OFF FORK SHAFT
- S-125-6 SPRING

- S-125-5 SPRING
- 2-179 KNOCK OFF PAWL
- S-44-29 DOWEL PIN
- 2-181 KNOCK OFF PAWL BLOCK
- 2-164 KNOCK OFF FORK

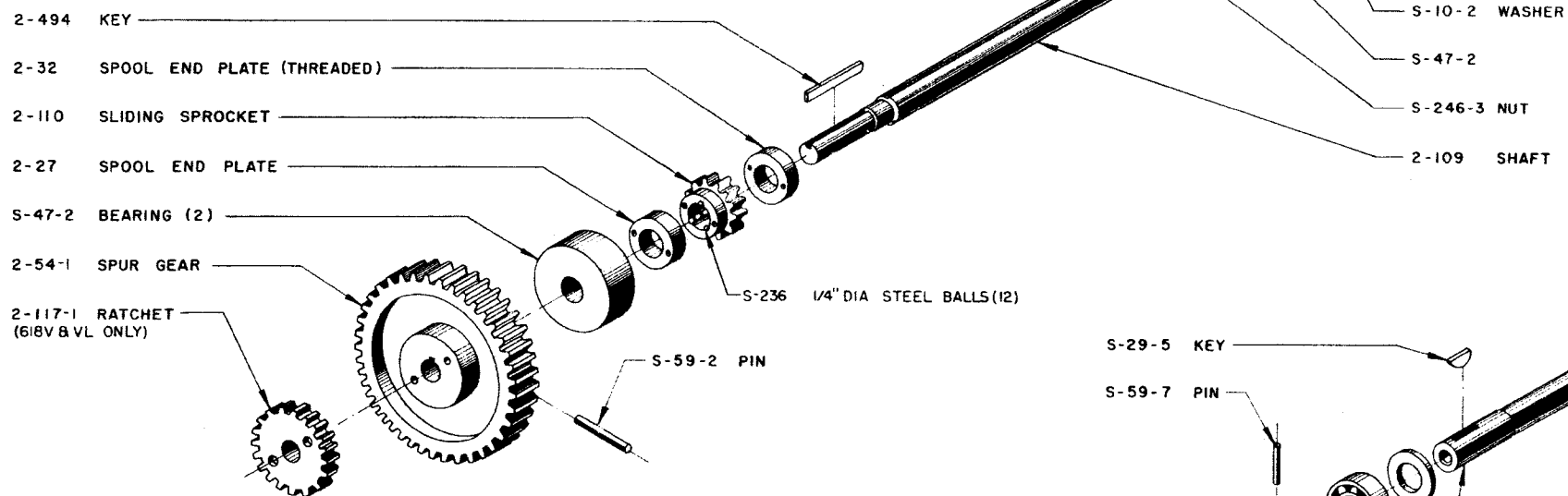


CROSS FEED SCREW ASSEMBLY 618 V & VL





CROSS SHAFT ASSEMBLY 618 V & VL - H & HL



2-38-2 HANDWHEEL

S-55 HANDLE

S-47-1

S-10-8 WASHER

S-29-5 KEY

S-59-7 PIN

3-73-1 SHAFT & GEAR
(LOWER HW.)

S-10-7 WASHER

S-47-1 BEARING (2)

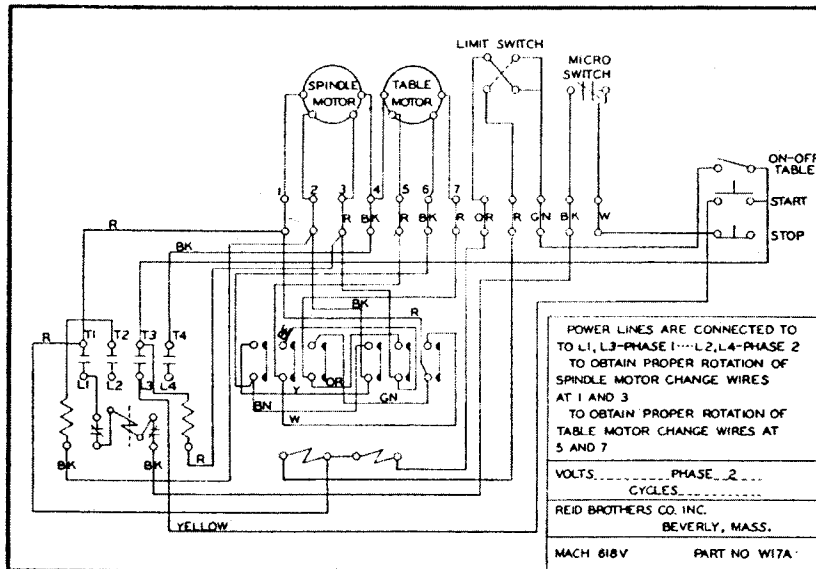
3-26 SPACER

S-59-9 PIN

3-17 PLATE

FRONT PLATE ASSEMBLY 618 H & HL

ELECTRICAL EQUIPMENT



2 PHASE

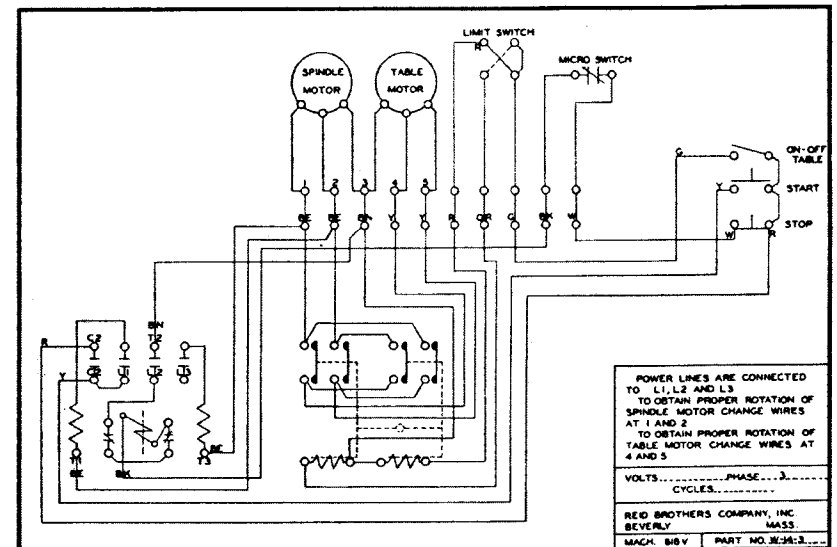
ELECTRICAL ASSEMBLIES:

A-222 Limit Switch Assembly
(includes: Limit Switch, Micro Switch, Cord & 2-490)

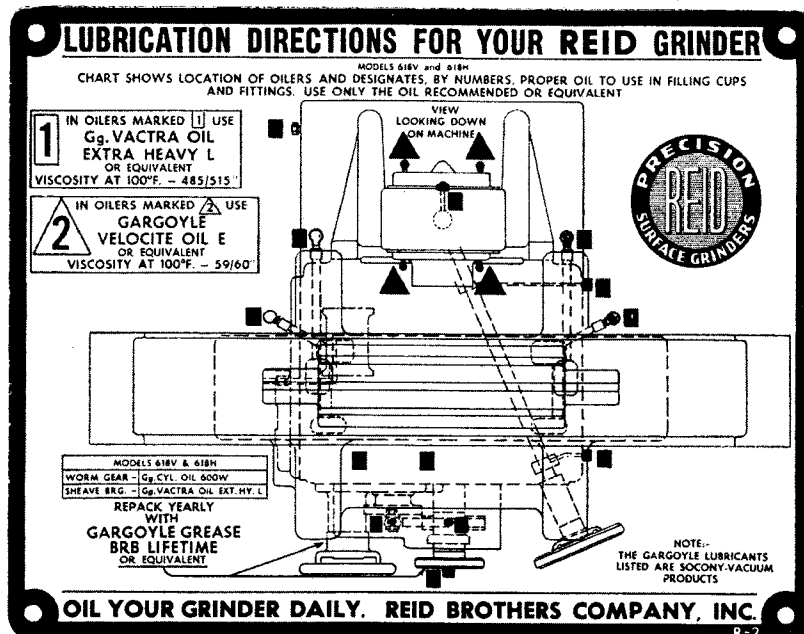
OTHER ASSEMBLIES:

A-133 Elevating Screw & Nut Assembly
A-143 Sliding Sprocket Assb. with Cross Shaft
A-146-1 Elevating Handwheel Lock Assembly
A-156-1 Table Feed Idler Assembly
A-157 Sliding Sprocket Assembly
A-162 Cross Feed Rack Assembly
A-163 Wheel Collet Assembly (1/2" wheel)
A-166 Wheel Collet Assembly (1" wheel)
A-169 Cross Feed Screw & Nut Assembly (PF)
A-170 Cross Feed Screw & Nut Assembly (HF)
A-199 Silent Chain Assembly
A-203 Wheel Guard Assembly
A-205 Suction Spout Assembly
A-230-1 Cross Feed Pawl Assembly

- S-60-1 Limit Switch (PF)
- S-61-1 Micro Switch (PF)
- S-66-1 Primary Switch (PF)
- S-67-1 Reverse Switch (PF)
- S-225-1 Spindle Snap-Switch (HF)
- S-618-41 Rotary-Start & Stop Switch (PF)

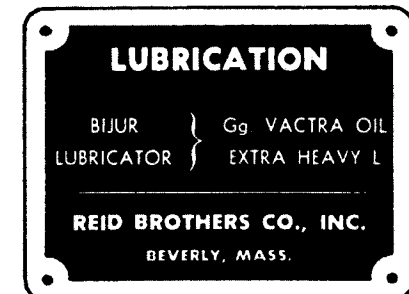


3 PHASE



SPECIFICATIONS

Oiling grades for lubrication of standard oilers specified on plate (illustrated at left) and positioned on left side of column. Oiling plate (illustrated below) for One-Shot Lubrication system positioned on left side of base directly above the reservoir.



1. CLEAN DAILY.
2. OIL AS INSTRUCTED.
3. USE PROPER WHEEL CORRECTLY BALANCED.
4. USE ATTACHMENTS PROVIDED CORRECTLY (A PROPER DUST COLLECTING UNIT WILL ELIMINATE MOST HARMFUL ABRASIVE MATERIAL TO ASSURE LONG LIFE OF MACHINE.

ORDER PART'S DIRECT FROM REID BROTHERS COMPANY, INC.

Always send serial number of surface grinder with parts orders.
Number is located on front of machine, right side, below elevating hand wheel lock.

REID BROTHERS

BEVERLY,



COMPANY, INC.

MASSACHUSETTS

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