POWER FEED INSTALLATION
Model M-4950 Cross Feed
Clausing Kondia

REFERENCE DRAWINGS ENCLOSED
NA-5444      Bevel Gear Installation
NB-6237      Power Feed Installation
ND-6293      Type 150 Servo Drive
ND-6292      Type 140 Servo Drive
0800-80001   Servo Power Feed Operation

PREPARATION

Step 1: Remove the nut, handcrank, dial assembly, and key from the lead screw.

Step 2: Remove the bearing retainer from the end bracket and replace with the bearing retainer provided.

POWER FEED INSTALLATION

Step 1: Slide the bearing race and adaptor onto the lead screw and secure to the bearing retainer with the 1/4-20 x 1/2" long socket head cap screws. Remove the bearing race.

Step 2: Screw the shaft extension onto the lead screw and tighten.

Step 3: Using the hole provided as a pilot, drill a 1/8" diameter hole through and pin the shaft extension in place using the 1/8 diameter x 5/8" long roll pin. File smooth.

Step 4: Slide the spacer and bearing race onto the lead screw.

Step 5: Secure the power feed to the adaptor using the 1/4-20 x 1" long socket head cap screws.

BEVEL GEAR INSTALLATION

Step 1: Follow drawing NA-5444 for installation of the bevel gear. Adjust for proper gear backlash.

DIAL AND HANDCRANK INSTALLATION

Step 1: After getting the proper backlash, the dial should be adjusted to obtain .005" spacing from the face of the power feed. This is important in order to keep chips from entering the gear train. Two plastic (.030" thick) and five brass (.005" thick) washers are provided for this. Shim as required.

Step 2: After proper shimming of the bevel gear and dial, install the woodruff key and the handcrank. Secure with the 1/2-20 lock nut.
LIMIT SWITCH INSTALLATION

Step 1: See the limit switch installation on drawing NB-6237.

OPERATION

See separate Servo Power Feed Operation sheet. Plug the unit into a source of 120 volt, 50 or 60 cycle power.

WARNINGS

Check hand crank clearances before operation.

Clearances between the surfaces of the hand crank and the non-moving parts of the equipment on which the hand crank is installed must be at least one-fourth inch (1/4”) to prevent injury. Modification of existing hand crank or replacement may be required. 

Do not operate without proper clearance!

Prevent contact during fast traverses.
**STEP 1**
PREPARATION

**STEP 2**
SHIMMING BEVEL GEAR

ADD SHIMS PROVIDED
1/32 THICK ARE SOLID
1/64 THICK ARE LAMINATED
.002/LAMINATION

INSTALL HANDCRANK.

MARK HOUSING AND BEVEL GEAR WITH PENCIL TO CHECK BACKLASH.

0.015/0.025 (THIS IS NOT THE READING ON THE DIAL)

ROTATE GEAR FROM SIDE TO SIDE. REMOVE OR ADD SHIMS AS REQUIRED TO OBTAIN 0.015/.025 BACKLASH.

PUSH BEVEL GEAR AGAINST SHIMS.

TIGHTEN NUT.

**CAUTION:** IF BACKLASH IS NOT PROPERLY SET BEFORE TURNING UNIT ON, BEVEL GEAR MAY BE DESTROYED.

LOosen SETSCREW

WITH POWER FEED IN NEUTRAL POSITION, TURN HANDCRANK. IF EXCESSIVE GEAR NOISE OR BINDING OCCURS, SHIMS NEED TO BE ADDED. WHEN ADDING SHIMS, REPEAT STEPS 1 AND 2.

**STEP 3**
DOUBLE CHECK OF SHIMMING

**STEP 4**
LUBRICATION

INSTALL KEY

SEAL

REMOVE GEAR, PACK WITH GREASE. (DO NOT USE SILICONE TYPE GREASE) REPLACE GEAR. (DO NOT LOSE ANY SHIMS)

PICTURES IN THIS DRAWING ARE FOR REFERENCE ONLY. SEE INSTALLATION DRAWING FOR CORRESPONDING MODEL FOR EXACT PARTS CONFIGURATION.

**SERVO PRODUCTS COMPANY**

BEVEL GEAR INSTALLATION

NA-5444 C