11.3. Stator Rewinding

Previous testing in an attempt to spin the rotor resulted in the possible burning of one (or more) stator energizing coils. Consequently, additional work has been undertaken to have the motor professionally re-wound. As a result, it was necessary to disassemble the active magnetic bearing (AMB) which was press-fit onto the stator shaft. In order to access the underside of the AMB, the top of the coils were cut off to provide more space for the pulling collar. The pulling collar was manufactured and then cut in half to fit around the shaft. A bearing puller was then placed underneath and the stator was placed on a hydraulic press. Figure **11.12** below shows a few of the stator rewinding steps for a better visual.

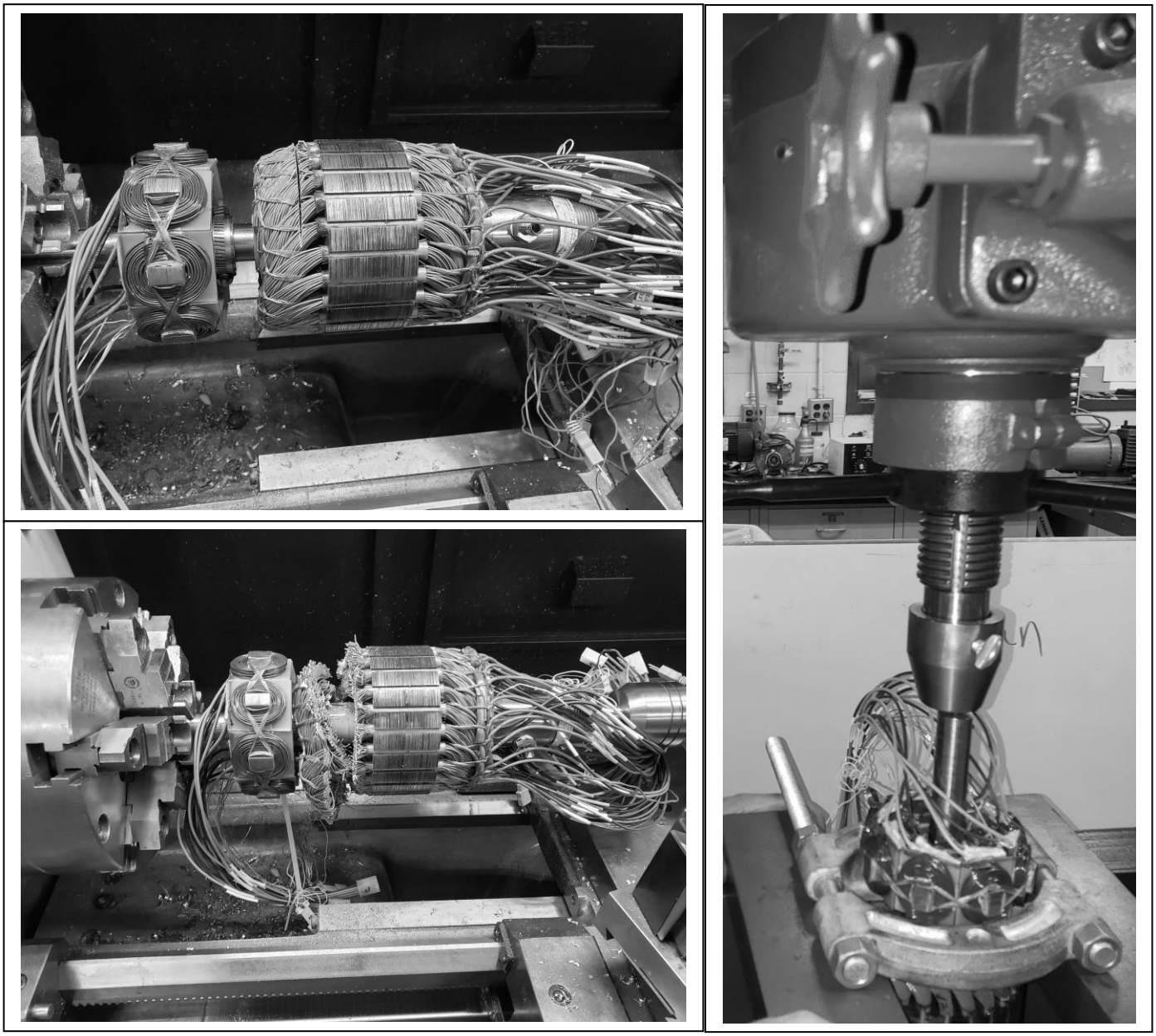

Figure 11.12 Coil Top Removal for Pulling Collar Clearance