



### **Increasing Production While maintaining Quality and Consistency**

A leading Manufacturer in the Appliance industry located in United States contacted Design Tool, Inc. as a partner to develop an improved approach to increase their production goals and maintain the quality standards that were required. Some issues facing the Manufacturer were manual placement of screws in the assembly process by the operators. Mishandled screws would lead to lost fasteners on the production floor or into the appliance product. Ergonomic difficulties led to carpal tunnel concerns with factory workers rolling screws in their hands and operator fatigue. There were significant quality issues as screws were going into the part at an incorrect angle.

Design Tool supplied the solution with the DTI 5000 Screw Feeder machine that automatically feeds and drives the screw into the appliance part, which increased production assembly output 40%! A linear work arm was recommended for positioning the screwdriver over the screw location and driving the screw straight down vertically. The manufacturer also wanted to maintain loyalty due to current stock and success with a brand of screwdrivers throughout the plant. Design Tool had no problem building around that requirement as they have worked with just about every brand of screw driving equipment available for over 25 years! Each automatic screw feeder machine is designed to the application and the screw size needs. The appliance manufacturer had many different applications for the screw head diameter and lengths. The initial need was for eight automated screw feeding

units and now the facility has over 40 Design Tool machines in process on its manufacturing floor. The return on investment on each machine came in less than six months production time and the total savings on this project overall totaled hundreds of thousands of dollars in the first year. Quality was improved dramatically, throughput was increased, and the line workers health, safety, and satisfaction were seen immediately.

Please call or visit our website for all your automated fastener needs. Design Tool will be able to tell a similar story about your success when you do!

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