Creating Work Instructions for TMP’s Manufacturing Processes

Overview

TMP Manufacturing Company builds customized walk-in coolers. They currently do not have formally recorded work instructions to train and onboard new manufacturing employees. Instead TMP relies on the “tribal knowledge” of experienced employees. This current onboarding process is time consuming and often results in new employees making costly mistakes.

Objectives

- Create a comprehensive set of Work Instructions that detail the manufacturing process in TMP’s Door Department.
- Foster technical term and process understanding
- Install proper controls within leadership

Approach

- Visited sponsor to observe and record manufacturing processes in the Door Department
- Used a Design Alternative Matrix to determine deliverables to create
- Created a set of 5 comprehensive work instructions that define the manufacturing processes: Door building, frame building, molding, frame trimming, and door trimming
- Created a Glossary of Terms, which defines technical terms and terms specific to TMP
- Created a Value Stream Map to map out the processes and to validate predetermined time standards
- Created a Leader Standard Work Chart (LSWC) to ensure that the Work Instructions were followed in a correct and efficient manner.

Outcome

Time Saved:
Original Training Time = 560 hours
New Training Time ~ 280 hours
Time Saved = 280/560 = 50%

Cost Saved:
Annual Cost of Defects = $3000
Reduction of Defects ~ 33.3%
Cost Saved = (0.33)($3000) = $1000