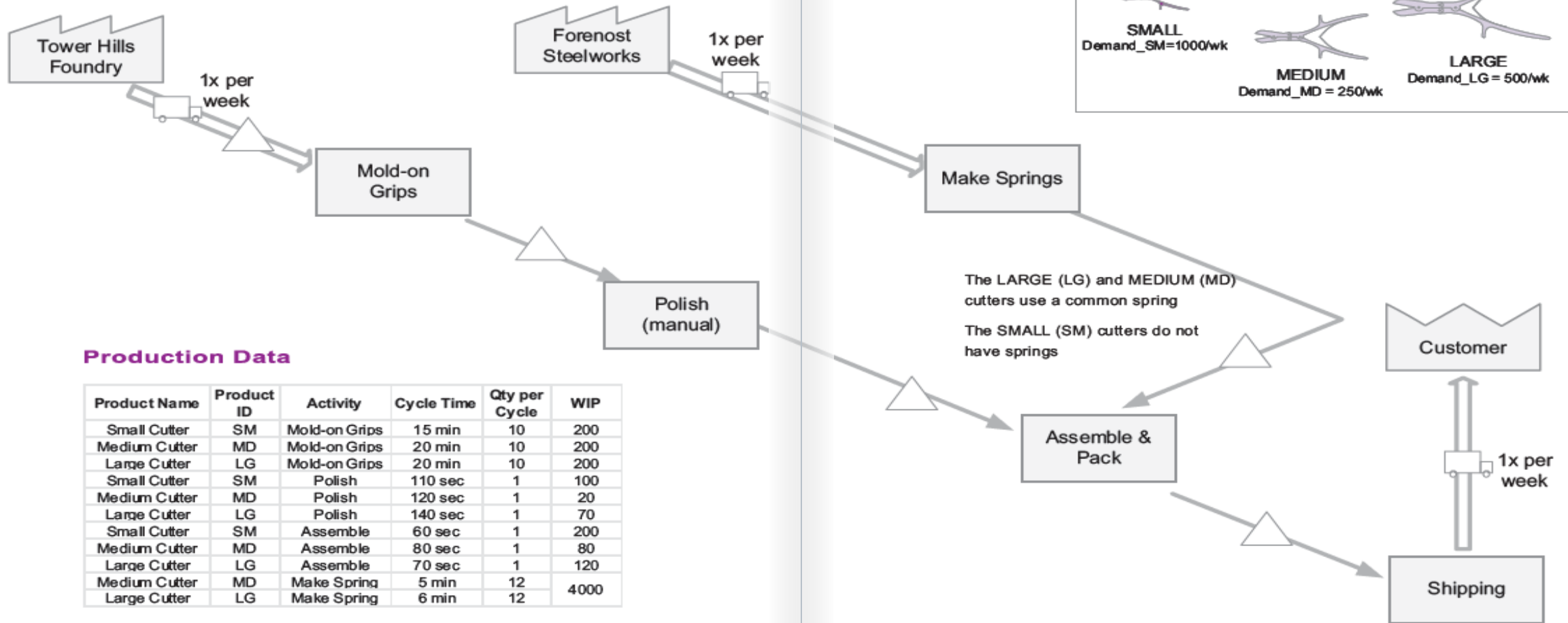# Evaluation / Case Study

This shows the data for the case study we will use in this guide to illustrate the steps to build, analyze, and improve mixed model value streams.

Production Data

Product Name	Product ID	Activity	Cycle Time	Qty per Cycle	WIP
Small Cutter	SM	Mold-on Grips	15 min	10	200
Medium Cutter	MD	Mold-on Grips	20 min	10	200
Large Cutter	LG	Mold-on Grips	20 min	10	200
Small Cutter	SM	Polish	110 sec	1	100
Medium Cutter	MD	Polish	120 sec	1	20
Large Cutter	LG	Polish	140 sec	1	70
Small Cutter	SM	Assemble	60 sec	1	200
Medium Cutter	MD	Assemble	80 sec	1	80
Large Cutter	LG	Assemble	70 sec	1	120
Medium Cutter	MD	Make Spring	5 min	12	4000
Large Cutter	LG	Make Spring	6 min	12	

	Production Losses		
Activity	Downtime	OEE	CO
Mold-on Grips	20%		25 min
Make Spring		85%	

Customer Demand

SMALL
Demand_SM=1000/wk

MEDIUM
Demand_MD = 250/wk

LARGE
Demand_LG = 500/wk

The LARGE (LG) and MEDIUM (MD) cutters use a common spring

The SMALL (SM) cutters do not have springs

The plant is operational for 16 hours each day with two 8-hour shifts, 5 days a week, providing each shift with a 30-minute lunch break, two 15-minute breaks, and a 10-minute cleanup at the end of each day.