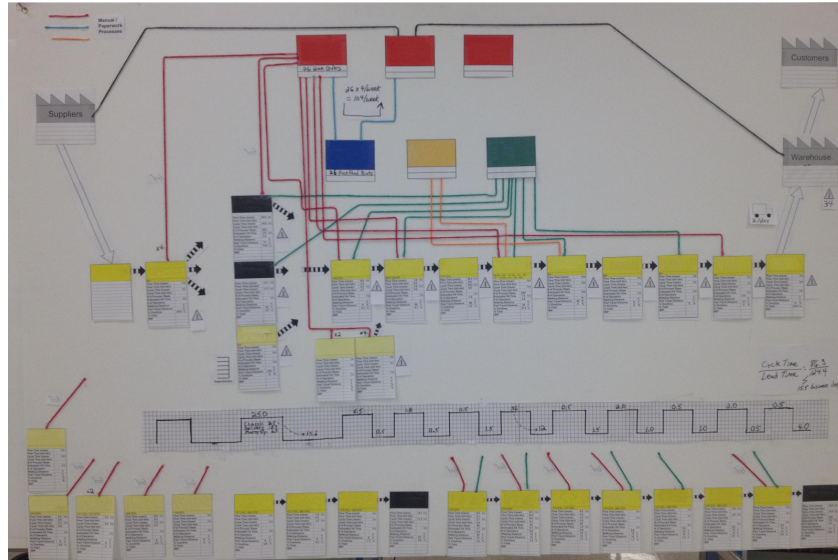


A production line for a complex system was analyzed using value stream mapping.

The client wanted the VSM constructed with minimal of disruption to the production line. Therefore, instead of using a kaizen event, the approach involved understanding the shop floor layout, creating spaghetti maps, analyzing process documentation, line employee interviews and data collection:

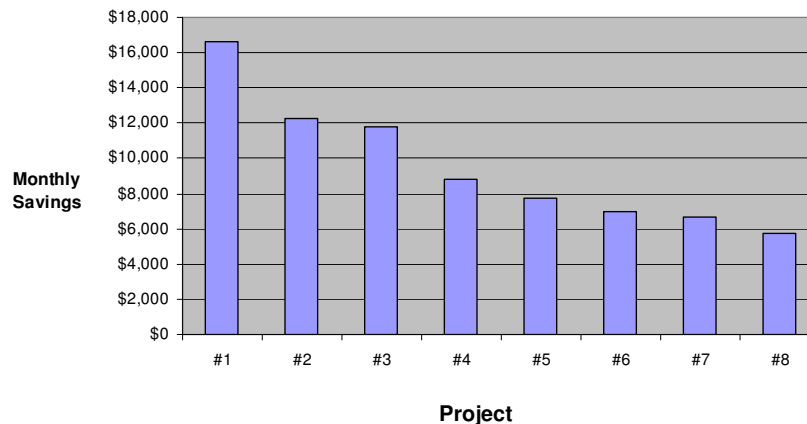


(Note: process block labels have been deleted, and data has been intentionally blurred)

Some unique considerations in constructing this map were:

- Data was entered into MS Excel to create the data boxes for individual process blocks. This enabled creation of a master table of data which facilitated analysis of process cycle time vs. lead time, bottlenecks, resource loading, etc.
- Production line metrics like line interruptions, time reporting and overtime data, build schedule (planned vs. actual) and rate of customer demand was also integrated into the analysis
- Colored string effectively shows several different categories of information flow

The analysis revealed improvement project priorities which included a series of kaizen events and green belt projects.



The VSM analysis identified \$919K per year of savings with prioritized and specific projects which provide the most benefit to the product line.