

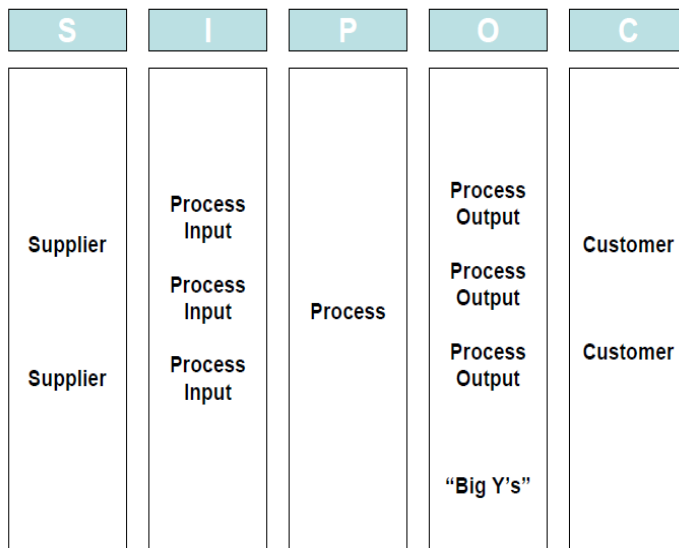
Six Sigma Basics - The Define Phase Part 2

STEPS TO DEFINE: In the last issue we discussed the phases of Six Sigma. There are 5 phases in the Six Sigma problem solving process. Each phase is crucial to the overall success of the project. This month, we will dive into the first phase of the Six Sigma process, the DEFINE phase. There are four main steps within the DEFINE process that ensure there is complete understanding of the project and process at hand. Those steps are: initiate the project, define the process, determine customer requirements, and define key process output variables.

The first step is to initiate the project. The main tool used to facilitate this process is the team charter, which ensures that there is alignment between the team and the management. This positioning gives the team the full support of management on any changes that need to be made during the project cycle. The team charter accomplishes the following objectives:

- Alignment with the company's strategic business plans.
- Clear Targets
- Clear Scope
- Clear Roles and Responsibilities
- Team Member Alignment with the Team Purpose

[Click here for a free download of our team charter template](#)



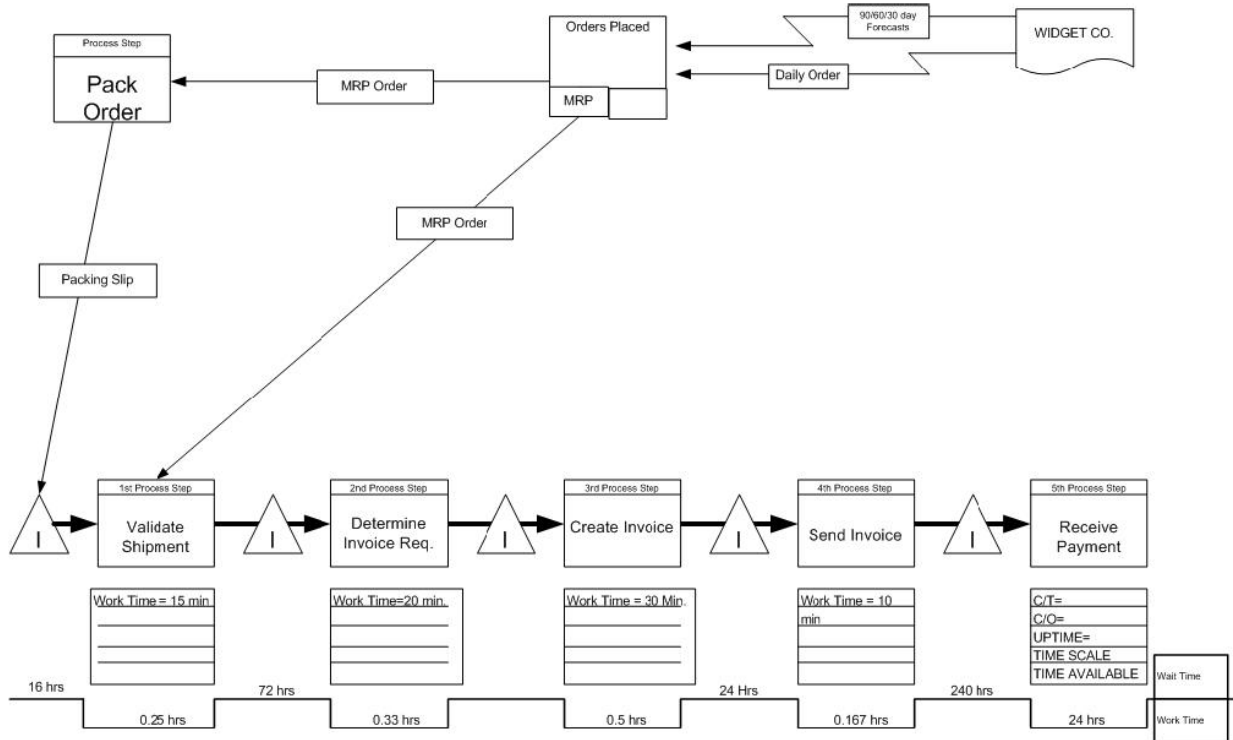
Once the project has been initiated and the team charter has been developed, the team can begin to define the process. Defining the process is crucial to the project because attempting to improve a process that isn't understood will lead to failure in most cases. Two common tools used to define the process are SIPOC Maps and Value Stream Maps. SIPOC Maps are used when only a process is being studied, while Value Stream Maps are used when an entire system is being studied.

S.I.P.O.C. stands for: Supplier, Input, Process, Output, and Customer. The process is mapped at a high level using this tool. The illustration to the left shows how the SIPOC map is developed.



VALUE STREAM MAP

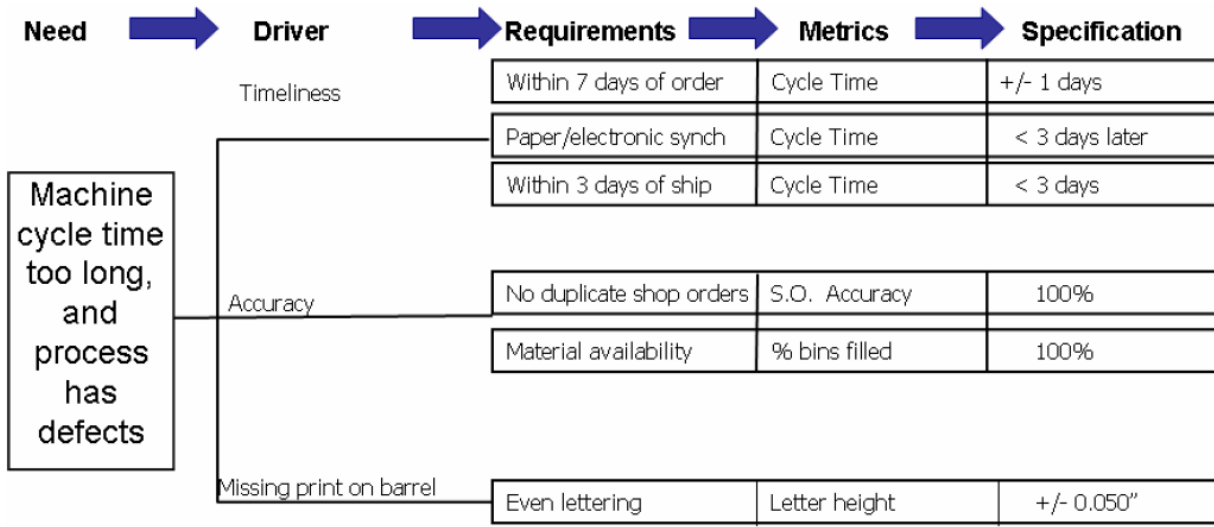
Value Stream Maps are used to provide a more detailed mapping of the system being improved. The Value Stream Map covers more information than a SIPOC map does and is used when the entire value stream is being studied versus a single process step. The example below shows the value stream for an invoicing system being mapped.



CUSTOMER FOCUS

The next step in the DEFINE phase is to define the customers' requirements. The customer can be an internal or external customer. We should always ensure the requirements are clear in order to satisfy the customers' expectations. Note that both the SIPOC and the Value Stream Map utilize a deep understanding of the customer. We also need to ensure we don't over-deliver on things that aren't important to our customers. By over-delivering, we are paying for value that isn't requested or required. There are several ways to understand the customers' needs. We can use interviews, surveys, focus groups, market in, or collaboration sessions with our customers. Once the customers' needs are determined, we can use a Customer Requirement Tree to develop our metrics. Below is an example of a Customer Requirement Tree for a printing process.





By understanding our customers' needs and translating them into specifications, we can now define our Key Process Output Variables (KPOV). In the case above, our process KPOVs are:

- Cycle-time
- Shop Order Accuracy
- % Bins Filled
- Letter Height

At the end of the DEFINE phase, we will have clear direction from management, understand the process, and understand our customers' needs from the process. Our next focus is to improve the process to meet those customers' needs. One should take a look at one's organization and ask the question, "Am I pleasing my customers both internally and externally?" If this question can't be answered with a resounding and confident YES, then there is a great opportunity to implement Six Sigma in said organization.

Stay tuned as we dive into the MEASUREMENT phase of the DMAIC process in our next issue. In the meantime, remember, "If you can't measure it, you can't improve it." We always question our measurement methods first, and that's part of the MEASURE phase.

Do you have long standing problems that have not been fully resolved? Do you struggle with engaging all people in effective problem solving? Are you struggling to fully satisfy customers due to quality issues and recurring issues? We offer foundational, intermediate, and advanced level problem-solving, including practitioner certifications. For a no-obligation introduction meeting, please contact Paul Eakle at paul.eakle@driveinc.com or 865-323-3491.

