

### Guide to SIPOC

Suppliers, Inputs, Process, Outputs, Customers

Project teams can use the SIPOC technique to help them summarise the input and output requirements for key project deliverables / products or services. It will help the collective team define and agree these requirements at the outset and will help to avoid unnecessary work being carried out or incorrect deliverables being produced.

#### So what does SIPOC mean?

SIPOC is just an acronym that describes the following steps in the process:

**This Guide** 

is full of 'how-to' hints & tips for using the SIPOC technique to deliver key project deliverables in a more effective manner and agree the outputs ahead of time with the customer



• The provider of inputs into your process

Materials, information and other resources needed to complete the process



• Each of the process steps used to convert inputs (above) into outputs (below)



Products or services resulting from the process



Recipient of the outputs and their requirements (what do they use it for)

#### A typical SIPOC Template



#### Inc. Suppliers, Customers & Process Step **Owners**

2. Identify the key stakeholders in that process

1. First choose a key product or service that you aim to deliver & agree the scope i.e.

where you intend to begin and end

How do I use this technique?

3. Gather those key stakeholders involved in the process and hold a SIPOC meeting

4. Map and agree the high level process or steps to deliver that product or service (4 or 5 steps max)

- 5. Identify and define the outputs (what and when) of the process with the customer/s
- 6. Identify and define the inputs (what and when) required for the process with the supplier/s
- 7. Discuss and agree who is responsible for the product or service and a method by which you will determine the delivery performance of that product or service

#### **SIPOC** is useful when it is not clear:

- Who supplies inputs to the process?
- What specifications are placed on the inputs?
- Who are the true customers of the process?
- What the expectations of the customers are?

# An example of how to apply the SIPOC technique

**Step 2** - Identify the key stakeholders in that process Inc. Suppliers, Customers & Process Step Owners

#### **Example:**

- HE Delivery team Inc. PM, APM & SES Specialists
- · HE Planning Team
- Delivery Partner Team Inc. PM, Planner and Discipline Leads

**Step 4 -** Map and agree the high level process or steps to deliver that product or service (4 or 5 steps max)

#### **Example:**

Agree and map the Key Process Steps and agree who the supplier and customer for each of those steps is **Step 1 -** First choose a key product or service that you aim to deliver & agree the scope i.e. where you intend to begin and end with the process

#### **Example:**

The PCF Stage 3 Schedule needs to be developed, agreed and approved by several key stakeholders. The starting point is a schedule of requirements and the end is an accepted P6 programme for stage 3



**Step 3** - Gather those key stakeholders involved in the process and hold a SIPOC meeting. The agenda can follow the steps outlined here.

#### **Example:**

The HE or Delivery Partner PM invite key stakeholders identified in step 2 to a meeting – shouldn't take longer than 2 hrs



**Step 5 & 6** - Identify and define the outputs (what and when) of the process with the customer/s & Identify and define the inputs (what and when) required for the process with the supplier/s

#### **Example:**

The output for process step 1 above, is to be agreed with the Delivery Partner PM and Planning Team who are the customer for the schedule. This conversation may cover the content and format of the schedule as well who is producing it and timing etc. The Input for this process step is the Stage Management Plan and Work Breakdown Structure as well as the various requirements set out in the Highways England Major Projects Directorate & RIP Planning & Scheduling Handbooks. Once you have completed the above exercise, you simply move to the next step

**Step 7 -** Discuss and agree who is responsible for the product or service and a method by which you will determine the delivery performance of that product or service

#### **Example:**

Jane Blogs will liaise with the Delivery Partner Planning Team and agree the content and delivery date for the schedule. Progress will be monitored through the weekly production meetings and the delivery date is set in the collaborative plan agreed by the whole project team.

When and where you can use this technique

The SIPOC technique can be used for the following:

- Agreeing key PCF products with HE Stakeholders both inside and outside the organisation
- Agreeing the input and outputs of a DCO submission
- · Agreeing the inputs and outputs for a specific construction activity with other trade suppliers
- SIPOC can be used at a very high level to agree general inputs and outputs for a whole scheme

We find it useful to use this technique at the beginning of any process that has multiple stakeholders involved. This is to ensure inputs and outputs are agreed from the outset. You should view this is an investment in time, as it will likely save time carrying out rework later and or avoid producing unnecessary information. This process can be used by each discipline lead to agree the inputs, process and outputs for their particular set of deliverables. For example, the Environmental Lead may use SIPOC to agree the input requirements for the Environmental Statement at their kick off meetina

**Links to 5 Lean Principles** 

SIPOC can be linked to the 5 Lean Principles of:

- Understanding value from your customers perspective
- Map the process to deliver that value (the value stream)
- · Create flow by removing wasteful steps
- · Respond to the pull of your customer with on-time in full delivery
- Pursue perfection and continuously improve



## ▲ Don't forget!

Lean Collaborative Planning and SIPOC go hand-inhand. Once it has been agreed what you are delivering and to whom, then the team can then allocate responsibilities using a RACI matrix and then assign delivery dates using the Lean Collaborative Planning Process.





Top Tips for the Successful application of SIPOC

- Invite the right people to attend the SIPOC meeting, after-all there is no point planning to do something that the customer doesn't want or the supplier cannot deliver
- When used in conjunction with Collaborative Planning and Visual Management it can help to establish solid foundations for successful product and project delivery