

To track and analyse the reasons for rework and quantify the loss incurred by the organisation

Case Study:

► OVERVIEW

1. **Customer:** Confidential/Withheld
2. **Business Challenge:** To reduce the man hours spent on rework
3. **Service Featured:** : Implementation of rework tracking register
4. **Business Process Involved:** Rework Tracking
5. **Benefits Realised:** Reduction in the rework and tracking the loss incurred
6. **Areas of Impact:** Project Controls

CHALLENGE

The Client Organization wants to develop a system for tracking the amount of man-hours, which is being wasted for rework in the project controls department.

The Client organization was using an earned value management tool which generates Cost variance, Schedule Variance, Cost Performance Index, Schedule Performance Index etc. Still the Project Managers were unable to make precise decisions with these reports as there were irregularities in the report.

SOLUTION

Development of a framework to allow Client track the amount of man-hours being wasted during the schedule development process in addition to identification of stakeholders that are responsible for creating rework and finally, quantifying the financial loss incurred.

INNOVATION

ProjCon has developed a rework tracking register which allows the planners to update the man hours every month to track:

1. The percentage contribution of rework- The Project, which is contributing more rework
2. Percentage of rework caused in the different phase of the project
3. Total Man hours spent on rework
4. The loss incurred by the company due to the rework

BACKGROUND

The Client Organisation was getting feedback from their Project Management staff that their man hours are wasted because of continuous rework. This made their staff frustrating and their efficiency started to degrade.

The top management wanted to find which stakeholder and which type of project is causing more rework so that it can help them to stream line those department by adding more staff or changing the project manager.

This task was assigned to ProjCon to come up with a solution which can help them in reducing the time and cost spent in rework of the schedules.

CHALLENGES & OBJECTIVES

- ▶ To identify the stakeholder responsible for causing maximum reworks
- ▶ To find out the percentage of reworks in each phase of the project. i.e. before the project kick off meeting, after kick off meeting and during the execution phase etc.
- ▶ The additional cost spent by the company due to this rework

ProjCon Advisory and Contribution:

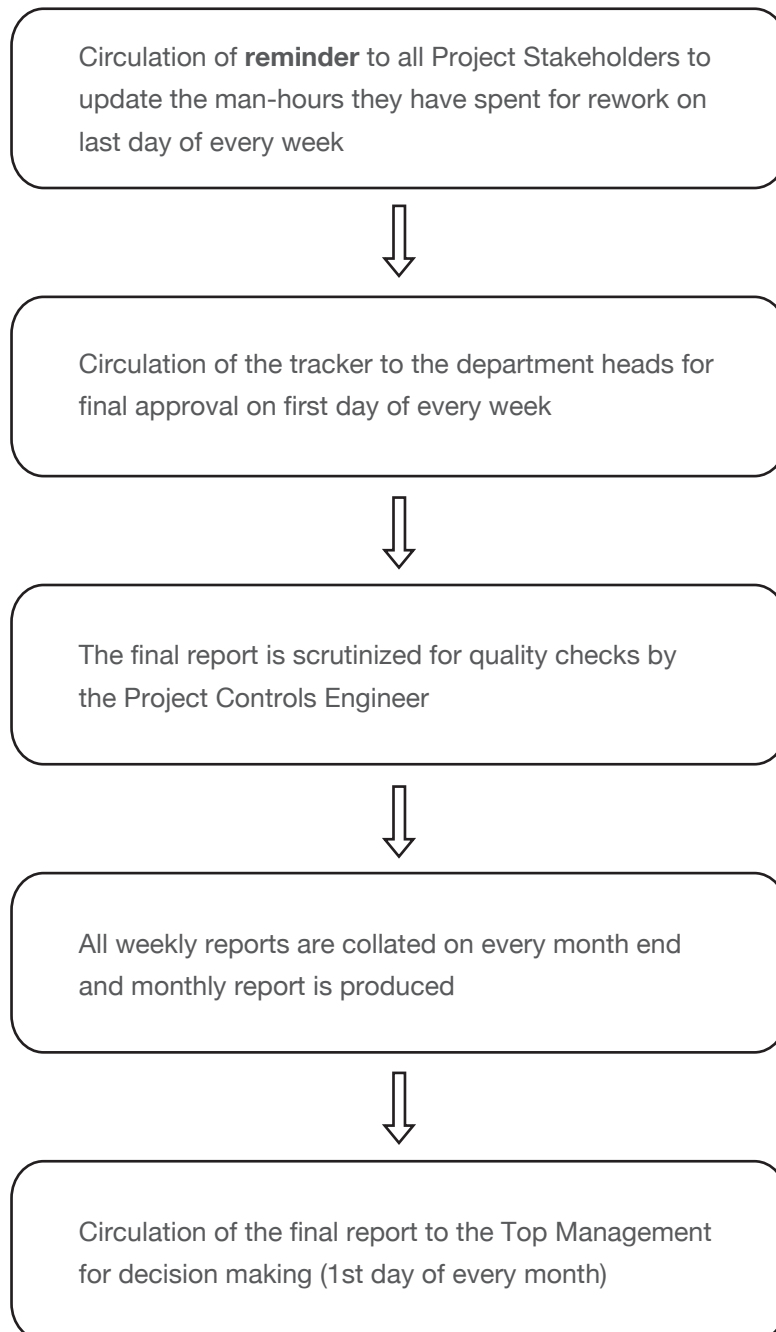
After scrutinizing the complete process, ProjCon developed a utility tool which has the cost of the each resource involved in the process. We have also split the projects into different portfolio, namely MEP Projects, Oil and Gas Projects, Water Treatment Plant Projects and Civil Construction projects. This was entered into the utility tool to track which schemes were causing more rework.

We have also created another utility tool for different stakeholders involved in the process, namely Estimators, Designers, Project Engineers, Construction Engineers, etc.

We have also created a utility tool by entering the different phases of the projects, namely before the project kick-off meeting, after kick off meeting, during the execution phase etc.

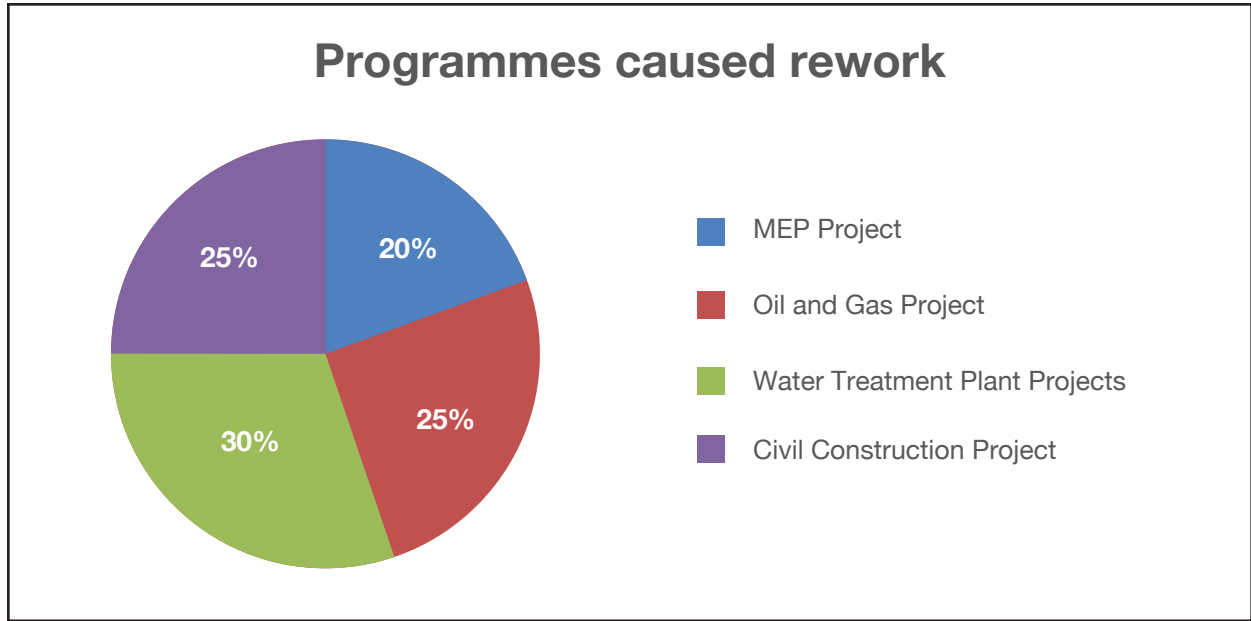
All employees were asked to update this register on weekly basis by entering the man-hours they spent in doing this reworks.

Process Created by ProjCon for Rework Tracking:

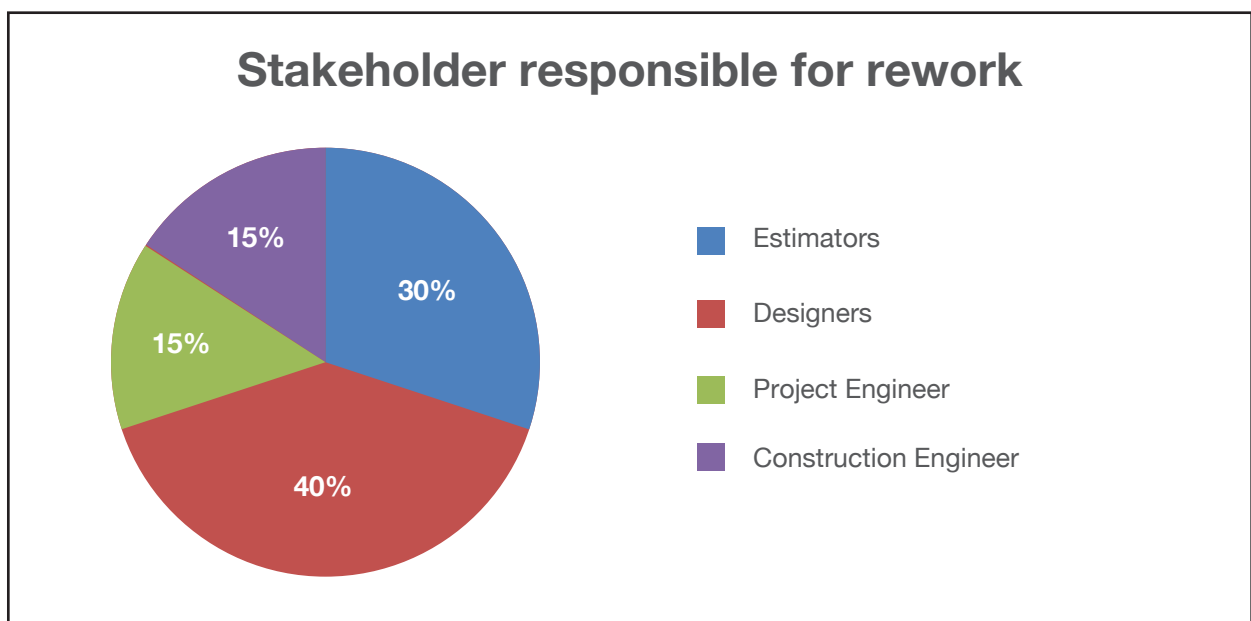


A sample output of the rework tracker tool is shown below:

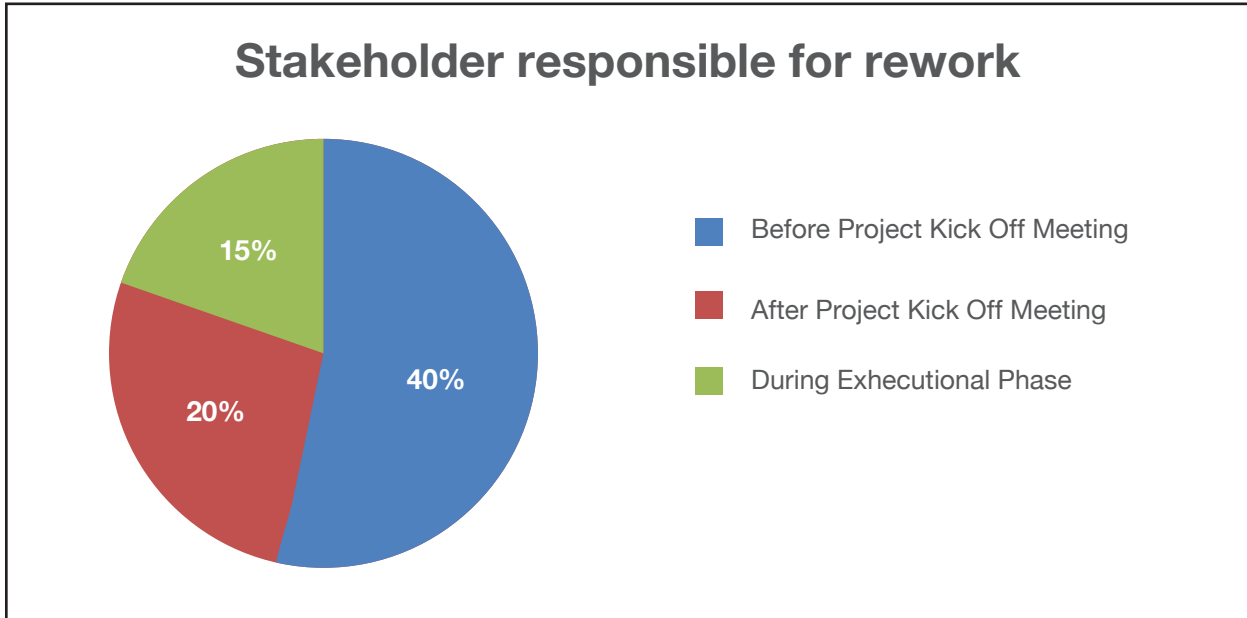
Department wise breakup of errors:



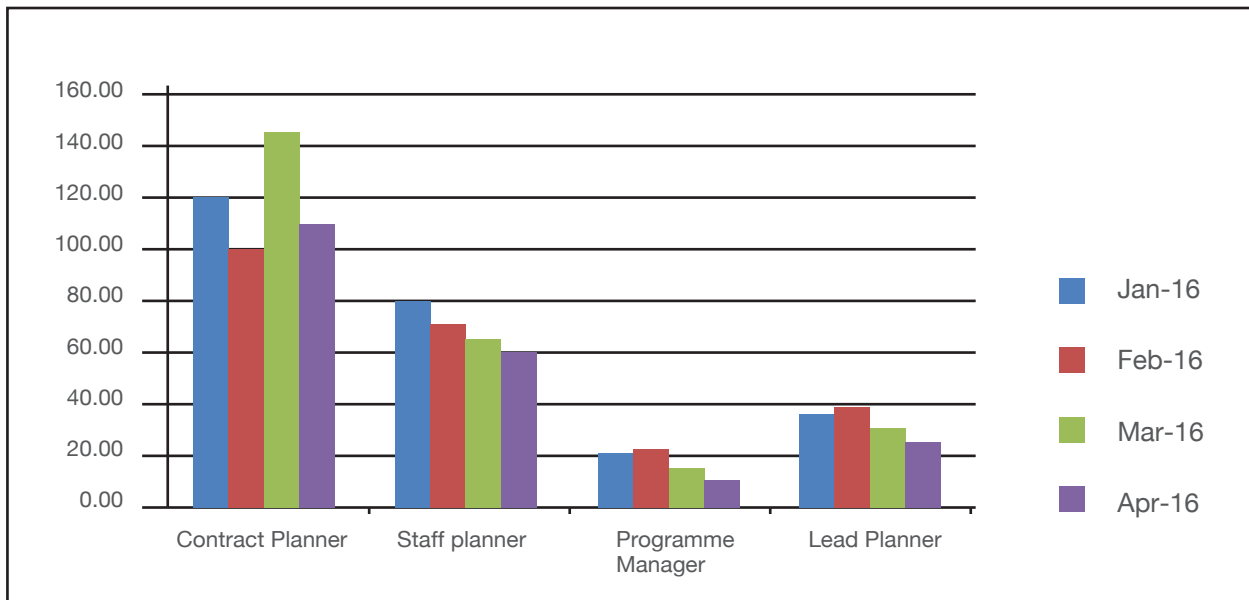
Percentage of rework contributed by different stakeholder in the process:



Percentage of rework caused in the different phase of the project:



Man-hours spent for the rework by the Project Controls Team:



Y Axis- Manhours

Client Benefit:

This report helped top management to find out the key areas, disciplines and phases where more man-hours were spent due to rework and the reason for these rework. This report gave the top management a focused approach to look for the key reason of rework and to act upon it. Within three month of implementation of this utility tool, top management were able to reduce the man hour spent on Key areas, discipline and phases by approximately 12% respectively which improved overall saving by 5% in the overall budget allocated for planning department.

This process helped the management to find out when and where the team strength is weakening and this also helped to reduce the man hours spent for rework. This process was highly appreciated by the client and they started following this in the other departments as well. The higher authority replied that this rework tracking is very useful for analysing the reason of rework and this will help to save 5% more cost in the overall budget in future.

This tracker is being used in the planning department, estimation department and in the assurance planning team as well.

ABOUT PROJCON GROUP

Projcon Group is exclusive, niche and rapidly growing Project Controls Consultancy offering innovative, advisory, implementation, technical and training support to our Clients. Our consulting services enable effective use of Project Controls technology, methods and practices for EPC (Oil & Gas, Power, Defense and Infrastructure) industry customers worldwide.

Our comprehensive array of products and services provide powerful, affordable solutions to virtually all aspects of the Project Controls. Contact us to find out how we can help you to build/strengthen your Project Controls capability.