

1-Day Workplace Design

Description

An organized approach to workplace design, using the principles of methods engineering and Systematic Layout Planning (SLP). Most appropriate when designing for manual activity in factories and warehouses, such as assembly, packing, or physical inspection. The methods presented are ideal for planning multiple instances of the same workplace or for production lines with many workstations. Also useful for refining detailed layouts and cell plans prior to installation.

Easily mastered by supervisors, lead workers, and operators, the techniques in this course will enable them to design their own workplaces with confidence and pride.

This course can be a useful adjunct to other training in ergonomics, housekeeping, and visual control.

Objectives

- To improve workplace productivity.
- To enable workers to take pivotal roles in workplace design projects.
- To improve the consistency, safety, and productivity of workplaces within a total work unit.

Who Will Benefit

- Manufacturing and industrial engineers
- Supervisors and team leaders
- Operators in plants and warehouses
- Cell planning and Lean Manufacturing teams

Timing

Duration: 1 day
(2 days with optional application day)
(2-day classroom version also available)

Start: 8:00
AM Break: 10:30
Lunch: 12:00 – 1:00
PM Breaks: 2:15 & 3:45
Adjourn: 5:00
(Optional Day 2: 8:00 - 5:00)

Course Outline

Day One

A. WELCOME AND INTRODUCTION

- Course outline and objectives.
- Definitions.
- Real-world examples of success.

B. ORGANIZING THE WORKPLACE DESIGN PROJECT

- Types of workplaces – manufacturing, office, service, other.
- Roles of people involved.
- An organized approach to workplace design.

C. MATERIALS ANALYSIS

- Defining the parts and materials involved.
- Parts handling and flow – to and from, and within the work area.
- How to present materials to the worker.

D. PROCESS ANALYSIS

- How to analyze manual methods.
- How to use process charts and diagrams.
- The impact of sequence on methods and work balance.

E. INTEGRATING THE DESIGN

- Workplace layout.
- Equipment design and selection.
- Safety and ergonomics.
- Quality, maintenance, and scheduling systems.
- Training for workers involved.

F. IMPLEMENTING THE DESIGN

- Evaluating alternative designs.
- Documenting the selected design.
- Standards/performance measurement/job evaluation/pay.

Optional Day Two Application

On Day Two, your team(s) will engage in guided application of workplace design methods to a workplace of your choice. The target stations or manufacturing cell should be selected ahead of time and our instructor should be given a brief tour early on Day One.