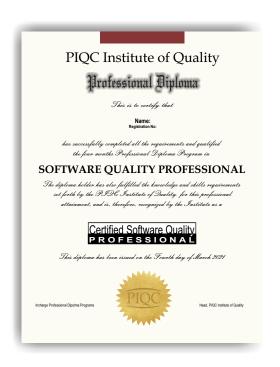




Certified Software Quality Professional

4 Months Weekend Based/Online Evening Based Professional Diploma in Software Quality Professional



A professional diploma program for Software Quality Assurance Managers and all those professionals interested in the field of Software Quality Assurance





Certified Software Quality Professional



Introduction

This is a 4-month weekend based program that provides a professional foundation in the field of Software Quality Management. It is a core program for Software Professionals and/or persons working in allied fields, providing thorough in-depth coverage. The qualified participant will be able to effectively perform Quality Control, Quality Assurance and Quality Management in their organizations and departments. It is a fundamental program for the professionals of every Software House or those working in Software/IT Departments. In order to ensure international compatibility of the course material, the body of knowledge is compatible to the Certified Software Quality Engineer (CSQE) of the American Society for Quality (ASQ), for which this course also prepares.

Intended Learning Outcomes

- To develop software professionals who understand Quality Assurance & Management in detail and are capable of ensuring excellent Quality in software products.
- 2. To create the core capabilities to implement software Quality Management tools.
- 3. To provide professional credential to Software professionals.

Admissions

Eligibility for admission in this program is graduation with 14 years of study in any discipline. Participants with relevant experience will be given preference.

Award of Certification

Qualified participants will be awarded with a Certification/diploma upon completion of course material, qualifying the exam, assignments/quizez and successfully completing the assigned project.

Course Material

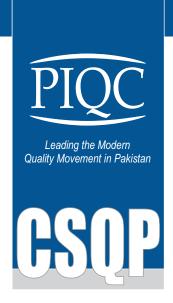
Course material, class notes and instructor slides will be provided to the participants in soft and hard form.

Teaching Strategies

This is a professional course and will involve a number of higher level teaching methodologies. The course is spread over three months to allow inter-session study. In this respect participants will have to carry out timely study, investigations, and assignments to grip the subject. Discussions in the class are focused on the key points, create critical thinking, share experiences of fellow professionals and build professional maturity.



Your best choice to become a Software Quality Professional



Project

The participants are required to submit real life projects on selected topics and tools, preferably from their organizations. The projects will be of a practical nature and should be completed within the stipulated time frames.

Faculty

The faculty is derived from a pool of qualified practitioners and academicians with sound track record and expertise in the relevant field.

Course Contents

Module 1: Strategic Quality Management:

Quality Management Strategies, QM Frameworks, Departmental Roles.

Module 2: Capability Maturity Model Integration – CMMI:

Introduction to CMMI, Overview of CMMI Levels/ Requirements, Implementation & Assessment, Exercise / Case Studies.

Module 3: Software Metrics & Measurement:

 $Measurement\,Theory, Analytical\,Techniques, Software\,Measurement\,, Project\,Metrics.$

Exercise (SRS).

Module 4: System & Software Engineering Processes:

Software Requirement Engineering, Software Requirement Management, Test Procedures, Software Requirement Specifications (IEEE SRS 830), Exercise (SRS).

Module 5: Software Testing, Verification & Validation:

Basic Concepts, Software Development Plan, Test Planning, Test Procedures, Test Products (IEEE 829), Exercise (Test Plan, Test Cases), Software Automated Testing.

Module 6: Analysis & Reporting Techniques:

Basics of Statistics, Metric reporting tools, Kiviat chart, Pareto Diagram, Cause & Effect Diagram, Histogram, Control Charts, Scatter Diagram, Problem solving tools, Route Cause Analysis.

Module 7: Software Configuration Management:

Configuration Infrastructure, Identification, Library processes, Configuration, Configuration Control & Status Accounting, Configuration Audits, Product Release and Distribution, Software Configuration Management (IEEE 828) – I & II.

Module 8: Program & Project Management:

Project Planning (IEEE 1058), Implementation, Tracking & Risk Planning.

Module 9: Lean Six Sigma:

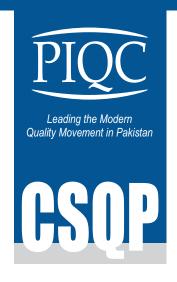
Fundamentals of Lean Six Sigma, Lean Six Sigma methodology.

Module 10: ISO 9001:2015 QMS:

ISO 9001:2015 Implementation, ISO 9001:2015 Implementation & Internal Auditing.







PIQC - Center for Excellence

Leading Institute in Pakistan providing academic programs, professional diplomas & certifications, short courses and corporate development in Quality Control (QC), Quality Assurance (QA) and Total Quality Management (TQM), Human Resource Management (HRM) and Health, Safety and Environment (HSE). Celebrating the 25th year of its establishment, PIQC vision is to see Pakistan a hallmark of Quality in the national and global environments. With its leadership and team of specialists, it has provided academic education and professional courses to more than 40,000 students and professionals. It is the pioneer and most authentic source for running International Six Sigma and Lean Manufacturing programs, including Six Sigma Yellow Belt, Six Sigma Green Belt and Six Sigma Black Belt in Pakistan.

PIQC has professional collaborations and linkages with various local and foreign organizations including Hamdard University, Superior University, NED University of Engineering and Technology, IQCS Certification, Singapore Quality Institute International (SQII), American Society for Quality (ASQ), and Quality and Productively Society of Pakistan (QPSP)

Degree Programs

Masters & MPhil in: Quality Management

Human Resource Management

> Industrial Management

> EHS Management

Professional Diploma

PIQC Diplomas/
Certifications in
Quality
Management
Project Management
Health Care
Quality Management
HSE Management
HR Management
Supply Chain
Management

International Certifications

Internationally Recognized Certifications

IRCA (UK)
Accredited
Certified ISO 9000
Lead Auditor

Certified Six Sigma Green Belt & Black Belt

Corporate Courses

Nation-wise seminars & workshops on Total Quality Management, Six Sigma, ISO 9000 Quality Assurance in Manufacturing, Services, Education, Banks and Healthcare, Total Productive Maintenance

International Conventions

PIQC has organized
13 International
Conventions
on Quality
Improvement
and
5 National
Conferences on
Quality Education
in Pakistan
since 1991

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