

COURSES on the best TOOLS for Reliability Engineering and INTEGRATION of Reliability Programs for Maximum Value

Public and In-House Courses presented by World Class experts.
In-House courses are customized and combined with other courses as required to meet client's goals. Courses cover principals, theory, and applications with lectures/workshops.



COURSES

- 1-5) **50 Ways to Improve Your Product Reliability**
 - 1) for Overall Program - Best "A-Z" course in Reliability
 - 2) in Concept Phase - Goals, metrics, plans
 - 3) in Design Phase - Analyses: Pred, FMEA, FTA, Thermal, DOE, etc
 - 4) in Prototype Phase - Tests: HALT, ALT, RDT, DVT, etc.
 - 5) in Manufacturing Phase - Processes: HASS, HASA, ORT, Tracker
- 6) **Reliability Techniques for Beginners** - Study key concepts: distributions, modeling, predictions, data analysis.
- 7) **Reliability Statistics** - Study sampling, hypotheses, confidence, and DOE.
- 8) **FMECA** - Use Failure Modes Effects and Criticality Analysis to develop Risk Management Programs.
- 9) **CRE Exam Preparation** - Preparation for passing the ASQ Certified Reliability Engineer Exam.
- 10) **CQE Exam Preparation** - Preparation for passing the ASQ Certified Quality Engineer Exam.
- 11) **Design for Reliability (DfR)** - Learn the building block tools for reliability during the concept & design phase, including when/how to use.
- 12) **Design for Manufacturability (DfM)** - Learn what tools are needed to produce great products with high quality.
- 13) **Design for Testability (DfT)** - Learn about Stress-strength and failure of materials and electronics, variation and reliability, Design analysis & more.
- 14) **Design for Warranty Cost Reduction (DfW)** - Introduces a proven warranty event cost model that helps identify warranty cost red. solutions
- 15) **Design for 6 Sigma (DfSS)** - Powerful problem solving methodology aimed at tackling core product development issues
- 16) **Design for 'X' (DfX)** - Learn about the best of "Design for" disciplines.
- 17) **Mechanical Design for IC Packaging** - We shall explore the best tools and techniques to use at the IC Packaging Level
- 18) **Design of Experiments (DoE)** - Includes basic statistics behind a DOE as well as a workshop in which we perform a DOE on a specific product.
- 19) **HALT and HASS Application** - Specifically targeted for those with an education in HALT/HASS to show how to apply techniques on products.
- 20) **Statistics for 6 Sigma** - This hands-on course focuses on the essential statistical tools for implementing your Six Sigma program.
- 21) **Fundamentals of Climatic Testing** - Review the different types of climatic tests—temperature, humidity, altitude, rain, solar, salt/fog, & more
- 22) **Design for Vibration and Shock** - Highlights the different types of vibration tests and different type of equipment and fixtures.
- 23) **Software Design for Reliability** - Highlights "best practices" in S/W Rel. and explains their application & positive impact to each of the development life cycle phases: Concept, Design, Implementation, & Testing.
- 24) **Reality of Pb-Free Reliability** - Looks at Restriction of Hazardous Substances (RoHS) from a reliability perspective, identifying known risks
- 25) **Root Cause Analysis** - Looks at RCA from a system and component level, identifying best tools, 5 Whys approach, 8 Step process, & FRACAS.
- 26) **Statistical Process Control** - Presents valuable tools to assist in evaluating process variations and to make sound decisions based on your data.
- 27) **Innovative Problem Solving** - Looks at advanced problem solving strategies and their application to business and technological systems.
- 28) **Mechanical Design for Reliability** - Learn about FEA, Tolerance/Worst Case Analysis, Probabilistic Design Systems, and Fatigue and Fracture.
- 29) **Applied Data Analysis** - Useful set of statistical tools for both manufacturing operations and analytical tools for research.
- 30) **Design for Safety** - Dramatic savings through creative design practices focusing on inherent product risks early in the design process and on ways to minimize each risk factor.

2012 PUBLIC OFFERINGS

CRE Exam Preparation Course

One night/week for seven weeks, \$1295/seat

Jan 17 - Feb 28, Santa Clara CA

Aug 14 - Sep 25, Santa Clara CA

CQE Exam Preparation Course

One night/week for seven weeks, \$1295/seat

Apr 17 - May 29, Santa Clara CA

Oct 16 - Nov 27, Santa Clara CA

2012 Reliability Symposium

May 7-11 in Santa Clara, California

TRACK ONE - DFX TOOLS

- Design for Reliability (DfR): May 7-8
- Design for 6 Sigma (DfSS): May 9
- Design for Mechanical Reliability (DfMR): May 10
- Design for Warranty (DfW): May 11 morning
- Design for Software Reliability (DfS): May 11 afternoon

TRACK TWO - REL TOOLS: ALT/DOE/RCA

- Design of Experiments (DOE): May 7-8
- Best Accelerated Reliability Tests (BART): May 9-10
- Root Cause Analysis (RCA): May 11

PRICING AND TERMS

Class Prices: Two day=\$1195, One day=\$695, half day=\$395

Group Discounts: Every 5th registrant is FREE

Unemployed/Employees paying themselves=25% off

Full time students=50% off

All are available via webinar for a 25% discount.

Payment: PO, Check, or Credit Card in advance

IN-HOUSE COURSES

We offer all our courses in-house & fully tailored to your industry, using examples from your company, including workshop exercises

We can even set up to help you solve a problem with the reliability technique we are teaching.

Contact us for In-House pricing

CONSULTING SERVICES

- Set reliability goals with a Reliability Program Assessment
- Estimate a design's reliability with MTBF predictions
- Establish risks associated with failures using - FMEA
- Evaluate design tolerances with DOE
- Maximize product robustness with HALT and HASS
- Understanding Life Limiting Elements with ALT
- Determine root cause of test/field failure with RCA
- Produce bug free code with Software Reliability services.