



The Basics and Benefits of ASQ Certification



Greater New Orleans Section 1518
October 10, 2006

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Presentation Topics

- **Meaning of Certification**
 - **Cost Benefits Analysis...**
- **History and Types of the ASQ Certs**
- **Brief Description of each Program**
- **Benefits- Professionally and Economically**
- **Exam Development Process**
- **CPD and Recertification**



What is ASQ Certification?

A formal recognition by the Society that an individual has demonstrated comprehension of and proficiency within a specified body of knowledge having met this standard at a point in time



ASQ Certification

- **Internationally accepted and recognized for excellence for over 35 years**
- **Endorsed by over 125 corporations**



ASQ Certification Attributes

- **Peer recognition**
- **Personal development**
- **Marketplace competitiveness**



Personal Benefits of Certification

- **Gain new skills and upgrade proficiency**
- **Source of professional and personal confidence and pride**
- **Structured approach to your career educational requirements**
- **Increased earnings potential**



Economic Benefits of Certification- ASQ 2006 Salary Survey

Money Matters

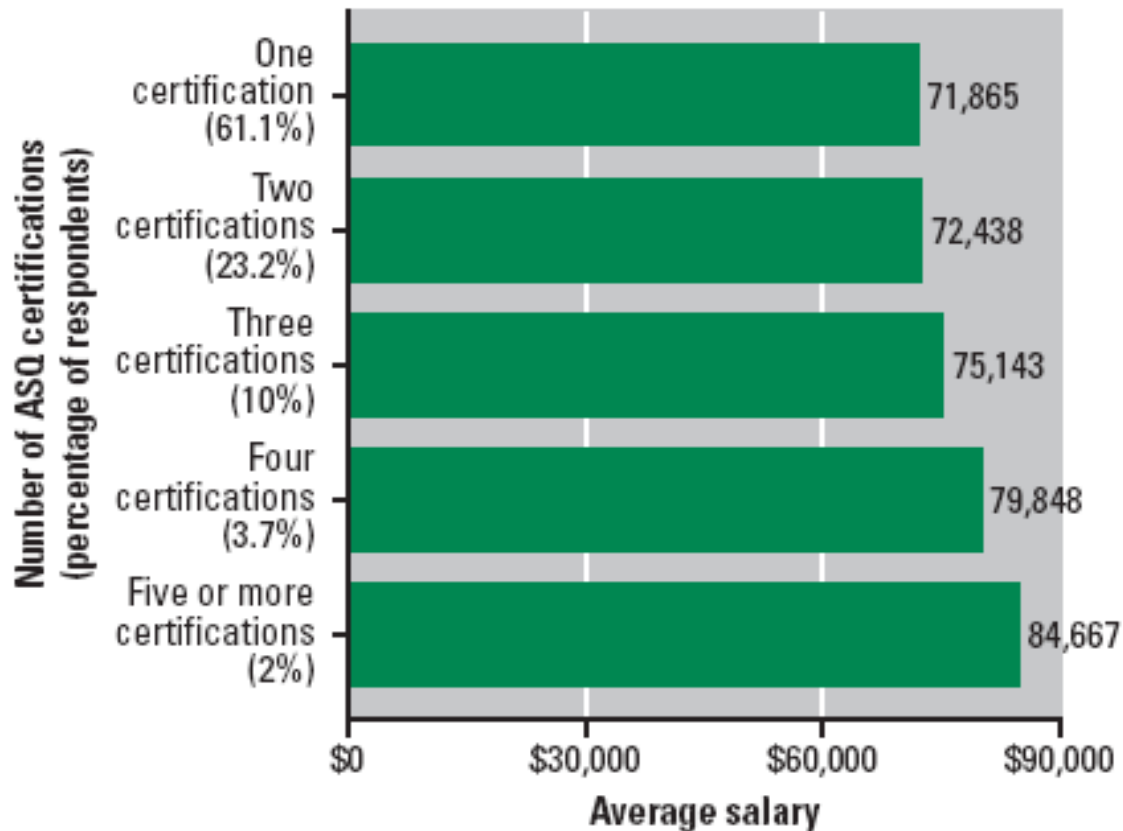
U.S. respondents who are ASQ certified earn an average salary of \$72,880, whereas their uncertified counterparts earn an average salary of \$71,744 .

http://www.asq.org/pub/qualityprogress/salary_survey/



Economic Benefits of Certification

FIGURE A Salary by Number of ASQ Certifications For U.S. Respondents



Reference:
2006 ASQ
Salary Survey
Section 4



Salaries by ASQ Certifications

Reference:
Table A 2006 ASQ Salary Survey Section 4

Job title	United States		Canada (Canadian dollars)	
	Average salary	Difference	Average salary	Difference
Associate				
No ASQ certification	\$54,012		—	
Certified quality improvement associate	42,833	-\$11,179	—	—
Auditor				
No ASQ certification	\$55,591		\$52,989	
Certified quality auditor	60,583	+\$4,992	64,911	+\$11,922
Certified quality auditor—biomedical	75,000	+19,409	—	
Certified quality auditor—HACCP*	68,000	+12,409	—	—
Black Belt				
No ASQ certification	\$76,562		\$85,000	
Certified Six Sigma Black Belt	80,525	+\$3,963	80,000	-\$5,000
Inspector				
No ASQ certification	\$43,017		—	
Certified mechanical inspector	42,858	-\$159	—	—
Manager				
No ASQ certification	\$72,864		\$74,369	
Certified quality manager	82,412	+\$9,548	75,485	+\$1,116
Quality engineer				
No ASQ certification	\$62,494		\$57,982	
Certified quality engineer	67,304	+\$4,810	57,806	-\$176
Reliability/safety engineer				
No ASQ certification	\$76,093		—	
Certified reliability engineer	86,046	+\$9,953	—	—
Software quality engineer				
No ASQ certification	\$80,513		\$63,000	
Certified software quality engineer	83,881	+\$3,368	65,000	+\$2,000
Technician				
No ASQ certification	\$39,625		\$39,607	
Certified calibration technician	55,715	+\$16,090	—	—
Certified quality technician	41,668	+2,043	42,429	+\$2,822



Benefits of Certification to the Society

- **Mark of technical excellence**
 - **Standardization in Disciplines of Quality Professionalism**
 - **Provides currency with emerging technologies**
- **Assures product and service quality**



Value to Membership

**Certification has been
rated as one of the top-
three valued benefits of
ASQ membership since
1991**



Benefits of Certification to Companies and Organizations

- **Investment in the company's most valuable asset- it's employees**
- **Assures proficiency and employee development**
- **Assists in perfecting and deploying proven techniques in the workplace**
- **Provides competitive advantage in the marketplace**
- **Improves customer relations and loyalty**



Certification Programs

- **Currently there are 14 ASQ Certifications**
 - **Six Auditing and Engineering Related**
 - **Eight Managerial, Technical and Associate Certifications**

<http://www.asq.org/certification/index.html>



History of Certification

... Certified Quality Engineer	1968
... Certified Quality Technician	1970
... Certified Reliability Engineer	1972
... Certified Mechanical Inspector	1984
... Certified Quality Auditor	1987
... Certified Quality Manager	1995



History of Certification Programs

... Certified Software Quality Engineer	1996
... CQA-Hazard Analysis and Critical Control Point (HACCP)	1999
... Certified Quality Improvement Assoc	2000
... Six Sigma Black Belt	2001
... CQA-Biomedical	2002
... Certified Calibration Technician	2003



History of Certification Programs

- ... Certified HACCP Auditor
Replaces CQA-HACCP** **2004**
- ... Certified Quality Process Analyst** **2005**
- ... Certified Biomedical Auditor
Replaces CQA-Biomedical** **2005**
- ... Certified Manager of Quality/
Organizational Management** **2006**
- ... Certified Six Sigma Green Belt** **2006**



How to Become Certified

1. **Become a member (voluntary)**
 - Nonmember can apply but requires proof of professionalism
2. **Identify the Certification that is right for you: [ASQ Certification Link](#)**
3. **Acquire needed Education and Experience**
 - ✓ Obtain the Study Guides and learn the discipline's Body of Knowledge
4. **Apply for and pass the Certification Examination**



Certification Programs

- **Quality Engineer (CQE)**
 - Principles of product and service quality evaluation and statistical process control (SPC)
- **Reliability Engineer (CRE)**
 - Principles of performance evaluation for product/systems safety, reliability and maintainability
- **Quality Auditor (CQA)**
 - Standards and principles of auditing, interviews, evaluations, and reports for quality system adequacy



Certification Programs

- **Quality Technician (CQT)**
 - Quality problem analysis, inspection sampling plans, SPC applications
- **HACCP Auditor (CHA)**
 - Developed to test applicants knowledge of the Hazard and Critical Control Point (HACCP) standards.
- **Quality Inspector (CQI)**
 - Hardware documentation, lab and calibration procedures, inspection, process performance, data collection and reports



Certification Programs

- **Software Quality Engineer (CSQE)**
 - Development of software processes, measurement, verification and validation, analytical methods, and quality management
- **Manager of Quality/Organizational Excellence (CMQ/OE)**
 - Champions process improvement initiatives, supports strategic planning and deployment initiatives
- **Quality Improvement Associate (CQIA)**
 - Basic knowledge of quality tools and their uses and involved in quality improvement projects



Certification Programs

- **Six Sigma Black Belt (CSSBB)**
 - Designed to demonstrate competency in the use of Six Sigma methodologies
- **Biomedical Auditor (CBA)**
 - Understands the principles of standards, regulations, directives and guidance for auditing a biomedical system
- **Calibration Technician (CCT)**
 - Tests, calibrates, maintains, and repairs electromechanical, analytical, and electronic measuring instruments and equipment for conformance to established standards



Certification Programs

- **Quality Process Analyst (CQPA)**
 - A paraprofessional who analyzes and solves quality problems and is involved in quality improvement projects
- **Six Sigma Green Belt (CSSGB)**
 - A paraprofessional who works with process development, and documentation, collect and summarize data, creates and interprets multi-variant studies



Number of Certifications Issued

As of June 2006

CQE	50,178
CQA	35,621
CQT	20,542
CQI	11,971
CMQ/OE	10,009
CRE	5,961



Number of Certifications Issued

As of June 2006

CSSBB	4,937
CQIA	4,653
CSQE	3,654
CCT	640
CHA	368
CBA	281
CSSGB	246
CQPA	109



Exam Development Process

- How the Certifications Exams are developed
- Opportunities to participate in the certification program development at the national level



Initial Activities Exam Development Process

- Division comes forward with an idea for a certification program**
 - ✓ Obtains from Certification Board approval of the concept**
 - ✓ Conducts marketing study to determine potential market.**
 - ✓ Contracts with outside measurement expert to conduct job analysis.**



Job Analysis Preparation

- Survey Developed with help from an Outside Measurement Expert
 - Literature Search
 - Subject Matter Experts
 - Advisory Committee*
 - Survey Review Panel
- Advisory Committee identifies
 - Typical job responsibilities (what people do on their job)
 - Knowledge base required (what people need to know in order to perform their job)

* Advisory committee uses the results of the survey to rate each item in terms of criticality (how important is this task and knowledge) and frequency (how often is this task performed or knowledge used).



Job Analysis Conducted

- **Job Analysis Survey:**
 - **Mailed to 2000 individuals**
 - **Results summarized**
 - **Results approved by sponsoring division**
 - **Certification Board Approval**

Item Writing

BOK Committee

Determines number of questions in each area, based on the importance of the topic as well as the depth of testable material

- 12-15 subject matter experts trained in item writing 2 day workshop
- Items written in each area of the Body of Knowledge
- 450+ items developed during 2-3 day session



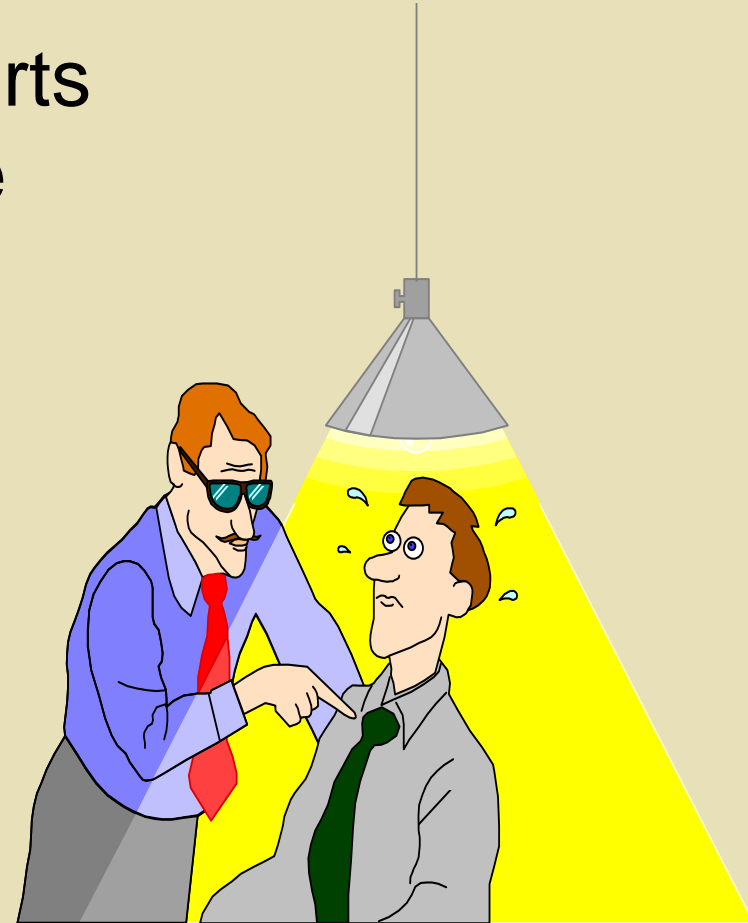
Item Review

- One 2-day Workshop per Year
- 12 Subject Matter Experts review each question for:
 - Accuracy
 - Clarity
 - Appropriateness
 - Diversity



Exam Review

- 12 subject matter experts take each exam before formal administration
- Every item on exam is reviewed once more
- Entire exam flow is reviewed



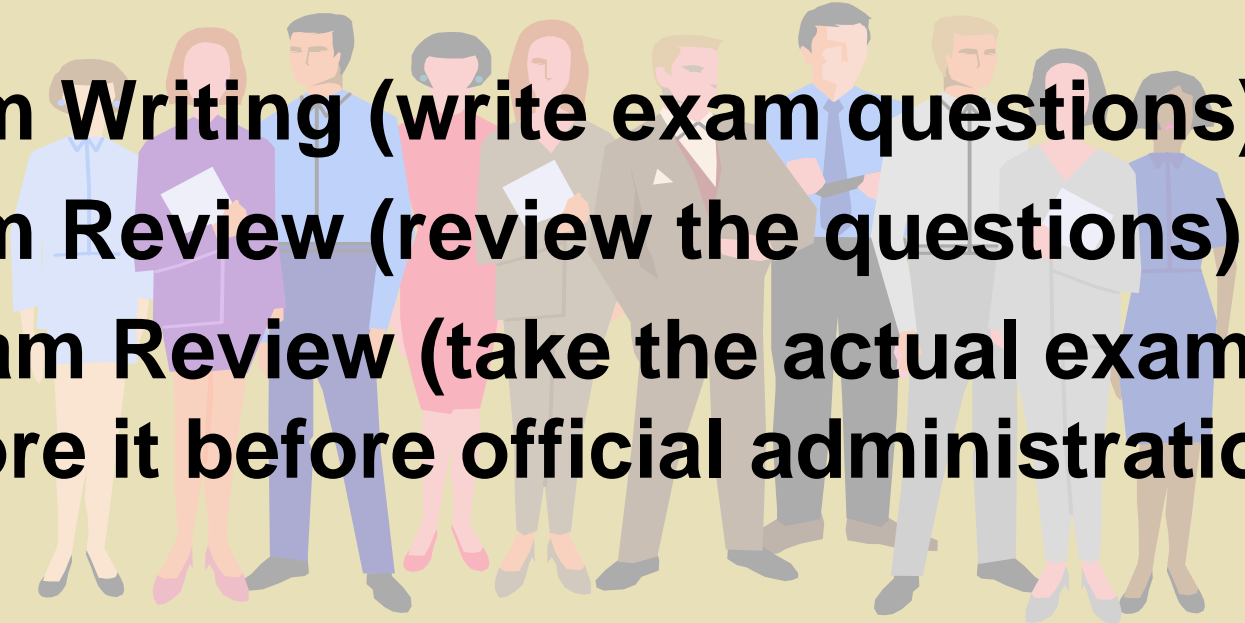


Volunteering *

** Over 50 volunteers participate in the development of each exam*

Workshops Opportunities

- **Item Writing (write exam questions)**
- **Item Review (review the questions)**
- **Exam Review (take the actual exam & score it before official administration)**





Benefits of Volunteering

- 1 Recertification Unit per day of workshop
- Reinforce and expand subject knowledge
- Learn new Techniques from other Professionals
- Peer Networking
- Visit ASQ HQ to Meet the Certification staff
- Expenses Reimbursed



How to Volunteer

- Contact Certification Office at ASQ HQ at 1-800-248-1946
- Contact Division Liaison responsible for any specific exam



ASQ Recertification

Recertification verifies that you have maintained the same knowledge level you demonstrated when you originally passed the exam



Who Has to Recertify?

CQE

CQA

CRE

CSQE

CSSBB

CCT

CHA

CBA

CMQ/OE

*Since 1999 New Orleans Section has processed
58 Recertifications by 40 different members*



Continual Professional Development (CPD)

It's Easier than you think!

In a recent survey of people who had recertified, 96% said that the recertification program is very easy and understandable to use.



Recertification Requirements

- **18 Point, 3 Year Program**
 - Recert Units (RUs) over three years
- **10 Activities Qualify for RUs**
- **Credits earned through:**
 - Employment
 - Professional Development
 - Education
 - Society Involvement



10 Areas for Earning RUs

1. Professional Development
2. Employment
3. Instructor
4. Student
5. Meeting
6. Committees
7. Certifications
8. Proctoring
9. Electronic Media
10. Publishing



How to Earn Recert Units

- **Employment**
 - **Full or Part Time credit**
 - **Professional Development ***
 - **Examples include: Seminars, Workshops, and Conferences**
- * CEU's awarded*



18 RU Credits Needed Over 3 Year Period

- **Instructor ***

- Company internal instructing
- College, university instructing
- ASQ exam refresher course instructing

** Instructing must be above and beyond your regular job duties and requirements to qualify*



18 RU credits Needed Over 3 Years!

- **Education (Student Activity)**
 - Company-sponsored in-house courses (computer skills, team building, etc.)
 - University/college courses
 - ASQ-sponsored courses
 - Includes Computer Based Training and other Electronic media delivery



You Only Need 18 RU Credits Over 3 Years!

- **Society Involvement**

- Exam Proctor
- Meeting/workshop attendance
- Committee member
- Officer (national, division, section)
- Professional Publications



Example Calculation *

Full-time employment	10.8 RU
ASQ 3 day workshop	3.0 RU
Company sponsored Training	4.0 RU
Section Meetings (2 Mntgs/yr)	<u>2.7 RU</u>
	20.5 RUs

** More details are provided in the Recertification Journal available online*



ASQ Section 1518 Website



Home | Documents

<http://groups.asq.org/1518>



Greater New Orleans Section 1518

Home

Quick Launch

- Shared Documents
- General Discussion
- Contacts
- Tasks
- Presentations
- Recertification Information
- Customer Measurement Survey Results
- Education Opportunities
- Scholarships
- Graphics and Pictures
- Branding
- Job Opportunities
- Section Newsletters
- Awards

Search Documents

Go

The Leadership Team SharePoint Web Site of Section 1518 in Region 15 of the American Society for Quality

Events

[Add new event](#)

10/10/2006 6:00 PM [Section Dinner Meeting and Presentation](#) NEW
 Topic: The Value of ASQ Certifications - How the body of knowledge can increase your company profit and according make you money
 Speaker: J.M. Drake
 Mr. Drake is our ASQ Certification Chair and is a licensed professional engineer and has served as...

Announcements

[Add new announcement](#)

Look Ahead Schedule Posted

by ASQ-SP\jmdrake

10/4/2006 7:32 AM

The 2006-07 Section 1518 Look ahead Schedule is posted in the shared documents folder.

ASQ Newsletters

[Add new document](#)

File Name	Modified By
ASQwire Oct 4 2006	ASQ-SP\jmdrake

Job Opportunities

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File Name	Modified By
QA Auditor Position Description	ASQ-SP\jmdrake
Re Job Posting	ASQ-SP\jmdrake

Shared Documents

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File Name	Modified By
Meeting Schedule Sept 2006-June 2007	ASQ-SP\jmdrake
ASQ Section 1518 Minutes 2006-09-13	ASQ-SP\BLaird
ASQ1521MeetingAnnouncement2006-08-10	ASQ-SP\jmdrake
ASQ Section 1518 Audit Committee 2006-07-31	ASQ-SP\BLaird
ASQ SECTION 1518 MEETING NOTICE MAY 2006	ASQ-SP\BLaird
ASQ Section 1518 Min 2006-04-11	ASQ-SP\BLaird
ASQPresidentsMsg_RequestSptBaldrige	ASQ-SP\jmdrake
Performance Oriented Leadership Dec 15 2005	ASQ-SP\jmdrake
ASQ NO CQA Trng Course Announcement	ASQ-SP\jmdrake
ASQleadershiptrainFlyerJuly2005	ASQ-SP\jmdrake
2005-06 ASQ Section 1518 Officers Chairs	ASQ-SP\jmdrake
ASQ New Orleans Section 1518 December Meeting Notice Dec 14 2004	ASQ-SP\jmdrake
ASQ_Level2_Sections	ASQ-SP\jmdrake
Business Plan Section 1518 2004-05	ASQ-SP\jmdrake
TotalQualitySectionsAnnouncement2003-04	ASQ-SP\jmdrake
ASQ Section 1518 Minutes20Jul2004_Board	ASQ-SP\NOLA_Sec_1518

Links

[Add new link](#)

- [Louisiana Quality Foundation](#)
- [ASQ Section Leader Discussion Board](#)
- [Cincinnati Ohio's Section Website](#)
- [Self Directed Learning](#)
- [ASQ SharePoint Site Index](#)
- [SharePoint Training](#)
- [Make Good Great Website](#)
- [Customer Comment](#)
- [ASQ Policies & Position Descriptions](#)
- [ASQ eSection](#)
- [New Orleans Section 1518 Mini Web](#)
- [Article- Customer College Teaches Quality Service](#)
- [Industry Week Article on Baldrige Criteria](#)
- [Certification Sharepoint Site](#)
- [Baldrige Award Article](#)
- [QMS Software Solutions](#)
- [ASQ National & Members Only](#)
- [Section Volunteer Community](#)
- [Baton Rouge Section 1521](#)
- [Everything New Orleans](#)
- (More Links...)



Summary and Conclusion

- **Benefits**
- **Certification Programs**
- **How to Get Certified**
- **Exam Process- How to Volunteer**
- **Recertification and Continuing Professional Development**



Contact Information



ASQ National (800)-248-1946

or

Section Chair: (504) 734-4446

ReCert Chair: (504) 669-3370

Online Information:

www.asq.org

<http://groups.asq.org/1518>