

A (Software) Process Bibliography

Updated 27 January 2009

This bibliography was developed for people interested in learning more about software process management. It is neither authoritative nor exhaustive and should not be construed as an endorsement for any of the books and papers that may be referenced. In some cases, papers listed present diametrically opposed perspectives and are included to provide a balanced view of the issues. Some papers take radical stances that may inspire useful discussion.

Please send suggestions and corrections to Mark C. Paulk at Mark.Paulk@ieee.org.

Web resources that you may find of interest include:

- Crosstalk: The Journal of Defense Software Engineering — <http://www.stsc.hill.af.mil/crosstalk/>
- Maturity Profile Presentation — <http://www.sei.cmu.edu/sema/profile.html>
- Practical Software Measurement — <http://www.psmc.com/>
- Project Management Institute — <http://www.pmi.org/>
- Published SEI Appraisal Results — <http://seir.sei.cmu.edu/pars/>
- Software Program Managers Network — <http://www.spmn.com/>

TABLE OF CONTENTS

General.....	4
Total Quality Management.....	4
Decision Making	5
Software Engineering	5
Software Problems	6
ISO 9000.....	6
Agile Methodologies	7
Measurement	8
Software Process	8
Capability Maturity Model for Software & CMM Integration.....	9
Software Process Appraisals	10
SEI and Process Criticism	11
Case Studies of Software Process Improvement	11
Sourcing and Service Science	13
People and Culture	13
Organizational and National Cultures	13
Teams.....	14
People Issues.....	14
Innovation and Creativity.....	15
Project Focused.....	15
Requirements Management	15
(Software) Project Planning.....	15
(Software) Project Management.....	16

Customer-Supplier Relationship (Acquisition, Customer Satisfaction) ...	17
(Software) Quality Assurance	17
(Software) Configuration Management.....	17
Organizational Learning and Process Management.....	18
Process Focus and Definition	18
Training	18
Risk Management	19
Integrated Product and Process Development	19
Software Engineering	19
Peer Reviews and Inspections.....	20
High Maturity.....	21
Statistical Process / Quality Control.....	21
Process Modeling and Simulation.....	22
Product Knowledge Management.....	22
Causal Analysis and Defect Prevention.....	23
Organizational Change Management	23

GENERAL

J.C. Collins and J.I. Porras, **Built to Last**, 1994.

J.C. Collins, **Good to Great**, 2001.

S.D. Levitt and S.J. Dubner, **Freakonomics, Revised and Expanded Edition**, 2006.

J. Micklethwait and A. Wooldridge, **The Witch Doctors: Making Sense of the Management Gurus**, 1996.

J. Pfeffer and R.I. Sutton, **Hard Facts, Dangerous Half-Truths, & Total Nonsense: Profiting from Evidence-Based Management**, 2006.

J. Pfeffer, **What Were They Thinking? Unconventional Wisdom About Management**, 2007.

N.N. Taleb, **The Black Swan: The Impact of the Highly Improbable**, 2007.

M. Treacy and F. Wiersema, **The Discipline of Market Leaders**, 1997.

K.E. Weick and K.M. Sutcliffe, **Managing the Unexpected: Assuring High Performance in an Age of Complexity**, 2001.

Total Quality Management

F.W. Breyfogle III, **Implementing Six Sigma: Smarter Solutions Using Statistical Methods, Second Edition**, 2003.

P.B. Crosby, **Quality is Free**, 1979.

T.H. Davenport, "The Coming Commoditization of Processes," *Harvard Business Review*, June 2005, pp. 101-108.

W.E. Deming, **Out of the Crisis**, 1986.

W.E. Deming, **The New Economics for Industry, Government, Education, Second Edition**, 1994.

D.A. Garvin, "Competing on the Eight Dimensions of Quality," *Harvard Business Review*, November-December 1987.

M. Hammer and J. Champy, **Reengineering the Corporation: A Manifesto for Business Revolution**, 1993.

M. Harry and R. Schroeder, **Six Sigma: The Breakthrough Management Strategy Revolutionizing the World's Top Corporations**, 2000.

J.M. Juran, **Juran on Planning for Quality**, 1988.

A. March, "A Note on Quality: The Views of Deming, Juran, and Crosby," *IEEE Engineering Management Review*, Vol. 24, No. 1, Spring 1996, pp. 6-14.

I. Masaaki, **Kaizen: The Key to Japan's Competitive Success**, 1986.

D. Niven, "When Times Get Tough, What Happens to TQM?" *Harvard Business Review*, May-June 1993, pp. 20-34.

J. Pfeffer, "When It Comes to 'Best Practices' - Why Do Smart Organizations Occasionally Do Dumb Things?" *Organizational Dynamics*, Summer 1996, pp. 33-44.

N.P. Repenning and J.D. Sterman, "Nobody Ever Gets Credit for Fixing Problems that Never Happened: Creating and Sustaining Process Improvement," *California Management Review*, Summer 2001, pp. 64-88.

P.M. Senge, **The Fifth Discipline: The Art & Practice of the Learning Organization**, 1990.

J.P. Womack and D.T. Jones, **Lean Thinking**, 1996.

Decision Making

M. Gladwell, **Blink - The Power of Thinking Without Thinking**, 2005.

R. Hastie and R.M. Dawes, **Rational Choice in an Uncertain World: The Psychology of Judgment and Decision Making**, 2001.

A. Langley, "Between 'Paralysis by Analysis' and 'Extinction by Instinct'," *Sloan Management Review*, Spring 1995, pp. 63-76.

M.R. LeGault, **Think! Why Crucial Decisions Can't Be Made in the Blink of an Eye**, 2006.

SOFTWARE ENGINEERING

A. Abran, J.W. Moore, P. Bourque, and R. Dupuis (eds), **Guide to the Software Engineering Body of Knowledge (SWEBOK), 2004 Version**, 2004.

F. Brooks Jr, "No Silver Bullet: Essence and Accidents of Software Engineering," *IEEE Computer*, April 1987, pp. 10-19.

R.L. Glass, **Facts and Fallacies of Software Engineering**, 2004.

R.L. Glass and A. Hunt, **Software Conflict 2.0: The Art and Science of Software Engineering**, 2006.

D.S. Platt, **Why Software Sucks... and What You Can Do About It**, 2006.

M. Shaw, "Writing Good Software Engineering Research Papers," **Proceedings of the 25th International Conference on Software Engineering**, Portland, May 2003, pp. 726-736.

E. Yourdon, **Death March: The Complete Software Developer's Guide to Surviving "Mission Impossible" Projects**, 1997.

Software Problems

"Report of the Defense Science Board Task Force on Military Software," Department of Defense, Office of the Under Secretary of Defense for Acquisition, Washington, D.C., September 1987.

"Extreme Chaos (2001)," The Standish Group, <URL:
http://www1.standishgroup.com/sample_research/>.

M.R. Chapman, **In Search of Stupidity: Over 20 Years of High-Tech Marketing Disasters**, 2003.

R.N. Charette, "No One Could Have Done Better," *American Programmer*, July 1995, pp. 21-28.

K. El Emam and A.G. Koru, "A Replicated Survey of IT Software Project Failures," *IEEE Software*, September/October 2008, pp. 84-90.

W.W. Gibbs, "Software's Chronic Crisis," *Scientific American*, September 1994, pp. 86-95.

R. Glass, "IT Failure Rates – 70% or 10-15%?" *IEEE Software*, May/June 2005, pp. 112,110-111.

C. Kaner, "Legal Issues Related to Software Quality," *Software Quality*, No. 2, 1997-98, pp. 1-10.

E. Manley, "Taurus: How I Lived to Tell the Tale," *American Programmer*, July 1995, pp. 17-20.

J.H. Paul and G.C. Simon, "Bugs in the Program: Problems in Federal Government Computer Software Development and Regulation," Staff Study for the House Committee on Science, Space, and Technology, September 1989.

I. Peterson, **Fatal Defect**, 1995.

ISO 9000

G. Issac, C. Rajendran, and R.N. Anantharaman, "Do Quality Certifications Improve the Software Industry's Operational Performance?" *ASQ Software Quality Professional*, December 2003, pp. 30-37.

E. Naveh and A.A. Marcus, "When Does the ISO 9000 Quality Assurance Standard Lead to Performance Improvement? Assimilation and Going Beyond," *IEEE Transactions on Engineering Management*, August 2004, pp. 352-363.

M.C. Paulk, "How ISO 9001 Compares With the CMM," *IEEE Software*, January 1995, pp. 74-83.

D. Stelzer, W. Mellis, and G. Herzwurm, "Software Process Improvement via ISO 9000? Results of Two Surveys Among European Software Houses," *Software Process: Improvement and Practice*, September 1996, pp. 197-210.

The TickIT Guide: Using ISO 9001:2000 for Software Quality Management System Construction, Certification, and Continual Improvement, Issue 5.0, BSI Standards TickIT Office, January 2001.

Agile Methodologies

D. J. Anderson, **Agile Management for Software Engineering: Applying the Theory of Constraints for Business Results**, 2004.

R. Baskerville, L. Levine, et al., "How Internet Software Companies Negotiate Quality," *IEEE Computer*, May 2001, pp. 51-57.

K. Beck and C. Andres, **Extreme Programming Explained: Embrace Change, 2nd Edition**, 2004.

B. Boehm and R. Turner, **Balancing Agility and Discipline: A Guide for the Perplexed**, 2004.

A. Cockburn, **Agile Software Development**, 2002.

A. Cockburn, **Crystal Clear: A Human-Powered Methodology for Small Teams**, 2004.

T. DeMarco and B. Boehm, "The Agile Methods Fray," *IEEE Computer*, June 2003, pp. 90-92.

J. A. Highsmith, **Adaptive Software Development: A Collaborative Approach to Managing Complex Systems**, 2000.

C. Larman, **Agile and Iterative Development: A Manager's Guide**, 2004.

A. MacCormack, "Product-Development Practices That Work: How Internet Companies Build Software," *MIT Sloan Management Review*, Winter 2001, pp. 75-84.

M. Marchesi, G. Succi, D. Wells, and L. Williams (ed), **Extreme Programming Perspectives**, 2002.

M.C. Paulk, "Extreme Programming from a CMM Perspective," *IEEE Software*, November/December 2001, pp. 19-26.

M.C. Paulk, "Agile Methodologies and Process Discipline," *Crosstalk: The Journal of Defense Software Engineering*, October 2002, pp. 15-18.

Ken Schwaber, **Agile Project Management with Scrum**, 2004.

M. Stephens and D. Rosenberg, **Extreme Programming Refactored: The Case Against XP**, 2003.

Measurement

R.D. Austin, **Measuring and Managing Performance in Organizations**, 1996.

A.D. Carleton, R.E. Park, et al., “Software Measurement for DoD Systems: Recommendations for Initial Core Measures,” Software Engineering Institute, CMU/SEI-92-TR-19, 1992.

N. Fenton, “Software Measurement: A Necessary Scientific Basis,” *IEEE Transactions on Software Engineering*, March 1994, pp. 199-206.

N. Fenton, S.L. Pfleeger, and R. Glass, “Science and Substance: A Challenge to Software Engineers,” *IEEE Software*, July 1994, pp. 86-95.

A. Gopal, M.S. Krishnan, T. Mukhopadhyay, and D.R. Goldenson, “Measurement Programs in Software Development: Determinants of Success,” *IEEE Transactions on Software Engineering*, September 2002, pp. 863-875.

R.B. Grady, **Practical Software Metrics For Project Management and Process Improvement**, 1992.

C. Jones, **Applied Software Measurement, 2nd Edition**, 1997.

J. McGarry, D. Card, et al., **Practical Software Measurement: Objective Information for Decision Makers**, 2002.

R.E. Park, Wolfhart B. Goethert, and W. A. Florac, “Goal-Driven Software Measurement – A Guidebook,” CMU/SEI-96-HB-002, Software Engineering Institute, August 1996.

S.L. Pfleeger, “Lessons Learned in Building a Corporate Metrics Program,” *IEEE Software*, May 1993, pp. 67-74.

L.H. Putnam and W. Myers, **Industrial Strength Software: Effective Management Using Measurement**, 1997.

E.R. Tufte, **The Visual Display of Quantitative Information**, 1983.

G. M. Weinberg, **Quality Software Management Vol. 2: First-Order Measurement**, 1993.

SOFTWARE PROCESS

S. Carroll and T. Daughtrey (eds), **Fundamental Concepts for the Software Quality Engineer, Volume 2**, 2007.

R. Charette, L.M. Dwinell, and J. McGarry, “Understanding the Roots of Process Performance Failure,” *Crosstalk: The Journal of Defense Software Engineering*, August 2004, pp. 18-22.

T. Daughtrey (ed), **Fundamental Concepts for the Software Quality Engineer, Volume 1**, 2002.

K. El Emam and N.H. Madhavji (eds), **Elements of Software Process Assessment and Improvement**, 1999.

G.A. Gack and K. Robison, "Integrating Improvement Initiatives: Connecting Six Sigma for Software, CMMI, Personal Software Process (PSP), and Team Software Process (TSP)," *ASQ Software Quality Professional*, September 2003, pp. 5-13.

W.S. Humphrey, **A Discipline for Software Engineering**, 1995.

W.S. Humphrey, **Introduction to the Team Software Process**, 1999.

W.S. Humphrey, "Three Process Perspectives: Organizations, Teams, and People," *Annals of Software Engineering*, Vol. 4, 2002, pp.39-72.

R.B. Hunter and R.H. Thayer (eds), **Software Process Improvement**, 2001.

C. Kaplan, R. Clark, and V. Tang, **Secrets of Software Quality**, 1995.

S. Maguire, **Debugging the Development Process**, 1994.

S. McConnell, **Rapid Development: Taming Wild Software Schedules**, 1996.

L. Osterweil, "Software Processes Are Software Too, Revisited: An Invited Talk on the Most Influential Paper of ICSE 9," **Proceedings of the 19th International Conference on Software Engineering**, 17-23 May 1997, pp. 540-548.

M.C. Paulk, "Software Process Proverbs," *Crosstalk: The Journal of Defense Software Engineering*, January 1997, pp. 4-7.

K.Wiegers, **Creating a Software Engineering Culture**, 1996.

Capability Maturity Model for Software & CMM Integration

M.B. Chrissis, M. Konrad, and S. Shrum, **CMMI: Guidelines for Process Integration and Product Improvement, Second Edition**, 2006.

S. Garcia and R. Turner, **CMMI Survival Guide: Just Enough Process Improvement**, 2006.

M. Ginsberg and L. Quinn, "Process Tailoring and the Software Capability Maturity Model," Software Engineering Institute, CMU/SEI-94-TR-024, November 1995.

W.S. Humphrey, **Managing the Software Process**, 1989.

D.L. Johnson and J.G. Brodman, "Tailoring the CMM for Small Businesses, Small Organizations, and Small Projects," *Software Process Newsletter*, IEEE Computer Society Technical Council on Software Engineering, No. 8, Winter 1997, p. 1-6.

H. Jung and D. R. Goldenson, "The Internal Consistency of Key Process Areas in the Capability Maturity Model for Software," Software Engineering Institute, CMU/SEI-2002-TR-037, December 2002.

M.C. Paulk, C.V. Weber, B. Curtis, and M.B. Chrissis, **The Capability Maturity Model: Guidelines for Improving the Software Process**, 1995.

M.C. Paulk, "The Evolution of the SEI's Capability Maturity Model for Software," *Software Process: Improvement and Practice*, Spring 1995, pp. 3-15.

M.C. Paulk, "Using the Software CMM With Good Judgment," *ASQ Software Quality Professional*, June 1999, pp. 19-29.

M.C. Paulk, "Surviving the Quagmire of Process Models, Integrated Models, and Standards," **Proceedings of the ASQ Annual Quality Congress**, Toronto, 24-27 May 2004.

S.A. Sheard, "The Frameworks Quagmire," *Crosstalk: The Journal of Defense Software Engineering*, September 1997.

H.E. Thomson and P. Mayhew, "Approaches to Software Process Improvement," *Software Process: Improvement and Practice*, March 1997, pp. 3-17.

M. West, **Real Process Improvement Using the CMMI**, 2004.

Software Process Appraisals

M. Bush and D. Dunaway, **CMMI Assessments: Motivating Positive Change**, 2005.

J.J. Besselman, P. Byrnes, C.J. Lin, M.C. Paulk, and R. Puranik, "Software Capability Evaluations: Experiences from the Field," **SEI Technical Review '93**, 1993.

K. El Emam and D.R. Goldenson, "An Empirical Review of Software Process Assessments," National Research Council of Canada, Institute for Information Technology, November 1999.

T. Kasse, **Action Focused Assessment for Software Process Improvement**, 2002.

M.C. Paulk, W.S. Humphrey, and G.J. Pandelios, "Software Process Assessments: Issues and Lessons Learned," **Proceedings of ISQE92**, Juran Institute, 10-11 March 1992, pp. 4B/41-4B/58.

D. Rugg, "Using a Capability Evaluation to Select a Contractor," *IEEE Software*, July 1993, pp. 36-45.

SEI and Process Criticism

J. Bach, "The Immaturity of the CMM," *American Programmer*, September 1994, pp. 13-18.

B. Curtis, "A Mature View of the CMM," American Programmer, September 1994, pp. 19-28.

J. Bach, "Enough About Process: What We Need Are Heroes," *IEEE Software*, February 1995, pp. 96-98.

J. Bach, "The Challenge of 'Good Enough' Software," *American Programmer*, October 1995, pp. 2-11.

T. Bollinger and C. McGowan, "A Critical Look at Software Capability Evaluations," *IEEE Software*, July 1991, pp. 25-41.

W.S. Humphrey and B. Curtis, "Comments on 'A Critical Look'," IEEE Software, July 1991, pp. 42-46.

C. Jones, "Artificial Maturity Levels," Chapter 5 in **Assessment and Control of Software Risks**, 1994, pp. 63-70. See also pp. 19-20 and 23-26.

C. Jones, "The SEI's CMM – Flawed?" *Software Development*, March 1995, pp. 41-48.

H. Saiedian and R. Kuzara, "SEI Capability Maturity Model's Impact on Contractors," *IEEE Computer*, January 1995, pp. 16-26.

Case Studies of Software Process Improvement

C. Billings, J. Clifton, B. Kolkhorst, E. Lee, and W.B. Wingert, "Journey to a Mature Software Process," *IBM Systems Journal*, 1994, pp. 46-61.

K. Butler and W. Lipke, "Software Process Achievement at Tinker Air Force Base," Software Engineering Institute, CMU/SEI-2000-TR-014, September 2000.

K. Caputo, **CMM Implementation Guide: Choreographing Software Process Improvement**, 1998.

B.K. Clark, "The Effects of Software Process Maturity on Software Development Effort," PhD Dissertation, Computer Science Department, University of Southern California, August 1997.

N. Davis and J. Mullaney, "The Team Software Process (TSP) in Practice: A Summary of Recent Results," Software Engineering Institute, CMU/SEI-2003-TR-014, September 2003.

P. Ferguson, G. Leman, et al., "Software Process Improvement Works!" Software Engineering Institute, CMU/SEI-99-TR-027, November 1999.

D.L. Gibson, D.R. Goldenson, and K. Kost, "Performance Results of CMMI-Based Process Improvement," Software Engineering Institute, CMU/SEI-2006-TR-004, August 2006.

R.B. Grady, **Successful Software Process Improvement**, 1997.

T.J. Haley, "Raytheon's Experience in Software Process Improvement," *IEEE Software*, November 1996, pp. 33-41.

D.E. Harter, M.S. Krishnan, and S.A. Slaughter, "Effects of Process Maturity on Quality, Cycle Time, and Effort in Software Product Development," *Management Science*, April 2000, pp. 451-466.

J. Herbsleb, D. Zubrow, D. Goldenson, W. Hayes, and M. Paulk, "Software Quality and the Capability Maturity Model," *Communications of the ACM*, June 1997, pp. 30-40.

G. Issac, C. Rajendran, and R.N. Anantharaman, "Do Quality Certifications Improve the Software Industry's Operational Performance?" *ASQ Software Quality Professional*, December 2003, pp. 30-37.

P. Jalote, **CMM in Practice: Processes for Executing Software Projects at Infosys**, 1999.

D.P. Kelly and B. Culleton, "Process Improvement for Small Organizations," *IEEE Computer*, October 1999, pp. 41-47.

H. Krasner, "The Payoff for Software Process Improvement: What It Is and How to Get It," Chapter 9 in **Elements of Software Process Assessment and Improvement**, K. El Emam and N.H. Madhavji (eds), 1999.

P.K. Lawlis, R.M. Flowe, and J. B. Thordahl, "A Correlational Study of the CMM and Software Development Performance," *Crosstalk: The Journal of Defense Software Engineering*, September 1995, pp. 21-25.

F. McGarry, R. Pajerski, et al, "Software Process Improvement in the NASA Software Engineering Laboratory," Software Engineering Institute, CMU/SEI-94-TR-22, December 1994.

T. McGibbon, D. Ferens, and R. Vienneau, "A Business Case for Software Process Improvement (2007 Update): Measuring Return on Investment from Software Engineering and Management," Data & Analysis Center for Software, DACS Report Number 347616, September 2007.

Eitan Naveh and A. A. Marcus, "When Does the ISO 9000 Quality Assurance Standard Lead to Performance Improvement? Assimilation and Going Beyond," *IEEE Transactions on Engineering Management*, August 2004, pp. 352-363.

J. Nowell, "An Analysis of Software Process Improvement," [performed at the Oklahoma City Air Logistics Center, Directorate of Aircraft, Software Division (LAS), Tinker AFB, Oklahoma; prepared for the Deputy Assistant Secretary of the Air Force, Communications, Computers, and Support Systems (SAF/AQK), Washington, DC], Software Productivity Research, Burlington, MA, 26 September 1994.

M.C. Paulk, "An Empirical Study of Process Discipline and Software Quality," University of Pittsburgh, PhD Dissertation, 2005.

L.H. Putnam, Sr., "Linking the QSM Productivity Index With the SEI Maturity Level," Quantitative Software Management, Inc., McLean, VA, 2000.

D.J. Reifer, **Making the Software Business Case: Improvement by the Numbers**, 2001.

Sandra A. Slaughter, D.E. Harter, and Mayuram S. Krishnan, "Evaluating the Cost of Software Quality," *Communications of the ACM*, August 1998, pp. 67-73.

R.R. Willis, R.M. Rova, et al, "Hughes Aircraft's Widespread Deployment of a Continuously Improving Software Process," Software Engineering Institute, CMU/SEI-98-TR-006, May 1998.

Harvey Wohlwend and Susan Rosenbaum, "Schlumberger's Software Improvement Program," *IEEE Transactions on Software Engineering*, November 1994, pp. 833-839.

G. Yamamura and Gary B. Wigle, "SEI CMM Level 5: For the Right Reasons," *Crosstalk: The Journal of Defense Software Engineering*, August 1997, pp. 3-6.

SOURCING AND SERVICE SCIENCE

Sara Cullen and Leslie Willcocks, **Intelligent IT Outsourcing: Eight Building Blocks to Success**, 2003.

T.L. Friedman, **The World Is Flat, Release 2.0**, 2006.

M.L. George, **Lean Six Sigma for Service**, 2003.

E.B. Hyder, K.M. Heston, and M.C. Paulk, "The eSCM-SP v2.01: Model Overview," Carnegie Mellon University, IT Services Qualification Center, CMU-ITSQC-06-006, December 2006.

PEOPLE AND CULTURE

Organizational and National Cultures

Miklos Biro, R. Messnarz, and A. G. Davison, "The Impact of National Cultural Factors on the Effectiveness of Process Improvement Methods: The Third Dimension," *ASQ Software Quality Professional*, September 2002, pp. 34-41.

L. L. Constantine, **Constantine on Peopleware**, 1995.

P. J. DiMaggio and Walter W. Powell, "The Iron Cage Revisited: Institutional Isomorphism and Collective Rationality in Organizational Fields," *American Sociological Review*, April 1983, pp. 147-160.

C. Handy, **Gods of Management: The Changing Work of Organizations – Third Edition**, 1991.

G. Hofstede, **Cultures and Organizations, Software of the Mind: Intercultural Cooperation and its Importance for Survival**, 1996.

J.W. Meyer and B. Rowan, “Institutionalized Organizations: Formal Structure as Myth and Ceremony,” *American Journal of Sociology*, Vol. 83, No. 2, 1977, pp. 340-363.

Teams

Karen Bemowski, “What Makes American Teams Tick?” *ASQC Quality Progress*, January 1995, pp. 39-43.

J. R. Katzenbach and Douglas K. Smith, **The Wisdom of Teams**, 1993.

P. R. Scholtes, Brian L. Joiner, and B. J. Streibel, **The TEAM Handbook, Second Edition**, 1996.

M.Schrage, **No More Teams! Mastering the Dynamics of Creative Collaboration**, 1989.

People Issues

Dale Carnegie, **How to Win Friends & Influence People, Revised Edition**, 1936 (1981).

B. Curtis, W. E. Hefley, and Sally A. Miller, **People Capability Maturity Model**, 2001.

Tom DeMarco and Timothy Lister, **Peopleware, 2nd Edition**, 1999.

R.Fisher, W. Ury, and Bruce Patton, **Getting to Yes: Negotiating Agreement Without Giving In, Second Edition**, 1991.

W.S. Humphrey, **Managing Technical People**, 1997.

Thomas Teal, “The Human Side of Management,” *Harvard Business Review*, November/December 1996, pp. 35-44.

R.Townsend, **Up the Organization: How to Stop the Corporation from Stifling People and Strangling Profits**, 1970.

W. Ury, **Getting Past No : Negotiating Your Way from Confrontation to Cooperation**, 1993.

G. M. Weinberg, **The Psychology of Computer Programming, Silver Anniversary Edition**, 1998.

G. M. Weinberg, **Quality Software Management Volume 3: Congruent Action**, 1994.

Innovation and Creativity

C. M. Christensen, **The Innovator's Dilemma**, 1997.

P. F. Drucker, **Innovation and Entrepreneurship: Practices and Principles**, 1985.

R. Florida and J. Goodnight, "Managing for Creativity," *Harvard Business Review*, July-August 2005, pp. 125-131.

R.L. Glass and T. DeMarco, **Software Creativity 2.0**, 2006.

PROJECT FOCUSED

Requirements Management

B. Boehm and H. In, "Cost vs. Quality Requirements: Conflict Analysis and Negotiation Aids," *ASQ Software Quality Professional*, March 1999, pp. 38-50.

G. M. Weinberg, "Requirements as the Foundation of Measurement," Chapter 19 in **Quality Software Management Vol. 2: First-Order Measurement**, 1993, pp. 295-306.

R.R. Young, **Effective Requirements Practices**, 2001.

(Software) Project Planning

T. K. Abdel-Hamid and S. E. Madnick, "Impact of Schedule Estimation on Software Project Behavior," *IEEE Software*, July 1986, pp. 70-75.

B. W. Boehm, E. Horowitz, et al, **Software Cost Estimation with COCOMO II**, 2000.

A.M. Davis, "Software Life Cycle Models," **Software Engineering Project Management, Second Edition**, R.H. Thayer (ed), IEEE Computer Society Press, Los Alamitos, CA, 1997, pp. 105-114.

A.L. Lederer and J. Prasad, "Nine Management Guidelines for Better Cost Estimating," *Communications of the ACM*, February 1992, pp. 51-59.

S. McConnell, "The Nine Deadly Sins of Project Planning," *IEEE Software*, September/October 2001, pp. 5-7.

R.E. Park, "A Manager's Checklist for Validating Software Cost and Schedule Estimates," *American Programmer*, June 1996, pp. 30-35.

(Software) Project Management

A Guide to the Project Management Body of Knowledge, Third Edition (PMBOK Guide), Project Management Institute, Newtown Square, PA, 2004.

F.P. Brooks Jr, **The Mythical Man-Month: Essays on Software Engineering Anniversary Edition**, 1995.

D. I. Cleland, **Project Management: Strategic Design and Implementation, Second Edition**, 1994.

L. L. Constantine, **Beyond Chaos: The Expert Edge in Managing Software Development**, 2001.

K. G. Cooper, "The Rework Cycle: Vital Insights into Managing Projects," *IEEE Engineering Management Review*, Fall 1993, pp. 4-12.

K. G. Cooper, "The \$2,000 Hour," *IEEE Engineering Management Review*, Winter 1994, pp. 12-23.

T. DeMarco, **Why Does Software Cost So Much?**, 1995.

J.T. Lochner, "16 Critical Software Practices for Performance-Based Management," *Crosstalk: The Journal of Defense Software Engineering*, October 1999, pp. 6-9.

T. DeMarco, **Controlling Software Projects**, 1982.

T. Gilb, **Principles of Software Engineering Management**, 1988.

E.M. Goldratt, **Critical Chain**, 1997.

S. McConnell, **Software Project Survival Guide**, 1998.

S. McConnell, **Professional Software Development**, 2004.

R.C. Newbold, **Project Management in the Fast Lane: Applying the Theory of Constraints**, 1998.

N.C. Olsen, "The Software Rush Hour," *IEEE Software*, September 1993, pp. 29-37.

A.J. Shenhar, O. Levy, and D. Dvir, "Mapping the Dimensions of Project Success," *Project Management Journal*, Project Management Institute, June 1997, pp. 5-13.

G. Stark, R.C. Durst, and C.W. Vowell, "Using Metrics in Management Decision Making," *IEEE Computer*, September 1994, pp. 42-49.

H.J. Thamhain and D.L. Wilemon, "Criteria for Controlling Projects According to Plan," *Project Management Journal*, June 1986, pp. 75-81.

S. Woodward, "Evolutionary Project Management," *IEEE Computer*, October 1999, pp. 49-57.

Customer-Supplier Relationship (Acquisition, Customer Satisfaction)

T.O. Jones and W.E. Sasser Jr., "Why Satisfied Customers Defect," *Harvard Business Review*, November/December 1995.

B. C. Meyers and P. Oberndorf, **Managing Software Acquisition: Open Systems and COTS Products**, 2001.

J. Nielsen and A. Miller, "Selecting Software Subcontractors," *IEEE Software*, July 1996, pp. 104-109.

D.C. Swaddling and C. Miller, "Don't Measure Customer Satisfaction," *ASQ Quality Progress*, May 2002, pp. 62-67.

(Software) Quality Assurance

M.A. Aquino, "Improvement vs. Compliance: A New Look at Auditing," *ASQC Quality Progress*, October 1990, pp. 47-49.

F.J. Buckley and R. Poston, "Software Quality Assurance," *IEEE Transactions on Software Engineering*, January 1984, pp. 36-41.

F. J. Buckley, "The Roles of a SQA Person," *ACM Software Engineering Notes*, July 1987, pp. 42-44.

R. Craig, "Software Quality Assurance in a CMM Level 5 Organization," *Crosstalk: The Journal of Defense Software Engineering*, May 1999, pp. 11-15.

(Software) Configuration Management

E.H. Bersoff, "Elements of Software Configuration Management," *IEEE Transactions on Software Engineering*, January 1984, pp. 27-35.

E.H. Bersoff and A.M. Davis, "Impacts of Life Cycle Models on Software Configuration Management," *Communications of the ACM*, August 1991, pp. 105-118.

P. H. Feiler, "Configuration Management Models in Commercial Environment," Software Engineering Institute, CMU/SEI-91-TR-7, 1991.

ORGANIZATIONAL LEARNING AND PROCESS MANAGEMENT

Process Focus and Definition

J.W. Armitage, M.I. Kellner, and R.W. Phillips, "Software Process Definition Guide: Content of Enactable Software Process Definitions," Software Engineering Institute, CMU/SEI-93-SR-18, August 1993.

B. Curtis, H. Krasner, V. Shen, and N. Iscoe, "On Building Software Process Models Under the Lamppost," **Proceedings of the Ninth International Conference on Software Engineering**, Monterey, CA, IEEE Computer Society, 30 March - 2 April 1987, pp. 96-103.

A. Dandekar and D.E. Perry, "Barriers to Effective Process Architecture – An Experience Report," *Software Process: Improvement and Practice*, March 1996, pp. 13-20.

T. Dyba, "An Empirical Investigation of the Key Factors for Success in Software Process Improvement," *IEEE Transactions on Software Engineering*, Vol. 31, No. 5, May 2005, pp. 410-424.

P. Fowler and S. Rifkin, "Software Engineering Process Group Guide," Software Engineering Institute, CMU/SEI-90-TR-24, September 1990.

D. Madison, **Process Mapping, Process Improvement, and Process Management**, 2005.

E. Matson and L. Prusak, "The Performance Variability Dilemma," *MIT Sloan Management Review*, Fall 2003, pp. 39-44.

A. Rainer and T. Hall, "A Quantitative and Qualitative Analysis of Factors Affecting Software Processes," *The Journal of Systems and Software*, Vol. 66, 2003, pp. 7-21.

S. Rifkin, "What I Would Do Differently If I Wrote the SEPG Guide Today," **SEPG Conference 2002**, Phoenix, AZ, 18-21 February 2002.

Training

C. Argyris, "Teaching Smart People How to Learn," *Harvard Business Review*, May/June 1991, pp. 99-109.

D. A. Garvin, "Building a Learning Organization," *Harvard Business Review*, July/August 1993, pp. 78-91.

W. Wiggenhorn, "Motorola U: When Training Becomes an Education," *Harvard Business Review*, July/August 1990, pp. 71-83.

D.A. Wyrick, "Understanding Learning Styles to be a More Effective Team Leader and Engineering Manager," *Engineering Management Journal*, Vol. 15, No. 1, March 2003, pp. 27-33.

Risk Management

P. L. Bernstein, **Against the Gods: The Remarkable Story of Risk**, 1996.

B.W. Boehm (ed), **Software Risk Management**, 1989.

R.N. Charette, "Large-Scale Project Management is Risk Management," *IEEE Software*, July 1996, pp. 110-117.

T. DeMarco and T. Lister, **Waltzing with Bears: Managing Risks on Software Projects**, 2003.

C. Jones, **Assessment and Control of Software Risks**, 1994.

B. Kitchenham and S. Linkman, "Estimates, Uncertainty, and Risk," *IEEE Software*, May/June 1997, pp. 69-74.

Ray C. Williams, Julie A. Walker, and Audrey J. Dorofee, "Putting Risk Management Into Practice," *IEEE Software*, May/June 1997, pp. 75-82.

Integrated Product and Process Development

J.D. Blackburn, G. Hoedemaker, and L.N. Van Wassenhove, "Concurrent Software Engineering: Prospects and Pitfalls," *IEEE Transactions on Engineering Management*, May 1996, pp. 179-188.

R.P. Smith, "The Historical Roots of Concurrent Engineering Fundamentals," *IEEE Transactions on Engineering Management*, February 1997, pp. 67-78.

Durward K. Sobek II, Jeffrey K. Liker, and Allen C. Ward, "Another Look at How Toyota Integrates Product Development," *Harvard Business Review*, July/August 1998.

Software Engineering

Requirements Engineering

D.C. Gause and G. M. Weinberg, **Exploring Requirements: Quality Before Design**, 1989.

R.R. Young, **Effective Requirements Practices**, 2001.

Design

L. Bass, P. Clements, and R. Kazman, **Software Architecture in Practice**, 1998.

P. Clements, R. Kazman, and M. Klein, **Evaluating Software Architectures: Methods and Case Studies**, 2001.

Programming

W.S. Humphrey, "CASE Planning and the Software Process," Software Engineering Institute, CMU/SEI-89-TR-26, May 1989.

Testing

I. Burnstein, A. Homyen, et al, "A Testing Maturity Model for Software Test Process Assessment and Improvement," *ASQ Software Quality Professional*, September 1999, pp. 8-21.

G.T. Daich, "Emphasizing Software Test Process Improvement," *Crosstalk: The Journal of Defense Software Engineering*, June 1996, pp. 20-26.

Peer Reviews and Inspections

A.F. Ackerman, L.S. Buchwald, and F.H. Lewski, "Software Inspections: An Effective Verification Process," *IEEE Software*, May 1989, pp. 31-36.

M.E. Fagan, "Advances in Software Inspections," *IEEE Transactions on Software Engineering*, July 1986, pp. 744-751.

D.P. Freedman and G. M. Weinberg, **Handbook of Walkthroughs, Inspections, and Technical Reviews, Third Edition**, 1990.

R.L. Glass, "Inspections - Some Surprising Findings," *Communications of the ACM*, April 1999, pp. 17-19.

R. Grady and T. Van Slack, "Key Lessons in Achieving Widespread Inspection Use," *IEEE Software*, July 1994, pp. 46-57.

Philip M. Johnson and Danu Tjahjono, "Does Every Inspection Really Need a Meeting?" *Empirical Software Engineering*, 1998, pp. 9-35.

J.C. Knight and E. Ann Myers, "An Improved Inspection Technique," *Communications of the ACM*, November 1993, pp. 51-61.

V. Mashayekhi, J.M. Drake, W. Tsai, and J. Riedl, "Distributed, Collaborative Software Inspection," *IEEE Software*, September 1993, pp. 66-75.

D. L. Parnas and D. M. Weiss, "Active Design Reviews: Principles and Practices," *Journal of Systems and Software*, December 1987, pp. 259-265.

A. Porter and L. Votta, "What Makes Inspections Work?" *IEEE Software*, November/December 1997, pp. 99-102.

R.A. Radice, **High Quality Low Cost Software Inspections**, 2002.

G. Russell, "Inspection in Ultralarge-Scale Development," *IEEE Software*, January 1991, pp. 25-31.

E.F. Weller, "Lessons from Three Years of Inspection Data," *IEEE Software*, September 1993, pp. 38-45.

K.E. Wiegers, **Peer Reviews in Software**, 2002.

L. Williams and R. Kessler, **Pair Programming Illuminated**, 2002.

HIGH MATURITY

M.C. Paulk, D. Goldenson, and D. M. White, "The 1999 Survey of High Maturity Organizations," Software Engineering Institute, CMU/SEI-2000-SR-002, February 2000.

M.C. Paulk and M.B. Chrissis, "The 2001 High Maturity Workshop," Software Engineering Institute, CMU/SEI-2001-SR-014, January 2002.

D.M. Rosseau and S. McCarthy, "Educating Managers From an Evidence-Based Perspective," *Academy of Management Learning & Education*, March 2007, pp. 84-101.

Statistical Process / Quality Control

G. E.P. Box and S. Bisgaard, "The Scientific Context of Quality Improvement," *ASQC Quality Progress*, June 1987, pp. 54-61.

M. Brassard and Diane Ritter, **The Memory Jogger II**, 1994.

N. Fenton and Martin Neil, "A Critique of Software Defect Prediction Models," *IEEE Transactions on Software Engineering*, September/October 1999, pp. 675-689.

W. A. Florac and A.D. Carleton, **Measuring the Software Process: Statistical Process Control for Software Process Improvement**, 1999.

W. A. Florac, A.D. Carleton, and J. Barnard, "Statistical Process Control: Analyzing a Space Shuttle Onboard Software Process," *IEEE Software*, July/August 2000, pp. 97-106.

L.B. Hare, R.W. Hoerl, J.D. Hromi, and R.D. Snee, "The Role of Statistical Thinking in Management," *ASQC Quality Progress*, February 1995, pp. 53-60.

R. Hoerl and R.D. Snee, **Statistical Thinking: Improving Business Performance**, 2002.

D. Houston, "Cost of Software Quality: Justifying Software Process Improvement to Managers," *ASQ Software Quality Professional*, March 1999, pp. 8-16.

K. Ishikawa, **Guide to Quality Control**, 1986.

S.H. Kan, **Metrics and Models in Software Quality Engineering, Second Edition**, 2003.

J.D. Musa and A.F. Ackerman, "Quantifying Software Validation: When to Stop Testing?" *IEEE Software*, May 1989, pp. 19-27.

J.D. Musa, A. Iannino, and K. Okumoto, **Software Reliability: Measurement, Prediction, Application**, 1987.

M.A. Ould, "CMM and ISO 9001," *Software Process: Improvement and Practice*, December 1996, pp.281-289.

T. Pyzdek, "Process Control for Short and Small Runs," *ASQC Quality Progress*, April 1993, pp. 51-60.

E.F. Weller, "Practical Applications of Statistical Process Control," *IEEE Software*, May/June 2000, pp. 48-55.

D.J. Wheeler, **Understanding Variation: The Key to Managing Chaos**, 1993.

D.J. Wheeler, "Charts Done Right," *ASQC Quality Progress*, June 1994, pp. 65-68.

D.J. Wheeler, **Making Sense of Data: SPC for the Service Sector**, 2003.

D.J. Wheeler, **Twenty Things You Need to Know**, 2009.

Process Modeling and Simulation

T. Abdel-Hamid and S. E. Madnick, **Software Project Dynamics**, 1991.

B. Curtis, M.I. Kellner, and J. Over, "Process Modeling," *Communications of the ACM*, September 1992, pp. 75-90.

M.I. Kellner, R.J. Madachy, and D.M. Raffo, "Software Process Simulation Modeling: Why? What? How?" *The Journal of Systems and Software*, 15 April 1999, pp. 91-105.

R. Madachy and D. Tarbet, "Initial Experiences in Software Process Modeling," *ASQ Software Quality Professional*, June 2000, pp. 15-27.

Product Knowledge Management

J. Besselman and S. Rifkin, "Exploiting the Synergism Between Product Line Focus and Software Maturity," **Proceedings of the 1995 Acquisition Research Symposium**, Washington, D.C., pp. 95-107.

P. Clements and L. Northrop, **Software Product Lines: Practices and Patterns**, 2001.

S.L. Pfleeger, "Measuring Reuse: A Cautionary Tale," *IEEE Software*, July 1996, pp. 118-127.

K.C. Wallnau, S.A. Hissam, and R.C. Seacord, **Building Systems from Commercial Components**, 2001.

Causal Analysis and Defect Prevention

I. Bhandari, M.Halliday, et al., "A Case Study of Software Process Improvement During Development," *IEEE Transactions on Software Engineering*, December 1993, pp. 1157-1170.

D. N. Card, "Learning from Our Mistakes with Defect Causal Analysis," *IEEE Software*, January/February 1998, pp. 56-63.

R. Chillarege and I. Bhandari, "Orthogonal Defect Classification – A Concept for In-Process Measurements," *IEEE Software*, November 1992, pp. 943-955.

B. Collier, T. DeMarco, and P. Fearey, "A Defined Process for Project Postmortem Review," *IEEE Software*, July 1996, pp. 65-72.

J.L. Gale, J.R. Tirso, and C.A. Burchfield, "Implementing the Defect Prevention Process in the MVS Interactive Programming Organization," *IBM Systems Journal*, 1990, pp. 33-43.

C.L. Jones, "A Process-Integrated Approach to Defect Prevention," *IBM Systems Journal*, 1985, pp. 150-167.

J. Kajihara, G. Amamiya, and T. Saya, "Learning from Bugs," *IEEE Software*, September 1993, pp. 46-54.

R.G. Mays, C.L. Jones, G.J. Holloway, and D.P. Studinski, "Experiences with Defect Prevention," *IBM Systems Journal*, 1990, pp. 4-32.

N. Bridge and C. Miller, "Orthogonal Defect Classification Using Defect Data to Improve Software Development," **Proceedings of the 7th International Conference on Software Quality**, Montgomery, Alabama, 6-8 October 1997, pp. 197-213.

Organizational Change Management

E. Abrahamson, "Change Without Pain," *Harvard Business Review*, July-August 2000, pp. 75-79.

V.R. Basili, M.K. Daskalantonakis, and R.H. Yacobellis, "Technology Transfer at Motorola," *IEEE Software*, March 1994, pp. 70-76.

R.E. Bohn, "Measuring and Managing Technological Knowledge," *Sloan Management Review*, Fall 1994.

M. Beer, R.A. Eisenstat, and B. Spector, "Why Change Programs Don't Produce Change," *Harvard Business Review*, November/December 1990, pp. 158-166.

A.M. Davis, "Why Industry Often Says 'No Thanks' to Research," *IEEE Software*, November 1992, pp. 97-99.

R. Fichman and C.F. Kemerer, "The Illusory Diffusion of Innovations: An Examination of Assimilation Gaps," *Information Systems Research*, September 1999, pp. 255-275.

B. Kitchenham, L. Pickard, and S.L.Pfleeger, "Case Studies for Method and Tool Evaluation," *IEEE Software*, July 1995, pp. 52-62.

J.P. Kotter, "Leading Change: Why Transformation Efforts Fail," *Harvard Business Review*, March-April 1995, pp. 59-67.

G.A. Moore, **Crossing the Chasm**, 1991.

E.M. Rogers, **Diffusion of Innovations, Third Edition**, 1983.

R. H. Schaffer and H. A. Thomson, "Successful Change Programs Begin with Results," *Harvard Business Review*, January/February 1992, pp. 80-89.

G. M. Weinberg, **Quality Software Management Volume 4: Anticipating Change**, 1997.