# STEVE BERCZUK

#### **PROFILE**

Expert in agile software development and release management with over 20 years of experience delivering enterprise applications through multiple release cycles. Demonstrated ability to understand and improve legacy code and to become proficient at new technologies quickly. Skilled at leading teams, mentoring team members, developing architecture, design, and requirements, and establishing lightweight software configuration management and release processes to enable organizations to build stable products quickly. Effective at removing technical and process impediments. Author of Software Configuration Management Patterns: Effective Teamwork, Practical Integration (2002). Certified Practicing Scrum Master, and frequent presenter at user groups and conferences, and frequent contributor to software quality oriented publications. Blog: www.berczuk.com/blog/ Twitter: @sberczuk.

# **EXPERIENCE**

# ENGINEER, HUMEDICA; BOSTON, MA - NOVEMBER 2008 - PRESENT

Develop a SaaS-based clinical informatics application, with a focus on agile techniques including unit testing and continuous integration. Develop code using **Java**, **Flex**, and **Python** languages and the **Spring**, **FlexUnit**, and **Swiz** frameworks. Reworked the Flex front end and Java webapp architecture to improve robustness, configurability, and testability.

**ScrumMaster** for project teams, run release retrospectives, and develop and help to maintain build, release management, and automated testing processes. Help maintain builds using **Maven** and Atlassian tool suite (Jira, Bamboo, Nexus).

# TECHNICAL LEAD, CYRUS INNOVATION; BOSTON, MA - JAN 2008-SEP 2008

**Technical Lead** and **Scrum Master** for the Boston office of a New York City based agile consultancy, managing a team of 4 engineers on client site. Coached team members, provided training in agile methods and SCM techniques to clients, develop code in **Java**, J2EE, Webwork and **Hibernate** as part of an XP-Team using Pair Programming, **TDD**, and Continuous Integration. Assisted with business development activities for Boston office.

# SR SOFTWARE ENGINEER, FAST; NEEDHAM, MA- JAN 2006 - AUG 2007

**Technical Lead**, **Scrum Master**, and hands on **manager** for a team developing and e-commerce search application. Developed code, participated in release planning and management and served as Scrum Master for a team developing an e-commerce application using the FAST platform and **Java**, J2EE, **Spring**, and Struts. Helped other teams apply **Scrum** and use **Maven**, Cruise Control, CVS, Jira and Confluence effectively.

SR SOFTWARE ENGINEER, IRON MOUNTAIN; BOSTON, MA — JUN 2004 - DEC 2005 Developed software for a Digital Archives application. Developed automated build and deployment scripts and influenced Release and Configuration Management best practices. Introduced Scrum to the organization, and served as Scrum Master and automation evangelist. Roles included:

- Developer, Sustaining Team. Fixed software problems and wrote deployment and administration tools.
- Developer, Digital Archives. Developed application software and build scripts. Technical resource for J2EE frameworks (Struts/Tiles, JSTL), testing frameworks, and build/integration tools (ANT, Maven, MKS). Assisted team lead with task management and Scrums
- Technical Lead for next generation Digital Archives reference architecture project. Designed and developed framework components in **Java** using J2EE and the **Spring** Framework.

 Technical Lead for application to convert proprietary format messages to RFC2822 format for archiving. Developed code in Java and Perl. Worked with QA and operations to improve deployment.

INDEPENDENT CONSULTANT — AUG 2002-JUN 2004

Software development, Scrum, and Build and Release management consulting.

- Perceptive Informatics (Feb 2004- Jun 2004). Contractor and Member of a 3 person team developing
  a web application interface to configure the Oracle database for a clinical trial management IVR system
  using Java, and J2EE technologies (JSP, JSTL, Struts, Tiles), and the Torque ORM framework.
- Aliaswire (Aug 2003-Feb2004) Led the development of the telephone (VXML) interface for a telephone
  and web based bill presentment and payment application using Java, VXML, Oracle, J2EE
  technologies, Tomcat and Eclipse for this early stage start-up. Managed a 3-person team and
  developed a testing infrastructure for voice and web applications.
- Silverlink Communications Oct Nov 2002: Set up infrastructure and developed a server monitoring tool in **Java** for a health care **VXML** application.
- Writing and Training: Presented tutorials on using agile development techniques at conferences and to clients. Regular columnist at CMCrossroads.com. Technical Advisor for StickyMinds.com. Set up a wiki for a high school computing class. Taught classes on web design to high school students.

DEVELOPER, SKYVA INTERNATIONAL; MEDFORD, MA — JUN 2001-AUG 2002 Developed **Java** applications for business process modeling, and service management applications. Developed requirements and prototyped web services applications for the Skyva application. Focused on run time configuration issues. Developed tooling for configuring RDB to Object mappings for an **Oracle** DB using IBM San Francisco Framework and Java. Practiced and evangelized agile development approaches. Wrote ANT scripts and assisted with build and configuration management processes.

TECHNICAL LEAD, IPHRASE TECHNOLOGIES; CAMBRIDGE MA — OCT 2000-MAY 2001 Developed presentation software and automated verification tools using **Python**, **Java**, **C++**, **XSLT**, CSS, and for 2 release cycles of a web-based natural language search engine that ran on Windows and Unix platforms. Introduced and applied agile development techniques. Supervised 1 Engineer.

SR SOFTWARE ENGINEER, VERBIND; LEXINGTON MA — JUL 1999-OCT 2000 Developed software in **C++** for a Customer Relationship Management (CRM) System. using **C++**. **Technical Lead**. Supervised 1 engineer. Facilitated agile development process in the company including requirements and design processes. Developed build and release scripts and assisted with configuration management process.

SR SOFTWARE ENGINEER, NETSUITE; CONCORD, MA — OCT 1998- JUL 1999 Developed Software in **C++** and Visual Basic for a enterprise network design application. Led quality improvement process including code reviews. Technical Lead of development team for the Enterprise product. Adapted existing APIs to work in a client server environment using **Oracle**. Primary developer for the COM API used by network design products. Enhanced core APIs using C++ and Rational Rose.

SR SOFTWARE ENGINEER, BIZTRAVEL; SOMERVILLE, MA — APR 1998-SEP 1998
Developed software in **C++** and **PerI** for an internet travel reservation system running on Windows NT and Oracle. Developed application software, customer reservation system interfaces, and operations tools.

SR SOFTWARE ENGINEER, CORECHANGE; BOSTON, MA — JAN 1997- APR 1998 Developed a role-based desktop customization application using **C++**, DCOM, Win32 APIs and ATL. Worked with deployment teams to develop product requirements and to provide custom solutions. Assisted QA team with test planning. Improved requirements process, and mentored junior staff.

# SR SOFTWARE ENGINEER, OPTIMAX - FEB 1996-DEC 1996

Developed genetic algorithm based manufacturing scheduling applications using Microsoft Access and Visual Basic under Windows and HPUX using VBA, MS Access, **C++** and a proprietary constraint language. Maintained and extended the C++ scheduling toolkit. Designed database schemas to store constraint and scheduling data. Served as **Project Manager** for vehicle paint scheduling application, delivering application into production and engaging the customer to develop requirements and provide support and enhancements. Wrote a prototype Available-To-Promise system in Java.

# SOFTWARE ENGINEER, MIT CENTER FOR SPACE RESEARCH; CAMBRIDGE, MA - JUN 1992-JAN 1996

Developed real-time data analysis and satellite monitoring software in **C++**, **TCL**, and **Perl** on Unix (Ultrix, SunOS4, Solaris2) for the Rossi-XTE satellite under tight deadlines and rapidly changing requirements to analyze and archive real- time data. Designed and promoted a C++ framework for handling telemetry used by teams at 3 sites. Performed support tasks, including, developing and maintaining the SCM system across project locations. Supervised graduate and undergraduate students who developed tools to support our work.

# SOFTWARE ENGINEER, KODAK BOSTON TECH CENTER — MAY 1990-FEB 1992

Developed Photo CD applications using **C++**, X11/Motif, on Unix (SunOS). Technical liaison between Boston and Rochester development teams. Worked on user interface, and framework and image processing APIs

# TECHNICAL SUPPORT REP, SYSTEMS CENTER; WALTHAM, MA- JAN 1989-APR 1990

Supported and tested products that managed and optimized DB2 applications running under **MVS/TSO**. Assisted customers in technical evaluation of products, resolved customer problems involving database design and optimization, and product customization, and wrote tools for customer and internal use. Trained support representatives in MA, VA, and UK offices.

#### **EDUCATION**

Stanford University, Stanford CA — MS Operations Research, June 1988

Massachusetts Institute of Technology — SB Electrical Engineering, June 1987

# SKILLS

Technology: Java, Flex, Python, Bash, Oracle, C++,

Tools: SVN, Eclipse, Oracle, Jira, Confluence

Methods: Agile software development and release management, Certified Scrum Master. Frequent author and presenter on agile software development processed.

# **BACKGROUND**

Graduate of **Stuyvesant High School** in New York City. My professional interests include software patterns, team dynamics, and agile software development More information about my interests and current projects is on my web site: <a href="https://www.berczuk.com">www.berczuk.com</a>.

Member of ACM, IEEE, and Computer Professionals for Social Responsibility. Participate in the Boston Agile Bazaar. Author of the book (Nov 2002) Software Configuration Management Patterns: Practical Teamwork, Effective Integration. Active in OOPSLA and Agile Software Development communities. Columnist for CM Crossroads (<a href="https://www.cmcrossroads.com">www.cmcrossroads.com</a>). Participate in Boston Agile Bazaar. Presenter at Agile Conference (2004-2007), SD Best Practices (2004-2007), and Agile Development Practices (2008).

# **PUBLICATIONS**

Selected Publications. See www.berczuk.com/pubs for a more complete list and for copies.

- Berczuk, S. and Y. Lv (2010). We're All in This Together. IEEE Software, IEEE. 27: 15-18.
- Berczuk, S. (2010). Starting Agile Adoption: Part I -- Quality Assurance. Starting Agile Adoption, Cutter Consortium. Executive Update (First of 3).
- Berczuk, S. (2009). IDEs and Build Scripts. Better Software. 11: 30-33.
- Berczuk, S. (2009). Agile SCM for Testers. Software Test and Performance, Redwood Collaborative Media. 6: 22.
- Berczuk, S. and G. Koch (2008). Knowledge First, then Tools. Software Test and Performance Magazine.
   5: 9.
- Berczuk, S. P. (2007). "Feedback Without Fear." Better Software 9(5): 39-40.
- Berczuk, S. (2006). The Team That Walked Through Walls: Overcoming Barriers to Agile SCM
- . Agile Development (The Agile Alliance Newsletter): 10-13.
- Berczuk, S. (2006). Breaking with Tradition. Better Software. 8: 8-11.
- Berczuk, S. P. and B. Appleton (2003). Software configuration management patterns: effective teamwork, practical integration. Boston, Addison-Wesley.
- Berczuk, S. (2003). "Pragmatic Software Configuration Management." IEEE Software 20(2): 15-17.
- Berczuk, S. P. (1996). Organizational Multiplexing: Patterns for Processing Satellite Telemetry with Distributed Teams. Pattern Languages of Program Design. J. Vlissides, J. Coplien and N. Kerth. Reading, MA, Addison-Wesley. 2.
- Berczuk, S. P. (1995). A Pattern for Separating Assembly and Processing. Pattern Languages of Program Design. J. Coplien and D. Schmidt. Reading, MA, Addison-Wesley. 1.
- Berczuk, S. (1994). "Finding Solutions Through Pattern Languages." IEEE Computer 27(12 (Dec. 1994)): 75-76.

# **PRESENTATIONS**

Member of the Program Committee for the 1996 through 2000 Pattern Languages of Programs conference, and Program Chair for the 1998 conference. Participant in patterns workshops including PLoP 1994-1998 and ChiliPLoP 98. Participant in a workshop on Organization Patterns at OOPSLA 1999. Speaker at Agile and Agile Development Practices Conferences, Software Test and Performance, SD Best Practices, Agile Development, New England Agile Bazaar and SPIN. See <a href="https://www.berczuk.com/pubs/">www.berczuk.com/pubs/</a> for a more complete list.

Berczuk S (2009) Tutorial: SCM for Agile Teams at Software Test and Performance Conference.

Berczuk S (2008) Tutorial: SCM for Agile Teams at class: Getting Agile with Legacy Code at Agile Development Practices Conference.

Berczuk, S. (2007). Back to Basics: The Role of Agile Principles in Success with an Distributed Scrum Team. Proceedings of the AGILE 2007, IEEE Computer Society: 382-388.

Berczuk, S. and B. Appleton (2000). Getting Ready to Work: Patterns for a Developer's Workspace Pattern Languages of Programs, Monticello, IL, Washington University Technical Report number: wucs-00-29.

Appleton, B., S. Berczuk, et al. (1998). Streamed Lines: Branching Patterns for Parallel Software Development. Fifth Annual Conference on Pattern Languages of Programs, Monticello, IL, Washington University Technical Report TR #WUCS-98-25.

Berczuk, S. (1996). Configuration Management Patterns. Third Annual Conference on Pattern Languages of Programs, Monticello, IL.