Processes Provide the Light of Success

The fundamental characteristic of a highly mature software organization is strict adherence to documented processes. Certainly, no processes are more critical to any engineering endeavor’s success than well-defined and properly executed configuration management and test processes. Few technical problems lead to more confusion, wasted effort, rework, and overruns than poor configuration management practices. Item identification, version control, traceability, change management, and configuration status accounting should be at least as important to project leadership as tools, techniques, or technical solutions.

Equally important is testing. No matter how meticulously a configuration management effort is developed and prescreening practices are followed, errors will still exist. A sound testing program will reveal these errors. Testers often rely on configuration managers to assist in identifying when and where the errors were inserted. I remember my first introduction to proper configuration management many years ago and how the proverbial lightbulb came on for me. I was amazed that such a basic and critical concept had escaped me to date. Years later, I am still amazed to see this essential project management principle all too frequently ignored and overlooked.

This issue of CROSSTalk addresses the value of configuration management and test and various implementation methods that I hope you will find helpful. Perhaps if your configuration management and test light bulb has not yet been lit, you might at least receive a little glow from your reading time.

Randy B. Hill
Ogden Air Logistics Center, Co-Sponsor

New Ways to Implement CM and Testing

This month we focus on two very important software engineering disciplines: configuration management (CM) and test. We are continually asked to feature articles on these two disciplines that play an ever-increasing critical role in software development and sustainment.

We begin with Implementing Configuration Management for Software Testing Projects by Steve Boycan and Dr. Yuri Chernak, who give a good example of how CM can aid testing projects with the necessary control of evolving testing artifacts. Next, we feature Configuration Management Fundamentals by the Software Technology Support Center, a good reminder of the basics of effective CM. In Finding CM in CMMI, Anne Mette Jonassen Hass shares her ideas for companies facing the task of improving CM. In A Correlated Strategic Guide for Software Testing, Christopher L. Harlow and Dr. Santa Falcone present an iterative testing strategy that has been used in an actual large-scale military software acquisition. Its early testing results can be a guide to later iterative testing in product development cycles. In “But the Auditor Said We Need to …” Striking a Balance Between Controls and Productivity by Greg Deller, learn how project teams can better understand auditors’ perspectives and recommendations. Finally, don’t miss the highlights on pages 16 and 17 from another successful Systems and Software Technology Conference.

I give a special thanks to the authors contributing to this month’s issue with their helpful reminders and new insight into practicing effective CM and test.

Tracy L. Stauder
Publisher

Note of Appreciation: We at CROSSTalk extend our appreciation to Walt Lipke as he retired from government service at the end of June. Throughout the years, Mr. Lipke has been a great supporter of CROSSTalk via the articles he shared and his key role in helping us secure funds until our new sponsors started their support. We will miss Mr. Lipke’s support in the government sector, but look forward to more words of wisdom via future CROSSTalk articles.