

Agile Training Requirements for DOD T&E Workforce Professionals

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- Coveros builds mission-critical applications using secure, agile development methods
- Our consulting services:
 - Secure agile software development
 - Agile transformations
 - Agile training and coaching
- Our key markets:
 - Defense
 - National security
 - Financial services
 - Healthcare
 - Software product vendors

Coveros Products

SecureAgile

SecureCI

- Agile integrates software testing into the development process as much as possible in order to:
 - Reduce the amount of costly rework
 - Remove inefficiency within the team (costly hand offs, heavy documentation, big bang testing)
 - Deliver “production capable” software on a more frequent basis
 - Build quality into software
- Agile testing encompasses:
 - Using tests to specify and drive development (TDD, ATDD)
 - Day-to-day collaboration between developers and testers
 - Expecting developers to do their fair share of testing
 - Heavily leveraging appropriate test automation
 - Integrating automated tests with continuous integration / deployment
 - Moving portions of release and non-functional testing into development

Agile testing is a new way of working for testing professionals.

1. Understand agile fundamentals

- Why?
- Agile is a set of principles, not a methodology
- The fundamentals provide the foundation for how to tailor / customize agile testing approaches to a specific situation

2. Understand agile testing fundamentals

- Why?
- Agile testing is different and must be understood within the context of agile to be successful
- A significant cultural shift is often needed / necessary to work in an agile way while testing
- New concepts and skills must be learned

3. Understand specific agile testing skills

- Automation
- Testing non-functional requirements
- Release testing

- Agile History and Mindset
 - Where agile came from
 - The principles that drive it
 - Agile culture
- Roles and Interactions
 - What, when, and with whom agile team members work
- Agile Planning and Adaption
 - How initial planning and on-going planning are performed (introduce approaches)
 - How requirements are gathered and managed
 - How much planning is enough / too much
- Agile Development and Testing
 - How development and testing are performed (introduce approaches)
 - Agile development methods
 - Agile testing methods
- Customer and End-user Involvement
 - During planning
 - During development
 - During release

- Agile Testing Mindset
 - History
 - Applying agile principles to testing
 - Mindset and culture
- Agile Testing Techniques
 - Categories of testing
 - Levels of testing (subsystem through operational)
 - Driving development using testing
- Agile Testing Process
 - Roles and responsibilities
 - Test strategy and planning
 - Testing during iterations
 - Testing during releases
 - Test environments
- Test Automation (Intro to tools, approaches, etc.)
- Beyond the Team (Org structure, integrating with others, policy)

- Testing Non-functional Requirements
 - Load and performance
 - Security testing
 - Operational effectiveness
 - Availability
 - Reliability
- Test Automation Skills
 - Agile test automation strategy
 - Scripting skills
 - Agile test tool usage
 - Integration with continuous integration environments
- Release Testing
 - Certification & release readiness testing
 - Operational testing

Q&A

Thank You!

