Publishing Venues and Peer Reviews

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Publication venues related to my research area

Tier 1

- ACM Transactions on Software Engineering and Methodology

- IEEE Transactions on Software Engineering

- Springer Empirical Software Engineering

Tier 2

- ICSE—International Conference on Software Engineering

- International Conference Automated Software Engineering

- ETAPS International Conference on Fundamental Approaches to Software Engineering

Tier 3

- EUROMICRO—Conference on Software Engineering and Advanced Applications

- ACM Sigsoft Software Engineering Notes

- SEFM—Conference on Software Engineering and Formal Methods

Tier 4

- International Conference of the Chilean Computer Science Society (SCCC)

- Advances in Production Management Systems (APMS)

- Professional Development of Information Technology Professionals

"I need to publish at least N papers in Tier 1 venues, M papers in Tier 2 venues, ..., so that my advisor and committee would grant me my degree." If your degree is not linked to publications, explain how your graduate work will be validated.

My degree (MS Thesis) is not linked to publications. My advisory committee will evaluate my research work in the final exam (defense of thesis). They would ask questions about my research work and see to it that the quantity and quality of work done meets the requirement for the degree to be granted.

Paper Summary

This research paper[1] discusses the problem of inadequate security of software developed with Agile methods. The study gives a background review of agile methods. Revising that the iterative and incremental software development life-cycle increases the software quality and productivity, the developers are more motivated, there is high degree of communication between the team, and due to increased communication there is improved sharing of knowledge and learning in the team. Then the study discusses some background knowledge about agile methods and security. It specifies how it conducted the interview and what areas it focused on. Then it summarizes its findings about the challenges that hinder security in agile methods.

Paper Review

In terms of flow and language the paper seems to be well written. However, a specific section describing the research questions would be recommended.

The study points out that even though agile methods are said to be secure in theoretical publications, there is no or very little practical evidence to support this. The various challenges are grouped into three areas. The first being the process life-cycle dynamics which states that due to the nature of agile methods, the focus is on functional requirements and less on non-functional requirements which hinders security. The second is focus on in-person interaction which leads to less emphasis on documentation, which is very important for conducting risk assessments. Third being, trust in team individuals which contrasts with the skeptic approach of traditional security process and the fear or malicious developers. The study correctly identifies the challenges related to security and relates them to the core nature of agile methods. But here, the challenges are discussed very briefly. The author could have expanded more on these

challenges to show how they really hinder the security and robustness of the software product.

The study suggests solutions to these challenges in four areas, namely, 'process life-cycle', 'security requirements', 'design, implementation and assurance' and 'security awareness and expertise'. It does not explain how it came up with these solutions. The actual security challenges and solution in agile methods is missing.

The interviewing process only considers a few area into consideration : 'customer involvement', 'security awareness', 'effects of agile on security', 'security practices' and 'authorization'. There could be more areas that could be brought into the interview. The study also does not explain why only these specific areas were covered. The study does a good job in specifying the details about the surveyed developers like their role level and affiliation type of their organization.

The research paper does a great work in summarizing the various perspectives of the interviewees into its findings. It properly states why the interviewees came upon that idea and also states if there were any exceptions in the interviews. The research study only surveyed ten agile development practitioners and the study also does not specify what kind of software product these practitioners were working on. Hence, due to the limited sample size the research study is not completely justified by data. Also the interview method is subjective to a certain degree. In the discussion section the paper appropriately notes that the interviews only offer subjective data which is prone to practitioner or research bias. It also offers a very important point that requirement of inclusion of security into the software product is finally in the hands of the client and they are the ones that need to clearly state their security requirements.

The paper clearly states the objectives in the Abstract, but the objective could have been more explicitly stated in the form of a research question. The study clearly states its conclusion, summarizing its findings in a concise way. The paper does make a significant contribution to the literature. The findings are very useful to the researchers and practitioners of agile methods. The study helps in suggesting ways to better incorporate security into the agile software development life-cycle.

This paper is published in a proper venue i.e. "2011 Sixth International Conference on Availability, Reliability and Security". This conference focuses on research in the field of computer and information security, which matches with the research domain for this study as well. The conference has other similar research works which discuss the incorporation of security into the software product.

References

[1]   Steffen Bartsch. "Practitioners' perspectives on security in agile development". In: *2011 Sixth International Conference on Availability, Reliability and Security*. IEEE. 2011, pp. 479–484.