Reflections on Postgraduate Study in Computer Science, Object-Oriented Programming and Developing an ePortfolio

OOP link - https://sbolder77.github.io/Portfolio/oop.html

ePortfolio link - https://sbolder77.github.io/Portfolio/index.html

Introduction

As a full-time IT professional my experience has allowed me to gain valuable knowledge and professional qualifications in all aspects of the IT profession as well as build a comprehensive resume. However, I found that my knowledge in software development and standards in what is a primarily focused software career my learning could be taken much further. Peers, colleagues and customers are predominantly from an academic background with undergraduate and postgraduate qualifications in skills such as software development, data science and scientific fields. The subject of Object-Oriented programming was one of the key reasons in the selection of my academic learning not only to develop knowledge but to also satisfy my need to challenge myself in higher learning and reinforce my existing skill set within the industry.

Learning outcomes and reflections:

Object-Orientated Programming:

My initial thoughts on Object-Orientated Programming would be elaborating on software development standards however I did underestimate the level this would go to and in fact, the level of UML covered in a relatively small amount of time. Whilst challenging the objectives of the development and programming on the course were interesting ideas and concepts. The UML content of the course however was more complex to understand. Specifically, the use of almost all the UML diagram types. While applicable in a full project I am more familiar with certain diagrams like use cases and activities in more of a business analysis role. With the assignments I found this to be most unusual, especially with a very high-level brief to have to consider these and with guidance in the summative delivery to adapt based on design thoughts that maybe enough focus had not been put on the design itself from both a personal and curriculum point of view. If this design required a much more indepth use of UML, then I would have felt more comfortable with more detail on the requirements definition to facilitate a comprehensive design. I felt there was a large amount of reading and reference material but a unit or two focussed specifically on UML and the diagrams we would use on the course and assignments would have been helpful.

Learning activities and writing:

As I discussed in my reflections on discussions and writing assignments, I found this to be the most challenging aspect of the module. I have always been able to communicate strongly in formal and informal communications in my professional role

however I acknowledged very early that writing styles in Postgraduate study are different to what I am used to. This led me to doubt myself regularly as I produced several written assignments and contributed to the discussion forums and I would often become less confident in sharing or submitting for fear of criticism. Also, as I read my peer's contributions, I found my confidence in what is typically a strong area for me dropped. This is mainly doubt of whether what I am writing is correct in tone, self-analysis and criticism and I would quite often find my assignments getting lost or losing sight of the criteria. One piece I enjoyed doing was reflective writing as I felt more comfortable writing in the first person. Rushton & Duggan (2013) discuss that home and international students and their educational and cultural norms are perhaps outside the standards required. While not an international student this resonated with me and I found the research very aligned with the University of Essex. This gave me more confidence in how to approach reflective writing and the feeling of satisfaction that I could write to the standard expected. I certainly would have gained more through a focused unit on writing ability.

ePortfolio development:

As I mentioned in my reflective piece this was the one part of the module where I felt most comfortable and expressive in my thought process and work. Aside from the content, there were no specific criteria for visual presentation or structure. Initially, I was hesitant about using Github for use as an ePortfolio but I have recently implemented a Github strategy at work and although this course has not influenced that process as I learnt more about the platform in my professional role I have gained a solid understanding of how it can and should be used which has supported how I have managed the structure and content of my ePortfolio. I was hesitant to commit to structure especially as I entered the final week. However, I felt more comfortable and confident in deciding on an approach that I could stand by.

Observations and analysis of learning:

Whilst I found the overall module challenging, I do believe that I can be more critical and analytical in my academic work for the remainder of the Postgraduate course. This module was also more focused on time and effort than previous modules so while I manage my time effectively in my professional role as a student it has prompted me to invest more time in my study and I have regularly spent more than the estimated time for certain units. One area I have not been able to make time for however is the regular seminars. Due to the time and working full time as well as having a senior role, I was unable to make these seminar calls.

Professional Development:

Whilst I have gained an immense amount of knowledge and experience through my career, I am most pleased with how I have gained a better understanding of development practice and standards. I am planning on implementing what I have learned from this module and course into my professional role and providing myself

with additional opportunities to expand into our development process and our analytical and data science platforms. Overall, I am very pleased with my progress, but I know there is a lot more I can do regarding grades and quality of work.

References:

Rushton, D. and Duggan, C., 2013. Impact of culture on reflective writing in masters level students. *Procedia-Social and Behavioral Sciences*, *93*, pp.956-963.