ASSIGNMENT 3: ACADEMIC WRITING REPORT

Industry Talk on Project Management and System Development

Academic Writing on Industry Talk 2

Topics Covered in This Report:

1. Speaker's Professional Experience
2. Project Management Concepts
3. System Development Overview
4. Application in Computer Science Programs
5. Reflection from Industry Talk

Group Members:

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1. Description of the speaker experience

TS HJ Abdul Alim bin Abdul Muttalib is a graduate of Universiti Teknologi Malaysia (UTM) with over 10 years of working experience in the technology industry. Throughout his career, he has been involved in various development projects, where he applied project management skills to plan and manage technology projects in order for them to run smoothly, and system development processes such as system design, development, testing, and implementation. He is currently the Head of Technology and Innovation of Serunai Commerce Sdn Bhd, a company which focuses on providing technology solutions for the Halal food industry. In this position, he oversees technology projects and helps design and develop innovative systems that can support the development of systems for Halal food-related businesses.

2. What is Project Management and System Development?

Project Management is necessary for keeping software projects organized, on schedule, and within budget. It also enables effective teamwork by managing designers, developers, and testers (Project Management Institute, 2017). There are two ways of managing projects which are Waterfall, which is used for projects with definite requirements and is more linear, or Agile, which is more flexible, based on small bursts of work, with feedback from team members and end-users at different stages of projects.

System Development is the structured process of planning, designing, implementing, testing, and maintaining software system to ensure that they meet user and organizational needs (Hossain, 2023). The key phases of the System Development Life Cycle (SDLC) are planning the objectives and intended use of the system, requirement analysis, prototyping of the system design, development of the system, system testing, placing the system into operation, and maintaining the system so that it continues to operate well.

3. How the Project Management and System Development has been used in Bioinformatics program.

In the Bioinformatics program, project management skills are applied in group assignments and research-based projects, where we are required to plan objectives, manage timelines, divide tasks and collaborate effectively with our team members. Through these activities, we can develop basic computer science skills such as problem-solving, teamwork, communication and time management, which are also essential skills expected by the industry (Chadli et al., 2016).

In addition, system development is applied in bioinformatics projects that involve designing and implementing computational tools or analysis pipelines for biological data. A structured system development process including requirement analysis, system design, implementation and testing (Sommerville, 2015) aligns with SDLC can help us to develop industry-relevant technical skills such as system design, data analysis and software implementation, which support accurate and reliable biological data analysis.

4. Reflection from Industry Talk

i) **Nur Irdina Amira binti Muhammar Rozee:** From this industry talk, what I got to know is that being successful in computer science doesn't just involve coding but also involves time and project management or even team management. In the next four years, I hope that not only will my technical skills be sharpened but also my communication and problem-solving skills will be enhanced through group projects and hands-on activities. By being more experienced and consistent in learning, I believe I can prepare myself for success in the field of computer science.

ii) **Lok Jie Ying:** Over the next four years, I aim to become successful in the computer science and bioinformatics field by continuously improving both technical and professional skills. The industry talk helped me realize that project management, system development and teamwork are important in real world projects. Therefore, I plan to strengthen my programming and data analysis skills while also developing my project management abilities through group projects and assignments which will better prepare me for future studies and careers in bioinformatics.

iii) **Norjuma Nazwa binti Jamaluddin:** In the next four years, to be success in Computer Science I will try my best to have a excellent and balance understanding in both technical knowledges and project management principles shared by Ts. Hj. Abdul Halim. I plan to build a strong foundation in the SDLC while documenting my progress constantly on GitHub and LinkedIn to create my professional digital presence. Last but not least, I will treat every group project as simulation of real life system development.

iv) **Nurcarmelia Aiesya binti Mohamad Sani:** In the next four years, my goal is to become a versatile Computer Science professional by mastering both the technical part of programming and organizational skills. By understanding the core of project management and system development, I will gain a clear understanding of how systems are planned, built, and maintained. In addition, I also want to share my journey openly on platforms like GitHub and LinkedIn to build a strong professional identity.

References

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