04-900 MSIT Practicum Syllabus

Instructor:Dr. Eric Umuhoza, Instructor CMU AfricaEmail:eumuhoza@andrew.cmu.eduClass Time:12H30 – 13H50 TuesdaysLocation:F203Course credit:24 unitsPrerequisite:2nd year MSIT standing

Course description

The MSIT practicum provides an opportunity for students to apply the knowledge and skills learned in their classes to solve a real-world problem in information and communication technology offered by an industry client.

In collaboration with a faculty advisor/mentor, each team of students works with an industry client to understand the problem to be addressed and develop a strategy to create a solution in one semester.

A plan and schedule is developed, tasks are assigned, and progress is monitored through regular meetings with the client and at CMU. The solution is presented to the industry client who joins the faculty advisor in evaluating and grading the practicum project.

Learning objectives

To learn professional skills:

- Professional ethics
- Working as a team member
- Engaging with a client
- Identifying a problem, understanding the client needs, developing and assessing alternative solutions.
- Developing a work plan with the client to implement, deploy, and assess a quality solution on time.
- Reflecting on and developing your professional skills

Outcomes

After completing this course, students should be able to:

- Acquire and assess requirements with a client
- Make effective trade-offs in a project to realize a product that satisfies the client's objectives
- Define roles and tasks within a team and carry out a team project effectively
- Make a project schedule and adapt throughout the project to deal with unforeseen contingencies
- Apply research and observations on teamwork and professional skills to improve your own skills.

Student assessment

Grades are determined by faculty and client assessments of a set of deliverables.

1. Practicum Planning Road Map	10%
2. Initial Statement of Work	10%
3. Individual Reflection Proposal	5%
4. Final Statement of Work	10%
5. Final Project Presentation	10%
6. Final Deliverables	15%
7. Final Individual Reflection Report	5%
8. Client satisfaction report	30%
9. Individual assessments	5%

Practicum course Schedule

Tasks	Due Dates	Comments and Grade Points
1. Initial meeting of the Practicum including major milestones, process of grading, and high-level expectations.	Feb 2, 12:30 pm - 1:50 pm	Attendance Mandatory
2. Practicum project and team assignments.	Feb 2, 9:00 pm	By Practicum instructor
3. Project kickoff: (a) teams will have initial advisor meetings; (b) teams will schedule (and preferably have) meetings with sponsors.	Feb 9, 11:00 am	Teams submit a brief update atr next class
4. Presentations on Practicum process, Scrum methodology and Q&A	Feb 9, 12:30 pm - 1:50pm	Attendance Mandatory
5. Presentations on customer requirements	Feb 16, 12:30 pm - 1:50pm	Attendance Mandatory
6. Practicum Planning Road Map*	Feb 18, 11:59 pm	10%
7.Planary 1: Initial Project Feedback Advisors & Faculty to attend	Feb 23, 12:30 pm - 1:50pm	Attendance Mandatory

8. Presentation on project management and requirements. Review of the project kickoff and scrum, and Q&A	Mar 2, 12:30 pm - 1:50pm	Attendance Mandatory
9. Initial Statement of Work (SoW)*	Mar 2, 11:59pm	10%
10. Individual Reflection Proposal	Mar 9, 11:59pm	5%
11. Plenary 2: Project design review Advisors & Faculty to attend	Mar 23, 12:30 pm - 1:50pm	Attendance Mandatory
12. Final Statement of Work(SoW)*	Apr 16, 11:59pm	10%
13. Final Project Presentation, invited guests, and faculty.	May 4, 12:30 pm - 1:50pm	10%
14. Final Deliverables*	May 8 at 11:59pm	15%
15. Final Individual Reflection Report*	May 10 at 11:59pm	5%
16. Client satisfaction report	May 14 at 11:59pm	30%
17. Individual assessments	May 14 at 11:59pm	5%
18. Final Grades Submissions (Faculty advisors)	May 17 at 11:59pm	