

CSE677 - Parallel and Distributed Computing

Term Project

Spring 2018

In this project, you will design and implement your own distributed computing application that implements following requirements.

1. Details & Requirements

- Your application has to be useful
- Your application has to use Micro services (at least 5 services). Each service will perform separate functionalities
- You will use Docker application container for Micro services
- Your application will facilitate orchestration of services

2. First thing to do : Submit a proposal paper

- Write a 1 page proposal for your own application. The proposal should include;
 - A scenario (what does the application do and why is it interesting?)
 - A high level system architecture
 - Development plan with reasonable milestones
- **Due Date: 14/03 (in class)**

3. Second thing to do : Implement your system and Write a 4 page report about your application

- Your report should include
 - General information about your application
 - A. Motivation, Goal, Implementation Environment (APIs,...), and so on
 - Use case scenario of your application
 - System architecture and information model
 - Technical challenges and how you solved them
 - Explanation of your implementation
 - Performance Evaluation
 - Experience and Discussion
- How to submit
 - A. Please submit the files in .zip format with the filename corresponding to your student id.(e.g TP_StudentID.zip) via email to course assistant Ahmet Elbir

(aelbir@gmail.com) Email Title : [TermProject] Your Student ID, Your Name

- Zip file should include your all source codes & report
- **Due Date: Sunday, 22/05, 11:59PM**

4. Late Assignment Policy

- A. Term Projects are due at 11:59pm on the date specified. A grading penalty will be applied to late assignments. (10% penalty up to the first 24 hours, 20% for 24 to 48 hours, with no credit received after that)