

# PUSL2024

***Software Engineering 2***

Coursewok2024 –2025

Term: Term 1

Submission Deadline: 26th December 2024

Coursework Type: Group Assignment (06 -08 Members)

Element of Assessment: C1 & P1

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**Coursework**

**Instructions**

* Below coursework must be carried out in a group of maxes of **08 members** each.
* Everyone should contribute and a work breakdown matrix is required.
* There are several self-study-imposed activities which you must undertake to improve your R & D skills as a skilled software developer.
* No email submissions are accepted, and all submissions should be made via the official Plymouth DLE only.

**Scenario**

ABC is a leading cinema in the business of film industry. One of the key drawbacks of the ABC cinema is its obsolete website. Compared to the inception of the ABC cinema, now the business has evolved extensively. Hence, new features like:

* Online reservation of tickets / seats
* Online payment handling
* Avoid booking collisions
* Visualization of the customer feedbacks for managerial decision making
* SMS or Email notification of reservation and cancelling options

Need to be integrated.

The modern website should be revolutionized with the user of JSP / Servlet technologies.

**Tasks**

1. Draw a comprehensive use case diagram with use case narrations for the scenario.
2. Draw a complete class diagram.
3. Propose an eligible sequence diagram **for a selected use case**, mapping with the class diagram.
4. ER diagram.
5. Develop a sophisticated website using Servlet / JSP technologies.
6. Integrate SMS or Emailing facility to improve the user experience of the system.
7. Configure payment handling via PayPal Sandbox configuration or via any other applicable alternative.
8. Submit a report (PDF document) along with the project including following content,
   1. Introduction to the scenario
   2. Identified processes in ABC cinema
   3. Use case diagram
   4. Class diagram
   5. Sequence diagram for a selected use case
   6. ER diagram
   7. Samples of developed system (screenshots) with explanation of the functionality.
   8. References

**Detailed Assessment Criteria**

**Deliverables**

**Coursework (C1) [40%]**

|  |  |
| --- | --- |
| **Stages** | **Marks** |
| Use Case Diagram and Narrations | 10 |
| Class Diagram | 10 |
| Sequence Diagram | 10 |
| Implementation of the Website with **JSP and Servlets** | 50 |
| SMS or Email | 10 |
| PayPal Sand-Box configuration | 10 |
| **Total** | **100** |

**Presentation (P1) [20%]**

|  |  |
| --- | --- |
| **Stages** | **Marks** |
| UI / UX | 10 |
| Punctuality | 10 |
| Comprehension | 30 |
| Q & A defense | 50 |
| **Total** | **100** |

**Submission Type**

Moodle e-Submission through Plymouth DLE is compulsory for each module.

Your group will be required to perform a 20-minute defense of your solution at a mutually convenient time (which may or may not be in your timetabled slots). You should ensure that your tables are populated with an adequate amount of sensible test data in advance of this session. All group members should be present at this session.

**Assignment Feedback:**

You will receive a provisional mark and written feedback within 20 working days of the submission and presentation.

Notes:

* You must submit your coursework via the Digital Learning Environment portal. **Coursework must be submitted by the specified deadline.**
* You should give due consideration to your personal time management to ensure that coursework is submitted in plenty of time prior to the deadline.
* Coursework can be submitted at any time ahead of the deadline.
* Please note that work submitted late without valid extenuating circumstances will be penalized. Work submitted within 24 hours after the deadline will receive a mark, but it will be capped at the normal pass mark for that module. Work submitted more than 24 hours after the official deadline will receive an automatic mark of zero.
* The report that you present should be supported (where relevant) by appropriate evidence. Any such information that you present must be appropriately cited and referenced in your report - if you are unfamiliar with referencing style, then a Google search using the term 'Harvard referencing' will help to enlighten you. (Please refer the teaching and learning handbook for more details)
* Although you will be expected to make significant use of printed and online literature in researching and producing your materials, it is not acceptable for you to simply cut and paste material from other sources (small quotes are acceptable, but they must be clearly indicated as being quotes and the source must be referenced appropriately).

**Academic offences:**

(the following is a fragment of Section AST10.2 from <https://www.plymouth.ac.uk/uploads/production/document/path/8/8388/Section_D_Assessment.pdf>)

Academic offences occur when activity is undertaken which could confer an unfair advantage to any candidate(s) in assessment. The University recognises the following (including any attempt to carry out the actions described) as academic offences, regardless of intent:

a)        Copying or paraphrasing of other people’s work or ideas into a submitted assessment without full acknowledgement (plagiarism).

b)        Unauthorised collaboration of students (or others) in a piece of work (collusion).

c)         Making false declarations in an attempt to obtain either modified assessment provisions or special consideration (e.g. of extenuating circumstances).

d)        Persuading another member of the University or partner institution (student, staff, or other) to participate in any way in actions which would be in breach of these regulations.

e)        Misrepresenting research outcomes and results.

f)          Being party to any arrangement which would constitute a breach of these regulations.

g)        The inclusion in a piece of assessed work (other than an examination or test) of material which is identical or substantially similar to material which has already been submitted for any other assessment within the University.

h)        Any other activity which could confer an unfair advantage to any candidate(s).

For full details on the academic offences framework and procedures, consult Section AST10 from <https://www.plymouth.ac.uk/uploads/production/document/path/8/8388/Section_D_Assessment.pdf>