

**ASSIGNMENT (EC-1)**

Course No. : **SS ZG653**  
Course Title : **Software Architectures**  
Nature of Assignment : **Assignment: Education through Discussion Forum**  
Weightage : 15%  
Duration : 10 Days.  
Date of Assignment : Nov 10 to 15, 2018: Submission  
Nov 16 to 20, 2018: Discussion

No. of Pages	= 2
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**Note:**

1. Students have already been grouped into groups. The Groups will be known on Nov 10, 2018. Case studies have been shared earlier.

**Groups:**

The entire class has been broken into groups. We have tried to maintain a heterogenous mix to the extent possible based on your registration database.

1. A faculty member has been assigned to each group as given below. Variation in evaluation between faculty members will be standardized before adding to final marks.

Prof. S Muruganandam	Groups A & E	<a href="mailto:muruganandam@wilp.bits-pilani.ac.in">muruganandam@wilp.bits-pilani.ac.in</a>
Prof. S. Radhakrishnan	Groups B & F	<a href="mailto:sradhakrishnan@wilp.bits-pilani.ac.in">sradhakrishnan@wilp.bits-pilani.ac.in</a>
Prof. Amit Srivastava	Groups C & G	<a href="mailto:asrivatsava@wilp.bits-pilani.ac.in">asrivatsava@wilp.bits-pilani.ac.in</a>
Prof. Sankha Mallick	Groups D & H	<a href="mailto:sankhamallick@wilp.bits-pilani.ac.in">sankhamallick@wilp.bits-pilani.ac.in</a>

2. The faculty member will be the final authority in evaluating the members of the groups assigned to him/her.

**Requirement:**

1. Each Group will be assigned one Case Study.

Group A Bass\_1E\_ch18 The Meteorological Anchor Desk System A Case Study in Building a Web-Based System from Off-the-Shelf Components  
Group B Bass\_2E\_ch3 A-7E Avionics System A Case Study in Utilizing Architectural Structures  
Group C Bass\_2E\_ch6 Air Traffic Control A Case Study in Designing for High Availability  
Group D Bass\_2E\_ch8 Flight Simulation A Case Study in an Architecture for Integrability  
Group E Bass\_2E\_ch13 The World Wide Web A Case Study in Interoperability  
Group F Bass\_2E\_ch15 CelsiusTech A Case Study in Product Line Development  
Group G Bass\_2E\_ch16 J2EE/EJB A Case Study of an Industry-Standard Computing Infrastructure  
Group H Bass\_2E\_ch17 The Luther Architecture A Case Study in Mobile Applications Using J2EE

2. Each Student is expected to submit his evaluation of Case Study in terms of the technology available today. Student should list the tactics and Patterns he/she has noticed in the Study. Student may suggest tactics from their present-day knowledge to improve performance on quality attributes.
3. During the discussion members may ask questions based on presentations done by any one member.
4. Members may share links to work done and shared in their local Google Drive and make the link sharable by all users in the bits-pilani.ac.in domains.
5. Each member should share his/her experience and clarify doubts from amongst group members. Particular emphasis should be on patterns used/suggested with context, solution, variations and side-effects should be brought out.
6. Intelligent questions leading to a meaningful discussion is also a creditable contribution. Students should demonstrate professional maturity in participating in the discussion.

7. Students should demonstrate their knowledge of drawing tools ("**StarUML**" or any other) and share the documents Views/UML diagrams they prepare to demonstrate the Case Study and pattern under discussion and its practical examples.
8. Copy paste from Internet may work against you. Particularly if there is a duplication of the same screen in the same or a different group.
9. No direct submission to faculty will be evaluated. Reference to private discussions between group members outside this forum will carry negative credit.
10. Students are expected to give examples, draw illustrations and prepare shared write-ups on the subject.
11. Interaction based on submissions by others will be appreciated. Response to points raised by others are expected. A large material dump not followed up by response to points raised will not be considered an appropriate behaviour.
12. You may share the content of your BITS

#### **Faculty Evaluation:**

1. Faculty members will be scoring individual comments made in the respective groups and may even score a post in the General Discussion Forum and Question-Answer Forum.
2. Students should comment discussion forums in the course very professionally because the faculty members are free to score any forum comment. The faculty members will initially be awarding low scores. Higher scores will only be given against consistent standard of participation/ Discussion and Question/Answer forums may be scored by any faculty member while assignment forums will only be scored by assigned faculty or the lead faculty. This score will be translated to a score between 0 and 5.
3. Faculty members may not give online scoring and only give an end semester grade to each student. The assigned faculty will give a grade of A,B,C,D,E to all students of the group. A faculty member will be handling a number of groups. He/she will normally give an A and Ds to about 15% each and about 35% in each of B and C. These grades will translate into 5, 4, 3, 2, 1 mark/s. Non participation will get a 0. The grades may not be uniform across groups and some groups may do better than others.
4. The two scores above will add to a score between 0 and 10. Students will be allowed to participate in discussion in their own group only but will be allowed read the discussions in all groups. These discussions will be the basis for the final quiz.
5. Faculty may interact in the group to stimulate discussion and may even ask question to elicit a response. They may even state facts to clarify a cloudy situation. Instructions given by the faculty member will be final and all participants are expected to abide. Failure to do so may result to exclusion from the group.
6. Faculty will be looking for use of technology, comfort with social media, leadership values, communication ability, technical knowledge and social propriety while evaluating involvement

#### **Concluding Remarks**

1. Students are to appreciate that in today's environment process and management of process plays a very important role in assuring product and service quality.
2. This assignment is our attempt to establish better education process and our attempt to develop a method for process evaluation and control rather than evaluation of product as done in conventional assignments, quizzes and tests. We wish to establish that this process will not only result in evaluation but will also be an end, in that it will be a learning experience.
3. This type of approach is likely to form the basis for future education system wherein a copy and submit assignment will no longer form a basis for bypassing the evaluation process. You will be evaluated in an environment which will attempt to emulate a real-world situation where project engineers use Social Media in a Mobile Environment, and Analytics is used based on information shared over Cloud. [SMAC]. Social: Our discussion forums; Mobile: Each student on the move where his location does not matter, and they need not meet up; Analytics: Our faculty will use analytics techniques which are under development and Cloud: All information is being shared over cloud using Taxila and Google Drive (using the BITS EMAIL LOGIN]

We look for your cooperation as we move you into a new era in education technologies and techniques.