

## Unit 8 - Week 6

Course outline
How does an NPTEL online course work?
Week 0
Week 1
Week 2
Week 3
Week 4
Week 5
Week 6
<input type="radio"/> Lecture 36 : Landing Gear Layout- Part-01 <input checked="" type="radio"/> Lecture 37 : Landing Gear Layout- Part- 02 <input type="radio"/> Lecture 38 : Landing Gear of some Famous Aircraft <input checked="" type="radio"/> Lecture 39 : Tutorial on OpenVSP
<input type="radio"/> Quiz : Assignment 6 <input type="radio"/> Assignment 6 solutions <input type="radio"/> Weekly feedback <input type="radio"/> Download Videos
Week 7
Week 8
Week 9
Week 10
Week 11
Week 12
Live Session
Text Transcripts

## Assignment 6

The due date for submitting this assignment has passed.  
As per our records you have not submitted this assignment.

**Due on 2020-10-28, 23:59 IST.**

- 1) Which landing gear layout is preferable for a two seater trainer aircraft? 1 point
- Tailwheel  
 Nosewheel  
 Tandem  
 Quadricycle
- No, the answer is incorrect.**  
Score: 0  
Accepted Answers:  
*Tailwheel*
- 2) Which of the following is/are the desirable design features of a landing gear sub-system? 1 point
- Smallest possible size and lowest possible weight  
 Least possible Drag  
 Least complexity during operation and maintenance  
 Lowest operating cost
- No, the answer is incorrect.**  
Score: 0  
Accepted Answers:  
*Smallest possible size and lowest possible weight*  
*Least possible Drag*  
*Least complexity during operation and maintenance*
- 3) Which of the following aircraft has/have the Multi-bogie type landing gear? 1 point
- Airbus A380  
 Antonov An-124  
 Fairchild XC-120  
 Boeing 737
- No, the answer is incorrect.**  
Score: 0  
Accepted Answers:  
*Airbus A380*  
*Antonov An-124*
- 4) What is/are the advantages of the Nose Wheel type landing gear? 1 point
- Good ground view for the pilot during Takeoff  
 Low drag during the Takeoff run  
 Lesser over-turning tendency during Landing  
 Large angle of attack during the Takeoff Ground Roll
- No, the answer is incorrect.**  
Score: 0  
Accepted Answers:  
*Good ground view for the pilot during Takeoff*  
*Low drag during the Takeoff run*  
*Lesser over-turning tendency during Landing*
- 5) What is/are the demerits of the Tail Dragger type landing gear? 1 point
- Poor pilot visibility during Taxiing  
 Less ground clearance for nose propeller  
 Low pitching moment during Takeoff  
 Difficulty in loading and unloading Cargo and Passengers
- No, the answer is incorrect.**  
Score: 0  
Accepted Answers:  
*Poor pilot visibility during Taxiing*  
*Difficulty in loading and unloading Cargo and Passengers*
- 6) The allowable bank angle of ground clearance criteria according to FAR 25.149(b) is 1 point
- 10°  
 5°  
 12°  
 8°
- No, the answer is incorrect.**  
Score: 0  
Accepted Answers:  
*5°*
- 7) Which of the following is/are the main design requirements in which the height of the Landing Gear plays an important role? 1 point
- Aircraft clearance during taxi  
 Rear fuselage clearance during Takeoff rotation  
 Overtum prevention  
 Loading and unloading requirements
- No, the answer is incorrect.**  
Score: 0  
Accepted Answers:  
*Aircraft clearance during taxi*  
*Rear fuselage clearance during Takeoff rotation*  
*Overtum prevention*  
*Loading and unloading requirements*
- 8) The Landing Gear type of *Dassault Rafale* aircraft is 1 point
- Bicycle type landing gear  
 Tricycle type landing gear  
 Tail dragger type landing gear  
 Multi-bogie type landing gear
- No, the answer is incorrect.**  
Score: 0  
Accepted Answers:  
*Tricycle type landing gear*
- 9) Antonov An-225 has \_\_\_\_\_ pairs of main landing gear (MLG) wheel 1 point
- five  
 two  
 six  
 seven
- No, the answer is incorrect.**  
Score: 0  
Accepted Answers:  
*seven*
- 10) What is/are the advantage(s) of *OpenVSP* software? 1 point
- It is an aircraft specific geometry tool  
 It can estimate Design Gross Weight  
 Easy to learn and use  
 It is an Open Source software
- No, the answer is incorrect.**  
Score: 0  
Accepted Answers:  
*It is an aircraft specific geometry tool*  
*Easy to learn and use*  
*It is an Open Source software*