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PRESIDENCY UNIVERSITY

Presidency University Act, 2013 of the Karnataka Act No. 41 of 2013 | Established under Section 2(f) of UGC Act, 1956
Approved by AICTE, New Delhi | Approved By BCI
Bengaluru

Even Semester Mid Term, March 2026

Date: 13/03/2026

Time: 02:00 PM - 03:30 PM

Course Code: AVM2002

Course Name: ATC and Airport Operations

Semester: Second Semester

Max. Marks: 50

Weightage: 50%

| CO - Levels | CO1 | CO2 |
|-------------|-----|-----|
| Marks | 44 | 46 |

PART-A: Answer Following Questions. 10 M

| Qn.No | Questions | M | CO | BT |
|-------|---|---|-----|-----|
| 1 | Define controlled and uncontrolled airspace. | 2 | CO1 | BT1 |
| 2 | List any two general objectives of the Air Traffic Management (ATM) system. | 2 | CO1 | BT1 |
| 3 | What is Secondary Surveillance Radar (SSR)? | 2 | CO2 | BT1 |
| 4 | What is Automatic Dependent Surveillance (ADS)? | 2 | CO2 | BT1 |
| 5 | List the main categories of Navigation Technologies. | 2 | CO2 | BT1 |

PART-B: Answer Any 1 Following Questions. 10 M

| Qn.No | Questions | M | CO | BT |
|-------|---|----|-----|-----|
| 6 | Explain aircraft separation standards and procedures and describe vertical, horizontal, longitudinal, wake turbulence, radar, and procedural separation. | 10 | CO1 | BT2 |
| 7 | Explain communication protocols in Air Traffic Control and describe voice communication, ICAO phraseology, data link systems, emergency communication, and coordination procedures. | 10 | CO1 | BT2 |

PART-C: Answer Any 1 Following Questions. 10 M

| Qn.No | Questions | M | CO | BT |
|-------|--|----|-----|-----|
| 8 | Explain flight planning and flight clearance, describing their | 10 | CO1 | BT2 |

| | | | | |
|---|---|----|-----|-----|
| | purpose, process, and responsibilities. | | | |
| 9 | Explain airspace classification and describe controlled and uncontrolled airspace along with the characteristics of Classes A to G. | 10 | CO1 | BT2 |

PART-D: Answer Any 1 Following Questions. 10 M

| Qn.No | Questions | M | CO | BT |
|--------------|---|----------|-----------|-----------|
| 10 | Explain Satellite-Based Navigation Systems and describe how aircraft determine position using satellite signals. | 10 | CO2 | BT2 |
| 11 | Explain the Instrument Landing System (ILS) and describe the function and location of the Localizer and Glide Slope components. | 10 | CO2 | BT2 |

PART-E: Answer Any 1 Following Questions. 10 M

| Qn.No | Questions | M | CO | BT |
|--------------|---|----------|-----------|-----------|
| 12 | Explain the definition of Surveillance Systems in Air Traffic Control and describe the different methods of surveillance including Position Reporting, Radar, and Automatic Dependent Surveillance (ADS). | 10 | CO2 | BT2 |
| 13 | Explain the CNS/ATM framework in ATC Technologies and describe the role of Communication, Navigation, Surveillance, and Air Traffic Management within this framework. | 10 | CO2 | BT2 |