

**UNIVERSITY OF MUMBAI**

No.UG/123 of 2015-16  
MUMBAI- 400 032  
30<sup>th</sup> November, 2015

The Senior Manager,  
Federation of Indian Pilots,  
Institute of Aviation and Aviation Safety (I.A.A.S.)  
Air India Complex,  
Old Air Port, Kalina,  
Santacruz (East),  
**MUMBAI- 400 029.**

Sir,

I am to invite your attention to the Syllabi relating to the Diploma in Aviation Safety and Hospitality, vide this office Circular No. UG/66 of 2013-14, dated 11<sup>th</sup> October, 2013 and the Principals of affiliated Colleges in Science and the Head of the recognized Science Institutions concerned are hereby informed that the recommendation made by the Faculty Science at its meeting held on 11<sup>th</sup> August, 2015 has been accepted by the Academic Council at its meeting held on 31<sup>st</sup> August, 2015 vide item No.4.15 and that in accordance therewith, the revised syllabus as per Credit Based Semester and Grading System in the course of Diploma in Aviation Safety and Hospitality, which is available on the University's web site ([www.mu.ac.in](http://www.mu.ac.in)) and that the same has been brought into force with effect from the academic year 2015-16.

Diploma in  
No.UG/66 of 2013-14  
REGISTRAR and

**A.C/4.15/31/08/2015**

No. UG/123-A of 2015

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MUMBAI-400 032

30<sup>th</sup> November, 2015

Copy forwarded with compliments for information to :-

- 1) The Dean, Faculty of Science.
- 2) The Chairman, Ad-hoc Board of Studies in Aviation.
- 3) All the Principals /Directors of Colleges institutes of Aviation.
- 4) The Professor-cum-Director, Institute of Distance and Open Learning (IDOL)
- 5) The Director, Board of Colleges and University Development,
- 6) The Co-Ordinator, University Computerization Centre,
- 7) The Controller of Examinations.

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Offg. Deputy Registrar  
Under Graduate Studies

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**AC 31/08/2015**

**Item No. 4.15**

**INFRASTRUCTURE**

Front / Reception Area	1
Class Rooms (A/C)	3
Rooms for Practicing Application of First Aid to the passengers	1
Live Aircraft	1
Computer Lab 10 Computers with Internet facility	1
Grooming Rooms	1
Aircraft Chairs	10
Computers, Printers, Scanners & Laptops for Audio Visual Presentations	3
Emergency Equipment like Fire Extinguishers, Life Jackets, Oxygen Cylinders, Live Aircraft as required	-
Dummy for CPR (Cardio Pulmonary Re-Sustentation) as required	-
First Aid Kits for Teaching First Aid	6

**R. 8622 Scheme of Examination**

SEM	COURSE CODE	TITLE
I	USDAV101	INTRODUCTION TO THE AVIATION INDUSTRY & AVIATION HOSPITALITY AND GOVERNMENT REGULATORY AGENCIES
	USDAV102	PROFESSIONAL COMMUNICATION SKILLS
	USDAV103	AVIATION TERMS & TIME ZONES, AIRCRAFT FAMILIARISATION AND ROLES & RESPONSIBILITIES OF AIRLINE STAFF.
	USDAV104	INFLIGHT SERVICE PROCEDURES, LIFESTYLE CHANGES AND AN INTRODUCTION TO CHEESE AND DANGEROUS GOODS
	USDAVP1	Practical 1.1
II	USDAV201	CREW RESOURCE MANAGEMENT (CRM)
	USDAV202	EMERGENCY PROCEDURES IN EVACUATION AND DITCHING
	USDAV203	FIRE SAFETY AND AVIATION SECURITY PROCEDURES
	USDAV204	ADAPTATIONS & HEALTHY LIVING, AN INTRODUCTION TO WINES AND BEVERAGES AND MEDICAL EMERGENCIES & FIRST AID
	USDAVP2	Practical 1.2

Semester	Course	Theory Marks		Practical Internal Marks	Total	Credits
		Internal	Sem End (2 Hours Duration)			
I	USDAV101	40	60		100	2
	USDAV102	40	60		100	2
	USDAV103	40	60		100	2
	USDAV104	40	60		100	2
II	USDAVP1	--	--	50	50	2
	USDAV201	40	60		100	2
	USDAV202	40	60		100	2
	USDAV203	40	60		100	2
	USDAV204	40	60		100	2
	USDAVP2	--	--	50	50	2
Total				100	900	20

Internal Evaluation	Marks
Active Participation	05
Overall Conduct	05
One Test	10
One Project/Case Study/Assignment	20
Total	40

Semester End Question Paper Pattern for each course:

Question	Unit	Marks	Maximum Marks with option
Q1	I	15	20
Q2	II	15	20
Q3	III	15	20
Q4	I, II, III	15	20

**Practical Evaluation Specify**

**Practical examination**

Practical examination shall be conducted at the end of Semester I and Semester II.

**P. 8623 passing standard**

- a) Learner shall be awarded Diploma if he/she obtains any one of the grade 'O', 'A', 'B', 'C', 'D', 'E' in each of the course of Semester I and II
- b) Learner shall be admitted to second semester of the program irrespective of the grades secured in any of the course of the first semester
- c) Learner shall be allowed to appear for additional examination in theory in the courses where he/she has secured grade 'F'
- d) Additional examination will be conducted within one month after declaration of the result of semester II

## SEMESTER I

### **COURSE - I**

**USDAV101 - INTRODUCTION TO THE AVIATION INDUSTRY, AVIATION HOSPITALITY AND GOVERNMENT REGULATORY AGENCIES**

**LECTURE HOURS**

**PRACTICAL HOURS**

#### **UNIT IA-**

#### **INTRODUCTION TO THE AVIATION INDUSTRY**

1. Civil aviation in India
2. Infrastructure and related facilities
3. Scheduled airlines
4. Airline alliance
5. Airlines in India
6. Full service carriers
7. Low cost carriers
8. Corporate jets and charters

20

10

#### **UNIT IB -**

#### **AVIATION HOSPITALITY**

1. Introduction to civil aviation hospitality
2. The Cabin Crew profession
3. History, origin and milestones of the cabin crew profession
4. Duties and responsibilities
5. A typical working day in the life of the cabin crew
6. Benefits and challenges of the profession

#### **UNIT II -**

#### **PERSONAL DEVELOPMENT AND GROOMING**

1. Qualification, Physical requirements and Medical fitness
2. Grooming and Etiquette
3. Hairstyles
4. Hands and Feet
5. Makeup
6. Jewellery and other accessories
7. Perfumes and Scents
8. Dress code and attire

15

#### **UNIT III - (Shifted from Course III - Unit I)**

#### **GOVERNMENT REGULATORY AGENCIES**

1. Role of Government Regulatory Agencies
2. Director General of Civil Aviation
3. Civil Aviation Requirements (CAR)
4. Civil Aviation rules and authority of Pilot in command.
5. International Civil Aviation Organization (ICAO)
6. International Transport Association (IATA)
7. Travel documents for International Travel
8. Customs and Immigration

15

<b>COURSE – II</b>		
<b>USDAVI02 –PROFESSIONAL COMMUNICATION SKILLS</b>	<b>LECTURE HOURS</b>	<b>PRACTICAL HOURS</b>
<b>UNIT I –</b> <b>ENGLISH LANGUAGE (LISTENING &amp; SPEAKING)</b> Communication Skills: All communication required for plain English language speaking skills, namely, listening and speaking	15	10
<b>UNIT II –</b> <b>ENGLISH LANGUAGE (READING &amp; WRITING)</b> All communication required for plain English language speaking skills viz Reading and writing.	15	
<b>UNIT III –</b> <b>CROSS CULTURAL COMMUNICATION</b> Cross cultural Communication and Influence. Managing passenger interaction Difficult situations, difficult passengers and Passenger complaints	15	

<b>COURSE – III</b>		
<b>USDAVI103 –AVIATION TERMS &amp; TIME ZONES, AIRCRAFT FAMILIARISATION AND ROLES AND RESPONSIBILITIES OF AIRLINE STAFF</b>	<b>LECTURE HOURS</b>	<b>PRACTICAL HOURS</b>
<p><b>UNIT I – (Shifted from Course III – Unit II)</b>  <b>AVIATION TERMS AND TIME ZONES</b>            1. Aircraft Types            2. Passenger jets            3. Common aviation terms and abbreviations            4. Twenty-four hour clock            5. Time zones            6. Greenwich mean time and Universal Coordinated time            7. Airport codes            8. Airline designators</p>	15	20
<p><b>UNIT II – (Shifted from Course III – Unit III)</b>  <b>AIRCRAFT FAMILIARISATION</b>            1. Theory of flight and how aircrafts fly            2. Visit to an aircraft            3. Airplane controls and cockpit            4. Aircraft cabin familiarisation            5. Aircraft layout terminology            6. Aircraft furnishing and systems.</p>	15	
<p><b>UNIT III – (Shifted from Course IV – Unit I)</b>  <b>ROLES AND RESPONSIBILITIES OF AIRLINE STAFF</b>            1. Preparing to undertake a flight            2. Pre-flight briefing            3. Prior to passenger boarding            4. Boarding of passengers            5. Special handling of passengers            6. Public announcements            7. Safety demonstration            8. During taxiing            9. Preparing for take-off            10. During cruise            11. Preparing for landing            12. After landing            13. Critical phases of a flight</p>	15	

<b>COURSE – IV</b>		
<b>USDAV104 – INFLIGHT SERVICE PROCEDURES, LIFESTYLE CHANGES AND AN INTRODUCTION TO CHEESE AND DANGEROUS GOODS</b>	<b>THEORY HOURS</b>	<b>PRACTICAL HOURS</b>
<p><b>UNIT I – GALLEY EQUIPMENT AND MEAL SERVICE PROCEDURES</b> (shifted from Course IV – Unit II)</p> <ol style="list-style-type: none"> <li>1. Aircraft galleys and equipment</li> <li>2. Proper handling techniques of galley equipment</li> <li>3. Pre-flight galley checks</li> <li>4. Airline catering and delivery of catering on board</li> <li>5. Food Service and Hygiene</li> <li>6. Types of meals and special meals</li> <li>7. Special meal codes</li> <li>8. Meal service, types and service levels</li> </ol>	15	40
<p><b>UNIT IIA - LIFESTYLE CHANGES</b> (Part shifted from Course I – Unit III)</p> <ol style="list-style-type: none"> <li>1. Lifestyle changes and coping with them</li> <li>2. Healthy lifestyles</li> <li>3. Food and nutrition</li> <li>4. Exercise and benefits of regular exercise</li> <li>5. Techniques for getting quality rest</li> </ol>	15	
<p><b>UNIT IIB</b> <b>INTRODUCTION TO CHEESE</b> ( Part shifted from Course IV – Unit III)</p> <ol style="list-style-type: none"> <li>1. Types of Cheese</li> <li>2. Production of Cheese</li> <li>3. Service of Cheese</li> </ol>		
<p><b>UNIT IIC</b> <b>DANGEROUS GOODS</b> (Shifted from Course VIII – Unit I)</p> <ol style="list-style-type: none"> <li>1. Dangerous goods definition and classification</li> <li>2. Rules relating to carriage of dangerous goods</li> <li>3. Cabin crew procedures for a dangerous goods emergency.</li> </ol>	15	



## SEMESTER II

### **COURSE – V**

**USDAV201 – CREW RESOURCE MANAGEMENT (CRM)**

**LECTURE  
HOURS**

**PRACTICAL  
HOURS**

#### **UNIT I –**

##### **INTERPERSONAL SKILLS**

1. Team Building
2. Handling communication between crew members
3. Interpersonal skills
4. Communicating with passengers

15

10

#### **UNIT II –**

##### **ENHANCING CREATIVITY AND RESOURCES**

1. Enhancing creativity in different areas.
2. Utilizing resources for difficult situations
3. Using innate reflexes to handle emergencies

15

#### **UNIT III –**

##### **PERSONALITY TYPES AND CREW RESOURCE MANAGEMENT**

1. Barriers to communication
2. Understanding personality types
3. Enhancing free flow of communication between crew members  
and passengers
4. Crew resource management
5. Writing resumes, handling interviews and group discussions

15

<b>COURSE - VI</b>		
<b>USDAV202 - EMERGENCY PROCEDURES IN EVACUATION AND DITCHING</b>	<b>LECTURE HOURS</b>	<b>PRACTICAL HOURS</b>
<p><b>UNIT I</b>  <b>SAFETY AND EMERGENCY PROCEDURES</b></p> <ol style="list-style-type: none"> <li>1. Emergency situations</li> <li>2. Safety and emergency procedures manual</li> <li>3. Safety demonstration</li> <li>4. Brace positions</li> <li>5. Emergency guidelines</li> </ol>	15	40
<p><b>UNIT II</b>  <b>EVACUATION</b></p> <ol style="list-style-type: none"> <li>1. Planned evacuation</li> <li>2. Briefing by the Pilot Command</li> <li>3. Briefing the cabin crew by the Cabin In-charge</li> <li>4. Emergency announcement</li> <li>5. Cabin Preparation</li> <li>6. Initiating Evacuation</li> <li>7. Unanticipated Evacuation</li> </ol>	15	
<p><b>UNIT III</b>  <b>DITCHING</b></p> <ol style="list-style-type: none"> <li>1. Evacuation over water</li> <li>2. Briefing by the Pilot in Command</li> <li>3. Briefing the cabin crew by the Cabin In-charge</li> <li>4. Emergency announcement</li> <li>5. Cabin Preparation</li> <li>6. Initiating Ditching</li> <li>7. Survival at Sea</li> </ol>	15	

**COURSE - VII**

**USDAV203 - FIRE SAFETY AND AVIATION SECURITY PROCEDURES**

**LECTURE HOURS**

**PRACTICAL HOURS**

**UNIT I**

**FIRE SAFETY AND FIRE-FIGHTING**

1. Classification of fires
2. Cabin fires and common causes
3. Lavatory fires
4. Smoke evacuation
5. Fire-fighting, equipment and procedures

15

40

**UNIT II**

**DECOMPRESSION**

1. Asphyxia and its effects
2. Rapid decompression
3. Slow decompression
4. Cabin indication for decompression
5. Actions and procedures during decompression
6. Crew incapacitation

15

**UNIT III**

**AVIATION SECURITY**

1. General precautions
2. Bomb threats, types, procedures and handling
3. Hijacking, action and procedures
4. Unruly passengers

15

<b>COURSE - VIII</b>		
<b>USDAV204 - ADAPTATIONS &amp; HEALTHY LIVING, INTRODUCTION TO WINES &amp; BEVERAGES AND MEDICAL EMERGENCIES &amp; FIRST AID</b>	<b>LECTURE HOURS</b>	<b>PRACTICAL HOURS</b>
<p><b>UNIT IA</b> (Part shifted from Course I - Unit III) <b>ADAPTATIONS AND HEALTHY LIVING</b></p> <ol style="list-style-type: none"> <li>1. Personal health</li> <li>2. Health risks of frequent flying</li> <li>3. Known effects of frequent flying</li> <li>4. Personal safety and security</li> <li>5. While travelling and at the hotel</li> <li>6. Sightseeing or staying out of the hotel</li> <li>7. Preparing for emergency while on duty travel</li> </ol>	20	40
<p><b>UNIT IB</b> (Part shifted from Course IV - Unit III) <b>INTRODUCTION TO WINES AND BEVERAGES</b></p> <ol style="list-style-type: none"> <li>1. History of wines, wine making and wine producing areas</li> <li>2. Service of wines</li> <li>3. Types of beverages</li> <li>4. Service of beverages</li> </ol>		5
<p><b>UNIT II</b> <b>MEDICAL EMERGENCIES AND FIRST AID</b></p> <ol style="list-style-type: none"> <li>1. In-flight medical emergencies</li> <li>2. Identification of roles and responsibilities</li> <li>3. Symptoms and treatment</li> <li>4. Importance of First Aid</li> <li>5. Food Poisoning</li> <li>6. Death on board</li> </ol>	15	
<p><b>UNIT III</b> <b>USE OF INFLIGHT RESOURCES</b></p> <ol style="list-style-type: none"> <li>1. Carriage of first aid and physician's kit on board</li> <li>2. Use of an on-board medical professional</li> <li>3. Use of inflight resources</li> <li>4. Blood borne pathogens and universal precautions</li> <li>5. Reporting to ground service about the nature of an emergency</li> <li>6. First aid Practicals</li> </ol>	15	

### List of Practical's

The following practicals are suggestive and minimum.  
Practicals are based on each Unit of the course in the syllabus

#### USDAV P1

- Practical 1.1: Preparation, Application and Projection of Skills.  
Grooming, Makeup and Hairstyles
- Practical 1.2: Attending passenger complaints and interaction
- Practical 1.3: Airport Code, Station Code and related terms
- familiarization from internet
- Practical 1.4: Visit to an Aircraft  
Visit to an Airline catering unit and a wine  
distribution centre.

#### USDAV P2

- Practical 2.1: Communication between crew members and passengers  
Crew Resource Management
- Practical 2.2: Swimming
- Practical 2.3: Handling and operation of fire-fighting equipment
- Practical 2.4: First Aid and Identification of dangerous goods

	THEORY	PRACTICALS	NOTIONAL	Total	Credit
Semester I	185	80	70	335	10
Semester II	185	130	70	385	10
Total	370	210	140	720	20