Government of Puerto Rico
DEPARTMENT OF EDUCATION
PUERTO RICO AVIATION MAINTENANCE INSTITUTE
FAA Approved # # DN9T092R

OPERATIONS MANUAL

Revision 6 - June 2019

Government of Puerto Rico
DEPARTMENT OF EDUCATION
PUERTO RICO AVIATION MAINTENANCE INSTITUTE
FAA Approved # # DN9T092R

RESTRICTED DATA

This data, furnished in connection with the request of the Federal Aviation Administration for the operation of the Puerto Rico Aviation Maintenance Institute, shall not be disclosed outside the Department of Education of Puerto Rico, and shall not be duplicated, used, or disclosed in whole or in part for any purpose other than to evaluate the course; provided that if the certificate is awarded to this office as result of or in connection with the submission of this data, the Government of Puerto Rico shall have the right to disclose the data to the extent provided in contract between both agencies.

Government of Puerto Rico
DEPARTMENT OF EDUCATION
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OPERATIONAL MANUAL

US 14 CFR Part 147

LIST OF EFFECTIVE PAGES

The following list shows all the effective pages for the operational manual. The Revision number and Date at the bottom right corner identifies added and revised pages. An asterisk (*) to the left of the page number indicates pages added; two asterisks (**), indicates pages deleted and three asterisks (***), indicates pages changed by the current revision.

Upon receipt of the first and subsequent revisions to this manual, the user should determine that all previous revisions have been received and incorporated. Action should be taken promptly, if the manual is not complete.

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LOG OF REVISIONS

The Director of the Technical Education Program will submit revisions to the OPERATIONAL MANUAL to the Federal Aviation Administration for approval. The revision will be numbered consecutively. Upon receipt of revisions, the holder will revise the manual as indicated on the revision letter. When the required action is completed, the individual completing the action will write the revision number, sign and record the date the revision was entered, in the space provided below.

If any previous revision is missing, the holder of the Manual will contact the General Course Coordinator prior to inserting any new revision or using the Manual

Rev. Num.	Entered by	Date
6	**Jose H. Aponte/ Aixa Ramos Casanova**	**06/07/19**

Rev. Num.	Entered by	Date

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STATEMENT OF COMPLIANCE

FEDERAL AVIATION REGULATIONS

PART 147—AVIATION MAINTENANCE TECHNICIAN SCHOOLS

The Statement of Compliance is the document that contains the information to set about the methods, policies, procedures, practices and documents by which the Director, Technical Education, Department of education and the Puerto Rico Aviation Maintenance Institute will fulfill with the Federal Aviation Regulations, Part 147 Aviation Maintenance Technician Schools.

METHOD OF COMPLIANCE	Volume	Pages
SUBPART A – GENERAL		
147.1 APPLICABILITY		
The Director of the Technical Education Program of the Department of Education of Puerto Rico (DEPR) and the Puerto Rico Aviation Maintenance Institute is prepared to comply with all part 147 requirements and general operating rules, as defined in this document.	1,2,3,4	ALL

METHOD OF COMPLIANCE			Volume	Pages
147.3	**CERTIFICATE REQUIRED**			
The Department of Education through the Puerto Rico Aviation Maintenance Institute will not operate as a certificated Aviation Maintenance Technician School, without or in violation of an Aviation Maintenance Technician School Certificate issued under this part.			1,2,3,4	ALL
147.5	**APPLICATION AND ISSUE**			
a.	An application for a certificate and ratings of Powerplant and Airframe has been made in the form and manner prescribed by the Federal Aviation Regulations – Part 147 and submitted by the Assistant Secretary of the Occupational and Technical Education Program, Puerto Rico Department of Education.		1	6
	1.	A description of the proposed curriculum.	2, 3, 4	ALL
	2.	A list of: a. facilities b. materials used (as listed in pertinent curriculum)	 1 2,3,4	 55-63 ALL
	3.	A list of instructors, including the type of certificate and ratings held, and the certificate number, and	On file at Director's Office	
	4.	A statement of the maximum number of students Puerto Rico Aviation Maintenance Institute expects to teach at any one time.	On file at Registrar's Office	

METHOD OF COMPLIANCE		Volume	Pages
b.	The Puerto Rico Aviation Maintenance Institute meets the requirements of this Part, and is entitled to an Aviation Maintenance Technician School certificate, and associated rating prescribing such operations, specifications and limitations as necessary in the interest of safety.	1	7
147.7	**DURATION OF CERTIFICATE**		
a.	The Puerto Rico Aviation Maintenance Institute recognizes that the certificate will be effective until it is surrendered, suspended or revoked.	1	SOC-3 (as expressively stated)
b.	If the School Certificate is surrendered, suspended, or revoked; the Assistant Secretary of the Occupational and Technical Education Program of the Puerto Rico Department of Education will return it to the Administrator of the Federal Aviation Administration.	1	SOC-3 (as expressively stated)
147.8	**EMPLOYMENT OF FORMER FAA EMPLOYEES**		
The Puerto Rico Aviation Maintenance Institute will not knowingly employ or make a contractual arrangement which permits an individual to act as an agent or representative in any matter before the FAA if in preceding two (2) years. 1. Has served as, or was directly responsible for the oversight of a Flight Standards Service Aviation Safety Inspector; and 2. Has direct responsibility to inspect, or oversee the inspection of, PRAMI.		1	SOC-3 (as expressively stated)

METHOD OF COMPLIANCE		Volume	Pages
SUBPART B – CERTIFICATION REQUIREMENTS			
147.11	**RATINGS**		
The Puerto Rico Aviation Maintenance Institute seeks re-certification after change of location in accordance with 14 CFR 147.41, from Forrestal Drive, Corner of Langley Drive in Roosevelt Roads Naval Air Station in Ceiba, PR to adjoining buildings of Ana Delia Flores Vocational School in Bo. Quebrada Vueltas, Fajardo, PR, for the following ratings:		1	SOC-4 (as stated)
	Airframe		
	Powerplant		
147.13	**FACILITIES, EQUIPMENT AND MATERIAL REQUIREMENTS**		
Puerto Rico Aviation Maintenance Institute is set to be located at Carr.#3 Km 49.5, Marginal, Barrio Quebrada Vueltas, Fajardo, PR 00738. This Facility shall house classroom, reference library, lab and shop facilities. As certified PRAMI will have and continue to maintain facilities, equipment and materials specified in Part 147.15 through 147.19 that are appropriate for the ratings sought.		1	Facilities: 55-63 Equipment and Materials: 65-67
147.15	**SPACE REQUIREMENTS**		
The Puerto Rico Aviation Maintenance Institute has the following properly lighted, ventilated and temperature control facilities (air conditioned classroom and workshops with ambient air temperature) as are appropriate for the ratings and maximum number of students expected to be taught at any time.		1	SOC-4 (as stated)
a.	Enclosed classrooms suitable for teaching theory classes	1	55-63
b.	Suitable facilities, located in the training area, arranged to assure proper separation from the working space, for parts, tools, materials and similar articles.	1	55-63

METHOD OF COMPLIANCE			Volume	Pages
c.	Suitable paint room for application of finishing materials, including paint spraying. Particular attention will be paid to comply with local, state and federal regulations regarding finishing materials.		1	60
d.	A parts cleaning station equipped with a solvent wash tank and compressed air is installed in the lap/shop area.		1	Portable and located as required
e.	A suitable engine run area is provided outside the shop/lab.		1	55
f.	All Lab/shop areas are equipped with adequate equipment, including benches, tables and test equipment to disassemble, service and inspect all components and systems listed in the curriculum.		1	
	1.	A supply of magnetos, turbine engine ignition components, starters generators and other electrical equipment and appliances is present in the lab/shop areas and mounted on system trainers,	1	65-67
	2.	A supply of float and pressure carburetors, and fuel injection systems are available for student use.	1	65-67
	3.	Hydraulic and vacuum systems for aircraft, and aircraft engines and their appliances are available for students use.	1	65-67
g.	Suitable space with adequate equipment, including tables, benches, stands, jacks for disassembling, inspecting and rigging aircraft.		1	

METHOD OF COMPLIANCE			Volume	Pages
h.	Suitable space with adequate equipment for disassembling, inspecting, assembling, troubleshooting and timing engines.		1	
147.17	**INSTRUCTIONAL EQUIPMENT REQUIREMENTS**			
a.	The Puerto Rico Aviation Maintenance Institute has the following instructional equipment, which is proper for the ratings sought:			
	1.	A variety of airframe structures, airframe systems and components, powerplant, and powerplant systems and components (including propellers) is available for student use. They are of a quantity and type suitable to complete the Practical Projects required in the approved curriculums.	1	65-67 (inventory) & (as required in pertinent shops)
	2.	One aircraft type currently certificated by the Federal Aviation Administration for private or commercial operation, with powerplant, propeller, instruments, navigation and communication equipment, landing lights, and other equipment and accessories on which a maintenance technician might be required to work and which the technician should be familiar with, Serve to meet the specific requirements of 147.17 (a) (2).	1	
b.	The equipment required by paragraph (a) of this section is not in airworthy condition. However, they are complete assemblies.		1	Refer to a1 & a2 of this page

METHOD OF COMPLIANCE		Volume	Pages
c.	Airframe, Powerplant, propellers, appliances, and components on which instruction is to be given, and from which practical working experience is to be gained, are so diversified to show the different methods of construction, assembly, inspection, and operation when installed in an aircraft for use. There are enough units, so that not more than eight (8) students will work on any one at a time.	1	65-67
d.	The aircraft used for instructional purposes have retractable landing gear and wing flaps. PRAMI additionally has appropriate mockups available to meet this requirement.	1	65-67
147.19	**MATERIAL, SPECIAL TOOLS AND SHOP EQUIPMENT REQUIREMENTS**		
The Puerto Rico Aviation Maintenance Institute has an adequate supply of materials, special tools, and shop equipment as are appropriate to the approved curriculum and are used in the construction and maintenance of aircraft to assure that each student will be properly instructed. The special tools and shop equipment are in satisfactory working condition for the purpose for which they are to be used.		1	65-67 Inventory is kept on file at Administrative Assistant's Office
147.21	**CURRICULUM REQUIREMENTS**		
a.	The Puerto Rico Aviation Maintenance Institute has an approved curriculum that has been designed to qualify students to perform the duties of a mechanic for a particular rating or ratings.	2, 3, 4	ALL

METHOD OF COMPLIANCE			Volume	Pages
b.	The curriculum offers at least the following number of hours for the rating shown, and the instruction unit hours shall be not be less than 50 minutes.		1	18, 20, 21, 22, APP B-1, APP C-1, APP D-1
	Combined General plus Airframe is 1,186 hours; and General plus Powerplant is 1,174 hours (General 424 hours, Airframe 762 hours, Powerplant 750 hours).		1	18, 20, 21, 22, APP B-1, APP C-1, APP D-1
c.	The descriptions of the curriculum covers the subjects and items prescribed in appendixes B, C, and D; as applicable. The description includes course outlines, proficiency levels, practical projects and required test for each subject in the curriculum. Each item shall be taught to at least the indicated level of proficiency, as defined in Appendix A.		1, 2, 3, 4	ALL
d.	The curriculum shows:		1, 2, 3, 4	ALL
	1.	The required practical project to be completed.	1,2,3,4	ALL
	2.	For each subject, the proportions of theory and other instructions to be given; and	1,2,3,4	ALL
	3.	A list of minimum required tests to be given	1,2,3,4	ALL

METHOD OF COMPLIANCE		Volume	Pages
e.	Notwithstanding the provisions of paragraphs (a) through(d) of this section and section 147.11, the holder of a certificate issued under subpart B of this part may apply for and receive approval of special courses for the performance of special inspection and preventive maintenance programs for primary category aircraft type certificate under section 21.24 (b). The Institute may also issue certificates of competency to persons completing such courses provided that all other requirements of this part are met. The certificate of competency specifies the aircraft make, model and the certificate applies.	1	SOC-9
147.23	**INSTRUCTOR REQUIREMENTS**		
The Puerto Rico Aviation Maintenance Institute will provide the number of instructors holding the appropriate mechanic certificates and ratings necessary to provide adequate instruction and supervision of the students, including at least one (1) instructor for each twenty-five (25) students in each shop class. Those that are working as instructors and have had their certificate of mechanic suspended or revoked by the Federal Aviation Administration (FAA) will be suspended from their position by the Secretary of the Puerto Rico Department of Education. If the certificate of mechanic has ever been suspended or revoked by the Federal Aviation Administration, that person will never be permitted to work as an instructor. Instructors working for the first time at PRAMI will submit certification from FAA. The Director of the Technical Education Program of the Puerto Rico Department of Education and the school will maintain a list of names, certificate numbers and qualifications of the specialized instructors and provide a copy of the list to the FAA with any changes for approval.		1	SOC-9

METHOD OF COMPLIANCE		Volume	Pages
SUBPART C – OPERATION RULES			
147.31	**ATTENDANCE AND ENROLLMENT, TEST AND CREDIT FOR PRIOR INSTRUCTION OR EXPERIENCE**		
a.	PRAMI will not require any student to attend classes of instruction for more than eight (8) hours on any day or more than six (6) days or 40 hours in any 7day period.	1	36
b.	PRAMI shall give an appropriate test to each student who completes a unit of instruction as shown in the approved curriculum.	1, 2, 3, 4	ALL
c.	The Puerto Rico Aviation Maintenance Institute will not graduate a student unless he/she has completed all the appropriate curriculum requirements. The Puerto Rico Aviation Maintenance Institute will credit a student with previous instruction or experience as established by the Policy for Credit for Prior Instruction or Experience.	1	11
d.	PRAMI will not have more students enrolled than the number stated on the application for a certificate, unless it amends the application, and has it approved.	1	SOC-9 SOC-13

METHOD OF COMPLIANCE			Volume	Pages
e.	PRAMI uses an approved system for determining the final course grades and for recording student attendance. The system will show the hours of absence allowed and show how the missed material will be made available to the student.		1	36-39 40-46
147.33	**RECORDS**			
a.	The Puerto Rico Aviation Maintenance Institute will keep a current record of each student enrolled, showing:			
	1.	His attendance, test, and grades received on the subjects required by this Part;	1	48
	2.	The instruction credited to him under US 14 CFR Part 147.31(c) and,	1	48
	3.	The authenticated transcript of his grades from that school to make it official. School stamp affixed to transcript and sealed envelope.	1	48-49
	The Registrar's office retains the record for at least two years after the end of the student's enrollment and will make each record available for inspection by the administrator during that period.		1	15,48

METHOD OF COMPLIANCE		Volume	Pages
b.	The Puerto Rico Aviation Maintenance Institute will keep an individual progress record for each of its students showing the Practical Projects or laboratory work completed or to be completed by the student in each subject.	1	36-39 40-46
147.35	**TRANSCRIPTS AND GRADUATION CERTIFICATES**		
a.	Upon request, the Puerto Rico Aviation Maintenance Institute will provide a transcript of the student's grades to each student who has graduated or who leaves it before having graduated. The Campus Executive Director, otherwise the Program Coordinator and the Registrar or Designated Official will sign the transcript to make it official. The transcript will state the curriculum in which the student was enrolled, whether the student satisfactorily completed the curriculum, or not and the final grades the student received.	1	48-49
b.	The Puerto Rico Aviation Maintenance Institute will give a Curriculum Completion Certificate to each student for each completed course (General, Powerplant and Airframe Curriculums). The completion certificate shall be signed by the Campus Executive Director otherwise the Program Coordinator, and the Registrar or Designated Official, to make it official. Upon completion of the three curriculums, the Puerto Rico Department of Education shall confer the student a Graduation Diploma signed: **AVIATION MAINTENANCE TECHNOLOGY.**	1	51

METHOD OF COMPLIANCE		Volume	Pages
147.36	**MAINTENANCE OF INSTRUCTORS REQUIREMENTS**		
The certified Puerto Rico Aviation Maintenance Institute will continue to provide the number of instructors holding the appropriate mechanic certificates and ratings that the Administrator determines necessary to provide adequate instruction to the student, including at least one such instructor for each 25 students in each shop class. Those that are working as instructors and have had their certificate of mechanic suspended or revoked by the Federal Aviation Administration (FAA) will be suspended from their position by the Secretary of the Puerto Rico Department of Education. The Assistant Secretary of the Occupational and Technical Education Program of the Puerto Rico Department of Education and PRAMI will provide a list of instructors with the names, certificate numbers and qualifications of the instructors to the Federal Aviation Administration for approval.		1	SOC-9 and as stated
147.37	**MAINTENANCE OF FACILITIES, EQUIPMENT AND MATERIAL**		
a.	Puerto Rico Aviation Maintenance Institute will provide the facilities, equipment and material equal to the standards required for the issuance of the certificate and ratings that it holds.	1	55-67
b.	The Institute will not make a substantial change in the facilities, equipment of materials that have been approved, unless that change has been approved in advanced.	1	SOC-13 As stated

METHOD OF COMPLIANCE		Volume	Pages
147.38	**MAINTENANCE OF CURRICULUM REQUIREMENTS**		
a.	To ensure adherence to its approved curriculum, the Puerto Rico Aviation Maintenance Institute will conduct internal audits by the Campus Executive Director, the curriculum that has been submitted for approval includes teaching levels which meet, but do not exceed, those shown in Appendix A of this part, should Puerto Rico Aviation Maintenance Institute determine that a revision to the curriculum is necessary, any and all changes, including the elevation of teaching levels, shall be submitted to the FAA for approval prior to implementation.	1, 2, 3, 4	ALL
b.	The Puerto Rico Aviation Maintenance Institute will not change its approved curriculum unless the change had been received approved from the FAA administrator.	1	SOC-14 (as stated)
147.38a	**QUALITY OF INSTRUCTION**		
The Puerto Rico Aviation Maintenance Institute will prove instruction of such a quality as to comply with the passing percentages outlined in this section of the 14 CFR Part 147. The results and the national passing norms are continuously monitored by the administration**.** PRAMI is aware of the criteria for monitoring schools and the use of national norms to determine quality of education.		1	53

METHOD OF COMPLIANCE	Volume	Pages
147.39 DISPLAY OF CERTIFICATE		
The Puerto Rico Aviation Maintenance Institute will display the Federal Aviation Administration Air Agency Certificate at the administrative office main entrance in plain view, accessible to the public and not obscured. The certificate will be available for inspection by the Federal Aviation Administration.	1	7
147.41 CHANGE IN LOCATION		
The DEPR and PRAMI will not make any change in the school's location without providing written notice at least 30 days prior to the date that the change is contemplated. A change of location will require a new FAA Form 8310-6 to be completed and submitted to the FSDO.	1	6
147.43 INSPECTION		
The Puerto Rico Department of Education recognizes the Federal Aviation Administration may, at any time, inspect the Puerto Rico Aviation Maintenance Institute to determine its compliance with this Part. Such inspection is normally made once every six months to determine if the school continues to meet the requirements under which it was originally certificated. Inspection should begin with notification given to the Campus Executive Director. After such inspection is made, The Campus Executive Director and the Technical Education Program Director of the Puerto Rico Department of Education will be notified, in writing, of any deficiencies found during the inspection.	1	SOC-15 (as stated)

METHOD OF COMPLIANCE		Volume	Pages
147.45	**ADVERTISING**		
a.	The Puerto Rico Aviation Maintenance Institute will not make any statement relating to itself that is false or is designed to mislead any person considering enrollment therein.	1	13-14 SOC-16 (as stated)
b.	Whenever the Puerto Rico Aviation Maintenance Institute publishes advertising, it will indicate that it is a Federal Aviation Administration certificated school and it will clearly distinguish between its approved courses and those that are not approved.	1	13-14 SOC-16 (as stated)

GENERAL INFORMATION

General Operational Manual Information

This OPERATIONAL MANUAL is divided into sections according to subject matter. The Table of Contents lists sections and specific material. Each section has a title page, which lists the specific material covered. Whenever possible, the applicable Federal Aviation Regulations are listed under the specific material.

Manual revisions are published as necessary. The Campus Executive Director of Puerto Rico Aviation Maintenance Institute will be responsible for promptly incorporating the revisions in the Institute Operational Manual and Curriculums and will issue copies of the revisions to each Manual holder. The revision number and effective date are at the bottom right-hand side of each page in this Manual and the curriculum volumes.

Purpose of Operational Manual

The purpose of this Manual is to establish the Policies and provide the Operational Procedures for the Puerto Rico Aviation Maintenance Institute. It is the responsibility of each assigned Manual holder to familiarize himself or herself thoroughly with this material.

Operational Manual Distribution

The following personnel will be issued copies of this Operational Manual and each Course Curriculum and will be responsible for the knowledge of its contents as it applies to their area of responsibility or authority.

1. The Secretary of the Puerto Rico Department of Education
2. Assistant Secretary of the Occupational and Technical Program,
3. Director of the Technical Education Program
4. Federal Aviation Administration – Local Flight Standards District Office

5. Campus Executive Director of the Puerto Rico Aviation Maintenance Institute

6. Registrar

7. Program Coordinator

8. Instructors

HISTORY

The Puerto Rico Aviation Maintenance Institute (PRAMI) was originally established as an Aviation Maintenance Technician Course at the Miguel Such Metropolitan Vocational School and obtained its approval from the Federal Aviation Administration during the years of 1953 – 54. In 2009, the course relocated as an independent school to new facilities at the airport of the former Naval Base Roosevelt Roads, which is named Jose Aponte De La Torre Airport in the municipality of Ceiba. In 2019 PRAMI was relocated to the adjoining buildings in the Ana Delia Flores Vocational High School in Fajardo. PRAMI is the only FAA approved school in Puerto Rico and the Caribbean providing the opportunities for the study of Aircraft Maintenance. The course is exemplary in many ways and sets a reputation within the Department of Education of the Government of Puerto Rico. The Puerto Rico Department of Education has dedicated its resources to the process of reconstructing the Aviation Maintenance Technician Course to meet the new industry technology and requirements.

PHILOSOPHY

The Puerto Rico Aviation Maintenance Institute is a postsecondary institution that aims to develop in students' competencies and technical abilities with an educational plan based on Part 147 of the Federal Aviation Regulations. PRAMI offers quality and excellence in the training of future professionals. Provide good work ethics in a technical education setting. We strive to form people with commitment and respect for their profession who will act as agents of change in the competitive world of Aeronautics.

CORE EDUCATIONAL OBJECTIVES

The purpose of the Puerto Rico Aviation Maintenance Institute is to provide quality occupational aviation education to postsecondary students to serve the aviation industry by:

1. Developing individuals through technical instruction with the marketable skills for successful employment in the aviation industry or related occupations.

2. Instructing students in the fundamentals of aircraft technology to a level of competence, which qualifies them to obtain an Airframe and Powerplant Technical certificates.

3. Offering supportive services to help students become productive and to be effective leaders in the aviation industry.

4. Providing the community and local aviation industry with qualified individuals for the work force.

GOALS

The Puerto Rico Aviation Maintenance Institute has the responsibility to give the postsecondary students practical training and knowledge in the specialized skills of Aviation Maintenance, to become a Federal Aviation Administration Certified Airframe and/or Powerplant Mechanic.

At the completion of this training, the student will be able to:

1. Properly interpret the Federal Aviation Regulation governing the maintenance of aircraft and mechanic privileges and limitations.

2. Demonstrate a working knowledge of the specific competencies and related technical knowledge employed in the aviation maintenance field.

3. Understand the mechanical and scientific principles normally involved in the aviation industry.

4. Demonstrate manipulative skills and technical knowledge to be able to learn quickly newer technologies upon entering the aviation industry.

5. Apply the process of logical stepbystep diagnostic procedures.

6. Apply recommended industry safety practices of aircraft maintenance.

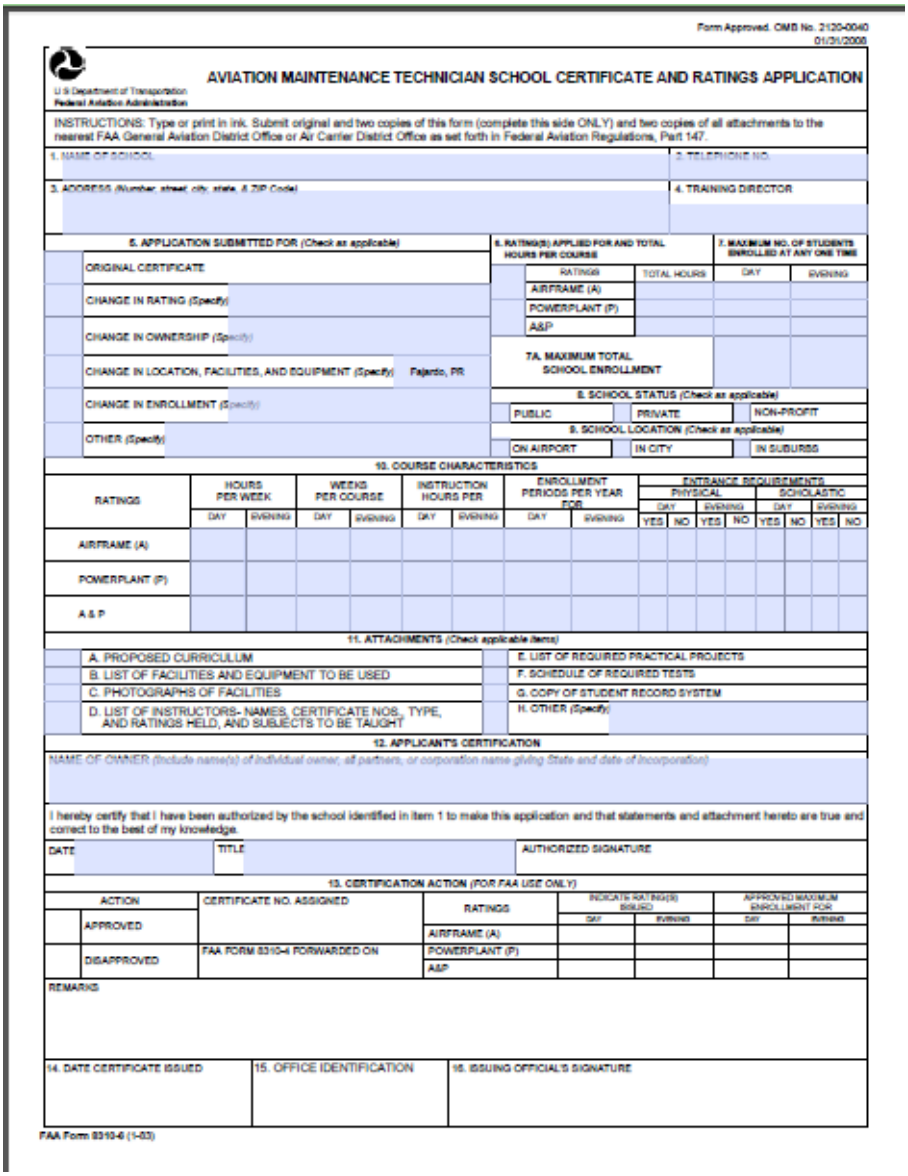
7. Perform correctly all the duties and tasks established in PRAMI'S Operational Manual.

MISSION STATEMENT

Provide quality education and training to attain personal and professional growth of every individual participating in the Aircraft Maintenance Course. Prepare students with the skills, knowledge and required attitude to pursuit and achieve a career in the aviation field.

US 14 CFR Part 147.5

Certificate and Rating Application FAA FORM 8310-6



Form Approved. OMB No. 2120-0040
01/31/2000

U.S Department of Transportation
Federal Aviation Administration

AVIATION MAINTENANCE TECHNICIAN SCHOOL CERTIFICATE AND RATINGS APPLICATION

INSTRUCTIONS: Type or print in ink. Submit original and two copies of this form (complete this side ONLY) and two copies of all attachments to the nearest FAA General Aviation District Office or Air Carrier District Office as set forth in Federal Aviation Regulations, Part 147.

1. NAME OF SCHOOL | 2. TELEPHONE NO.

3. ADDRESS (Number, street, city, state, & ZIP Code) | 4. TRAINING DIRECTOR

5. APPLICATION SUBMITTED FOR (Check as applicable)
- ORIGINAL CERTIFICATE
- CHANGE IN RATING (Specify)
- CHANGE IN OWNERSHIP (Specify)
- CHANGE IN LOCATION, FACILITIES, AND EQUIPMENT (Specify) Fajardo, PR
- CHANGE IN ENROLLMENT (Specify)
- OTHER (Specify)

6. RATING(S) APPLIED FOR AND TOTAL HOURS PER COURSE

RATINGS	TOTAL HOURS
AIRFRAME (A)	
POWERPLANT (P)	
A&P	

7. MAXIMUM NO. OF STUDENTS ENROLLED AT ANY ONE TIME: DAY | EVENING

7A. MAXIMUM TOTAL SCHOOL ENROLLMENT

8. SCHOOL STATUS (Check as applicable): PUBLIC | PRIVATE | NON-PROFIT

9. SCHOOL LOCATION (Check as applicable): ON AIRPORT | IN CITY | IN SUBURBS

10. COURSE CHARACTERISTICS

RATINGS	HOURS PER WEEK (DAY / EVENING)	WEEKS PER COURSE (DAY / EVENING)	INSTRUCTION HOURS PER (DAY / EVENING)	ENROLLMENT PERIODS PER YEAR FOR (DAY / EVENING)	ENTRANCE REQUIREMENTS: PHYSICAL (DAY YES / DAY NO / EVENING YES / EVENING NO)	ENTRANCE REQUIREMENTS: SCHOLASTIC (DAY YES / DAY NO / EVENING YES / EVENING NO)
AIRFRAME (A)						
POWERPLANT (P)						
A & P						

11. ATTACHMENTS (Check applicable items)
- A. PROPOSED CURRICULUM
- B. LIST OF FACILITIES AND EQUIPMENT TO BE USED
- C. PHOTOGRAPHS OF FACILITIES
- D. LIST OF INSTRUCTORS- NAMES, CERTIFICATE NOS., TYPE, AND RATINGS HELD, AND SUBJECTS TO BE TAUGHT
- E. LIST OF REQUIRED PRACTICAL PROJECTS
- F. SCHEDULE OF REQUIRED TESTS
- G. COPY OF STUDENT RECORD SYSTEM
- H. OTHER (Specify)

12. APPLICANT'S CERTIFICATION

NAME OF OWNER (Include name(s) of individual owner, all partners, or corporation name giving State and date of incorporation)

I hereby certify that I have been authorized by the school identified in item 1 to make this application and that statements and attachment hereto are true and correct to the best of my knowledge.

DATE | TITLE | AUTHORIZED SIGNATURE

13. CERTIFICATION ACTION (FOR FAA USE ONLY)

ACTION	CERTIFICATE NO. ASSIGNED	RATINGS	INDICATE RATING(S) ISSUED: DAY	INDICATE RATING(S) ISSUED: EVENING	APPROVED MAXIMUM ENROLLMENT FOR: DAY	APPROVED MAXIMUM ENROLLMENT FOR: EVENING
APPROVED		AIRFRAME (A)				
DISAPPROVED	FAA FORM 8310-4 FORWARDED ON	POWERPLANT (P)				
		A&P				

REMARKS

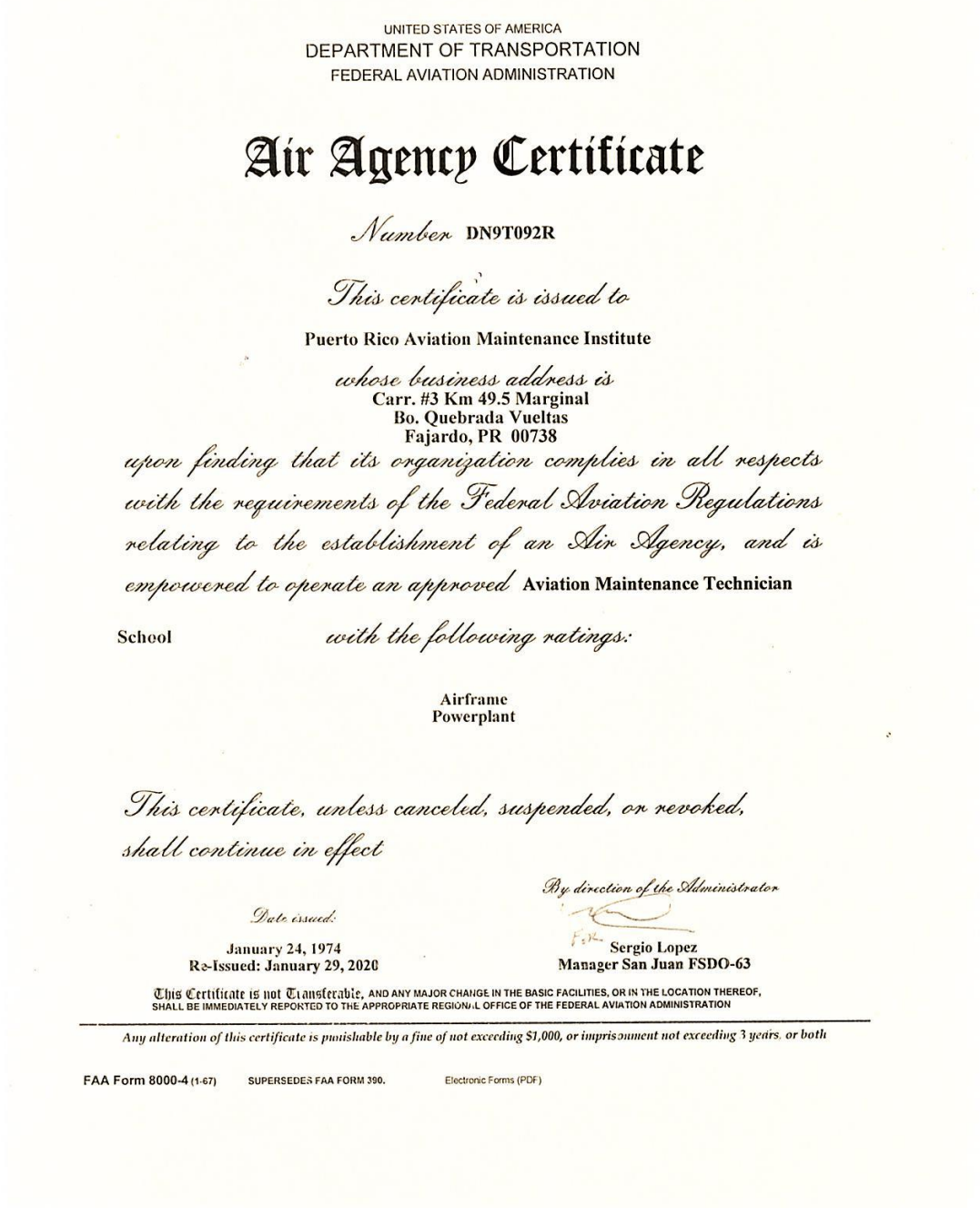
14. DATE CERTIFICATE ISSUED | 15. OFFICE IDENTIFICATION | 16. ISSUING OFFICIAL'S SIGNATURE

FAA Form 8310-6 (1-03)

Figure 1 AMTS Application FAA Form 8310-6

Instructions for the completion of this form will be found in AC 147.3A, as revised

US 14 CFR Part 147.5



UNITED STATES OF AMERICA
DEPARTMENT OF TRANSPORTATION
FEDERAL AVIATION ADMINISTRATION

Air Agency Certificate

Number **DN9T092R**

This certificate is issued to

Puerto Rico Aviation Maintenance Institute

whose business address is
Carr. #3 Km 49.5 Marginal
Bo. Quebrada Vueltas
Fajardo, PR 00738

upon finding that its organization complies in all respects with the requirements of the Federal Aviation Regulations relating to the establishment of an Air Agency, and is empowered to operate an approved **Aviation Maintenance Technician School** *with the following ratings:*

Airframe
Powerplant

This certificate, unless canceled, suspended, or revoked, shall continue in effect

By direction of the Administrator

Date issued:
January 24, 1974
Re-Issued: January 29, 2020

Sergio Lopez
Manager San Juan FSDO-63

This Certificate is not Transferable, AND ANY MAJOR CHANGE IN THE BASIC FACILITIES, OR IN THE LOCATION THEREOF, SHALL BE IMMEDIATELY REPORTED TO THE APPROPRIATE REGIONAL OFFICE OF THE FEDERAL AVIATION ADMINISTRATION

Any alteration of this certificate is punishable by a fine of not exceeding $1,000, or imprisonment not exceeding 3 years, or both

FAA Form 8000-4 (1-67) SUPERSEDES FAA FORM 390. Electronic Forms (PDF)

Figure 2 Aviation Maintenance Technician School Operation Certificate

(Original Certificate Will be Maintained Displayed in the Administration Office)

Academic Year Calendar

Copy of the current Department of Education of Puerto Rico calendar is to be kept on file and displayed in the administration office of PRAMI.

Purpose of Puerto Rico Aviation Maintenance Institute

The purpose of the Puerto Rico Aviation Maintenance Institute is to provide quality technical aviation education to postsecondary students to serve the aviation industry by:

1. Developing individuals through technical instruction with the marketable skills for successful employment in the aviation industry or related occupations.

2. Instructing students in the fundamentals of aircraft technology to a level of competence, which qualifies them to obtain an Airframe and Powerplant Technical certificates.

3. Offering supportive services to help students become productive and to be effective leaders in the aviation industry.

4. Providing the community and local aviation industry with qualified individuals for the work force.

Admission

The Puerto Rico Aviation Maintenance Institute as an Equal Opportunity/Affirmative Action Employer complies with the applicable federal and state laws prohibiting discrimination, including Title IX of the Education Amendments of 1972, and the Rehabilitation Act of 1973. It is the policy of the school that, no person shall be discriminated against on the basis of the race, color, religion, national origin, age, marital status, handicap, or veteran status in employment, educational programs, activities or admissions.

The Puerto Rico Aviation Maintenance Institute administrative office will process the student's application for admission to the Puerto Rico Aviation Maintenance Institute. Application for enrollment will be for admission in August and January. The deadlines for acceptance will be April 15th for admission in August and November 15th for admission in January. This is the date by which the students shall have all the required documentation on file in order to receive equal consideration by the Admissions Committee

To be admitted, an applicant must be a graduate from an accredited high school or have obtained their General Education Diploma (GED). The student must attain the age of 18 years in order to be awarded an Airframe and/ or Powerplant Mechanic certificate by The Federal Aviation Administration. Students must be able to read, write, speak and understand the English language. Applicant must submit a government issued photo ID, such as copy of a valid state issued Driver's license, copy of a valid state issued identification card or copy of a valid passport.

Students with previous aviation maintenance instruction or experience as per 14 CFR Part 147.31c must complete and approve at least sixty percent (60%) of the school curriculum to be eligible for the certificate applied for.

The Admission requirements are designed to assure that each student who is granted the opportunity to enroll in the Puerto Rico Aviation Maintenance Institute has been evaluated and considered equally among the other applicants.

US 14 CFR Part 147.31(c)

Policy for Credit of Prior Instruction or Experience

The Puerto Rico Aviation Maintenance Institute – may grant credit to student with prior aviation maintenance instruction or aviation experience as follows:

1. The Registrar's Office at the Puerto Rico Aviation Maintenance Institute may grant credit to an applicant with prior instruction satisfactorily completed at:

   a. An accredited university, college, or junior college;

   b. An accredited vocational, technical, trade or high school;

   c. A military technical school;

   d. A Federal Aviation Administration (FAA) approved Part 147 Aviation Maintenance Technician School.

2. The Registrar's Office at the Puerto Rico Aviation Maintenance Institute may determine the amount of credit to be allowed:

   a. By an entrance exam equal to one given to the students who complete a comparable required curriculum subject at the crediting school;

   b. By an evaluation of an official transcript from the student's former school using catalogs, course description and other documents; or

Policy for Credit of Prior Instruction or Experience (continued):

c. In the case of an applicant from a military technical school, credit may be granted only on the basis of an entrance exam. As specified in section 147.31(c) (2) (iii) of 14 CFR Part 147, as revised.

d. The Registrar's Office at the Puerto Rico Aviation Maintenance Institute may grant credit to a student with previous aviation maintenance experience comparable to the required curriculum subjects. The amount of credit to be allowed will be determined by the documents submitted by the applicant verifying that experience, and by giving the applicant a test equal to the one given to students who complete the comparable required curriculum subject at the Puerto Rico Aviation Maintenance Institute .

4. The Registrar's Office at the Puerto Rico Aviation Maintenance Institute may grant credit to a student seeking an additional rating with previous satisfactorily completion of the general portion of a Federal Aviation Administration approved (Part 147) Aviation Maintenance Technician School Curriculum.

US 14 CFR Part 147.45

Advertising

The Puerto Rico Aviation Maintenance Institute will not make any statement relating to itself that is false or is designed to mislead any person considering enrollment therein

Whenever the Puerto Rico Aviation Maintenance Institute publishes advertising, it will indicate that it is a Federal Aviation Administration certificated school and it will clearly distinguish between its approved courses and those that are not approved.

US 14 CFR Part 147.45

Advertising

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STUDENT SERVICES

Office of Counselor	The principle objective of the counseling program is the development of services and activities that will permit the integral growth of the student. The program intends to help and evaluate their activities, limitations, abilities and interests so that the can get to know themselves and in this manner manage to face with greater certainty the difficult and changing challenges of the present and of the future.
Office of Financial Aid	(To be established in the future) This office has the basic function to help the student in those economic problems that can affect their academic proficiency. It offers orientation toward programs of financial aid available, their standards and regulations, distributes and processes the applications of the institutional financial aid for the different federal grants.
Admission's Office	This office has the function of the promotion and advertising and recruitment of students for PRAMI. It will process the applications for admissions and coordinate the scheduling and notification of the candidates of the interviewing and testing process.
Registrar	It has as its primordial purpose to maintain an adequate system to keep all records of the students and to establish and carry out all the various processes such as: admission, registration, readmission, transfers, withdrawals, graduation, student verification, certifications and diplomas.

Industry Coordinator	The principle objective is the development of placement services and activities that will provide the required Aviation Industry Practice to the students. Their main functions are: Publish and promote the Puerto Rico Aviation Maintenance Institute in the Aviation industry. Maintain a Register of the students that meet the requirements for training. Prepare and maintain current records of the students under his/her responsibility. Prepare and submit, through the corresponding levels and channels, all reports related with the cooperative program.
Technical Library	The Technical Library provides a variety of support services including internet access to students. This includes access to FAA website http://www.faa.gov for the most current CFR's, TCDS, AD's, STC's, and advisory circulars. This will also include online access to all required maintenance manuals and current technical data. The manuals are provided by the suppliers of all of teardown components including engines, propellers and accessories used in instruction. In addition, it will also maintain the required maintenance manuals for mockups used for instructional purposes.

ORGANIZATIONAL CHART

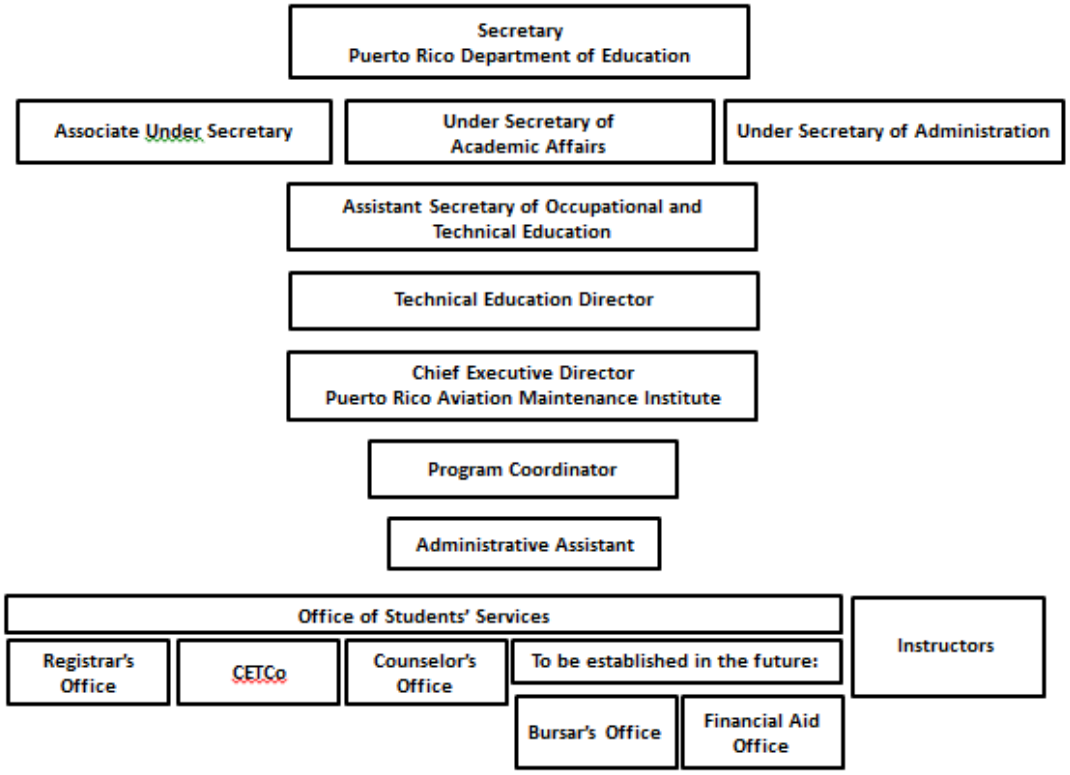

Figure 3

Notes:

1. For the management of the Aviation Maintenance Technician Course, the Campus Executive Director of the Puerto Rico Aviation Maintenance Institute reports directly to the Secretary of occupational and Technical Education
2. For academic and administrative matters; the Campus Executive Director of the Puerto Rico Aviation Maintenance Institute reports to the Technical Education Director.
3. Office of Student's Services: Admissions, Registrar, CETCo, Counselor, Financial Aid, Bursar.

COURSE DESCRIPTION

The Puerto Rico Aviation Maintenance Institute offered by the Department of Education is described in four (4) volumes.

Volume 1 – Operational Manual
Volume 2 – General Curriculum
Volume 3 – Airframe Curriculum
Volume 4 – Powerplant Curriculum

The total combined hours for the Puerto Rico Aviation Maintenance Institute is:

	Number of hours
GENERAL	**424**
AIRFRAME	**762**
POWERPLANT	**750**

	Total combined hours
GENERAL PLUS AIRFRAME	**1,186**
GENERAL PLUS POWERPLANT	**1,174**

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General Curriculum

SUBJECTS		THEORY	SHOP LAB	TOTAL HOURS
1.	Safety Communications Program	18	6	24
2.	Mechanic Privileges and Limitations	6	4	10
3.	Maintenance Publications	18	15	33
4.	Mathematics	15	15	30
5.	Basic Physics	21	18	39
6.	Aircraft Drawing	15	14	29
7.	Ground Operation and Servicing	10	10	20
8.	Weight and Balance	24	20	44
9.	Materials and Processes	30	25	55
10.	Cleaning and Corrosion Control	12	10	22
11.	Fluid Lines and Fittings	12	8	20
12.	Basic Electricity	48	30	78
13.	Maintenance Forms and Records	12	8	20
	TOTALS	**241**	**183**	**424**

Airframe Curriculum

SUBJECTS		THEORY	SHOP LAB	TOTAL HOURS
1.	Wood Structures	6	6	12
2.	Aircraft Covering	6	6	12
3.	Aircraft Electrical System	48	60	108
4.	Aircraft Instrument System	12	12	24
5.	Communication and Navigation Systems	18	18	36
6.	Position and Warning Systems	6	12	18
7.	Ice and Rain Control Systems	9	9	18
8.	Cabin Atmosphere Control Systems	18	12	30
9.	Fire Protection Systems	6	6	12
10.	Aircraft Fuel Systems	12	24	36
11.	Hydraulic and Pneumatic Power Systems	18	30	48
12.	Aircraft Landing Gear System	28	44	72
13.	Assembly and Rigging	24	48	72
14.	Sheet Metal and NonMetallic Structures	66	96	162
15.	Welding	18	24	42
16.	Aircraft Finishes	12	12	24
17.	Airframe Inspection	12	24	36
	TOTALS	**319**	**443**	**762**

Powerplant Curriculum

SUBJECTS		THEORY	SHOP LAB	TOTAL HOURS
1.	Propeller	33	33	66
2.	Engine Fire Protection Systems	9	9	18
3.	Induction and Engine Airflow	9	9	18
4.	Engine Electrical Systems	25	25	50
5.	Ignition and Starting System	37	37	74
6.	Engine Fuel systems	9	9	18
7.	Fuel Metering Systems	30	30	60
8.	Engine Cooling Systems	9	9	18
9.	Lubrication Systems	25	25	50
10.	Engine Exhaust and Reverser	15	15	30
11.	Reciprocating Engine	75	75	150
12.	Turbine Engine	60	60	120
13.	Auxiliary Power Unit	6	6	12
14.	Engine Instrument Systems	15	15	30
15.	Unducted Fans	4	2	6
16	Engine Inspection	15	15	30
	TOTALS	**376**	**374**	**750**

TEXTBOOKS

GENERAL CURRICULUM

1. A & P Technician General Textbook – Jeppesen

2. General Technician Test Guide with Oral and Practical Study Guide – Jeppesen

3. FAR for Aviation Maintenance Technicians (as revised) – Jeppesen

4. The Aviation Dictionary – Jeppesen

5. Acceptable Methods, Techniques and Practices of Aircraft Inspection and Repair - AC43.13-1B/2B (as revised)

6. Aviation Maintenance Technician Handbook – General – FAA-H-8083-30A (as revised)

AIRFRAME CURRICULUM

1. A & P Technician Airframe Textbook – Jeppesen

2. Airframe Technician Test Guide with Oral and Practical Study Guide – Jeppesen

3. Aviation Maintenance Technician Handbook – Airframe – FAA-H-8083-31A Vol. 1 & 2 (as revised)

POWERPLANT CURRICULUM

1. A & P Technician Powerplant Textbook – Jeppesen

2. Powerplant Technician Test Guide with Oral and Practical Study Guide – Jeppesen

3. Aviation Maintenance Technician Handbook – Powerplant – FAA-H-8083-32A Vol. 1 & 2 (as revised)

RULES AND PROCEDURES

GENERAL STANDARDS OF CONDUCT

In establishing a standard of student conduct, the Department of Education of Puerto Rico is committed to the basic principles of entrusting each postsecondary student with a high degree of conduct, while enrolled at the PRAMI. The PRAMI Instructors will encourage their students to use their wisdom and good judgment, and to accept the responsibility inherent to his or her role.

The student is expected to develop his/her relationship with integrity; to respect the rights and properties of others; to comply with Department of Education of Puerto Rico Postsecondary Student's General Regulations (as revised), the Puerto Rico Aviation Maintenance Institute. Student Regulations and public laws; and to behave with high standards of personal and social conduct.

Classrooms, workshop, the library, office equipment and computers are examples of a wide variety of facilities that serve as aids for instruction and research. Their use is limited to the purpose for which they are made available and any misuse will be subject to disciplinary action. Student identification cards and uniforms are required in order to enter the facilities, especially the main library, dining room and workshop.

- The Department of Education of Puerto Rico (DEPR) reserves the right to discipline or dismiss any student whose conduct or performance is considered unsatisfactory. The appropriate Puerto Rico Aviation Maintenance Institute Disciplinary Committee will make such a decision only after review. During this review, the student will have full opportunity to present his/her position and has also the right of appeal as established by the DEPR Postsecondary Student Regulations.

SAFETY AND EMERGENCY PROCEDURES

A SAFETY ATTITUDE MUST BE DEVELOPED IN STUDENTS TO FOCUS THEIR ATTENTION ON THE PREVENTION OF POSSIBLE ACCIDENTS. Students must develop concepts f safe work habits and awareness of the dangers that exists when handling equipment, tools and machinery. It is the instructor's responsibility to assist the student in developing safe work habits and the proper respect for the hazards of working with technical equipment.

SAFETY MUST BE AN INTEGRAL PART OF THE COURSE CONTENT. The instructors must constantly inspect the workshop area for possible hazards, which may cause injuries. Safety in the workshop area depends heavily on instructions on the physical use of materials, dangerous solutions or chemicals, heating devices, electrical devices, mechanical equipment, and testing equipment. These materials and equipment can be used safely, if proper instruction is presented to the student. Safety information is displayed throughout the facilities. (Warning signs, fire extinguishers, yellow and red lines) Students must familiarize themselves with the location of all shop exits, safety showers and eyewash stations; and to be prepared for an emergency action, if necessary.

EMERGENCY ACTION PLAN

In the case of a fire or of an earthquake, all students and instructors will exit the premises following the Emergency Exit Plan displayed in each classroom or workshop area. Fire extinguishers are installed around the shop and classroom areas. Their locations are identified with placards.

First aid kits are provided in each work area for accidents or emergency needs. The students will be instructed that in the event of an injury or accident, they must contact the instructor immediately. The courses of action that may be taken are as follows:

1. For minor injuries, the instructor will treat the student from the shop first aid kit and will notify the Program Director.

2. For serious injuries, the instructor must call the Program Director. The instructor will provide basic first aid measures until trained personnel arrive.

3. For severe, critical, or unusual injuries, the instructor must call for an ambulance. Emergency telephone numbers are clearly posted in the teacher's office, classroom and work area. He will notify the Program Director immediately.

The Puerto Rico Aviation Maintenance Institute administration will contact the parents, guardians or next of kin of any student that is involved in an accident or is injured during regular hours.

The student's instructor will prepare an injury or accident report following any of the above situations. A copy of this report will be filed in the student's personal record file.

EMERGENCY EXIT PLANS

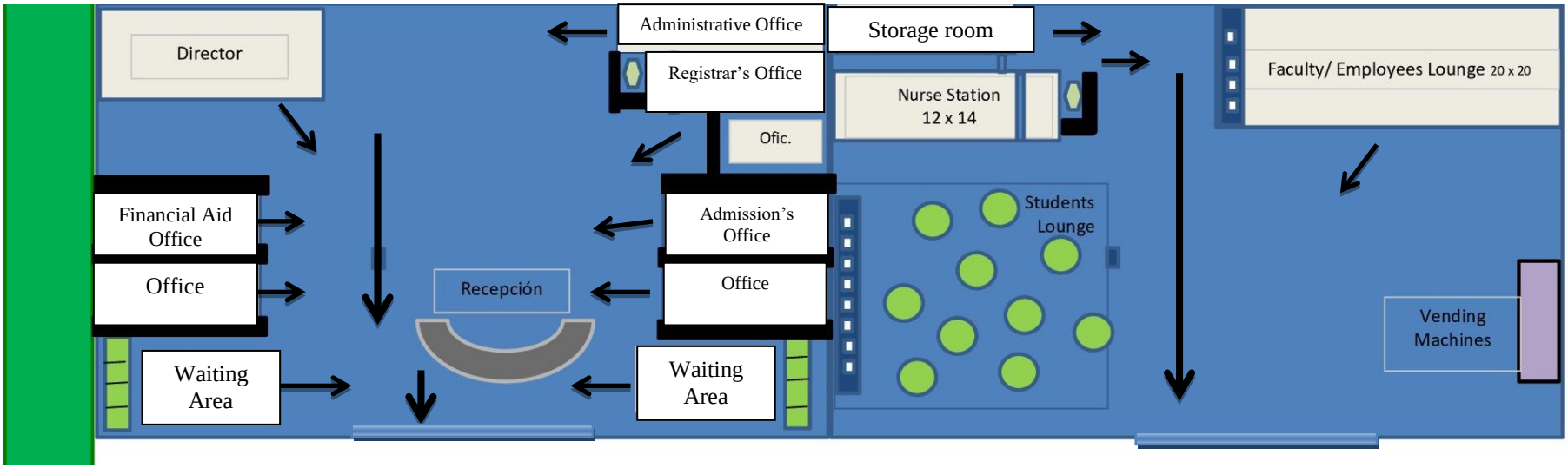


FIGURE 4 – Emergency Exit Plan, Building C-2, First floor Administrative Offices and Student Services (C-105 & C-106)

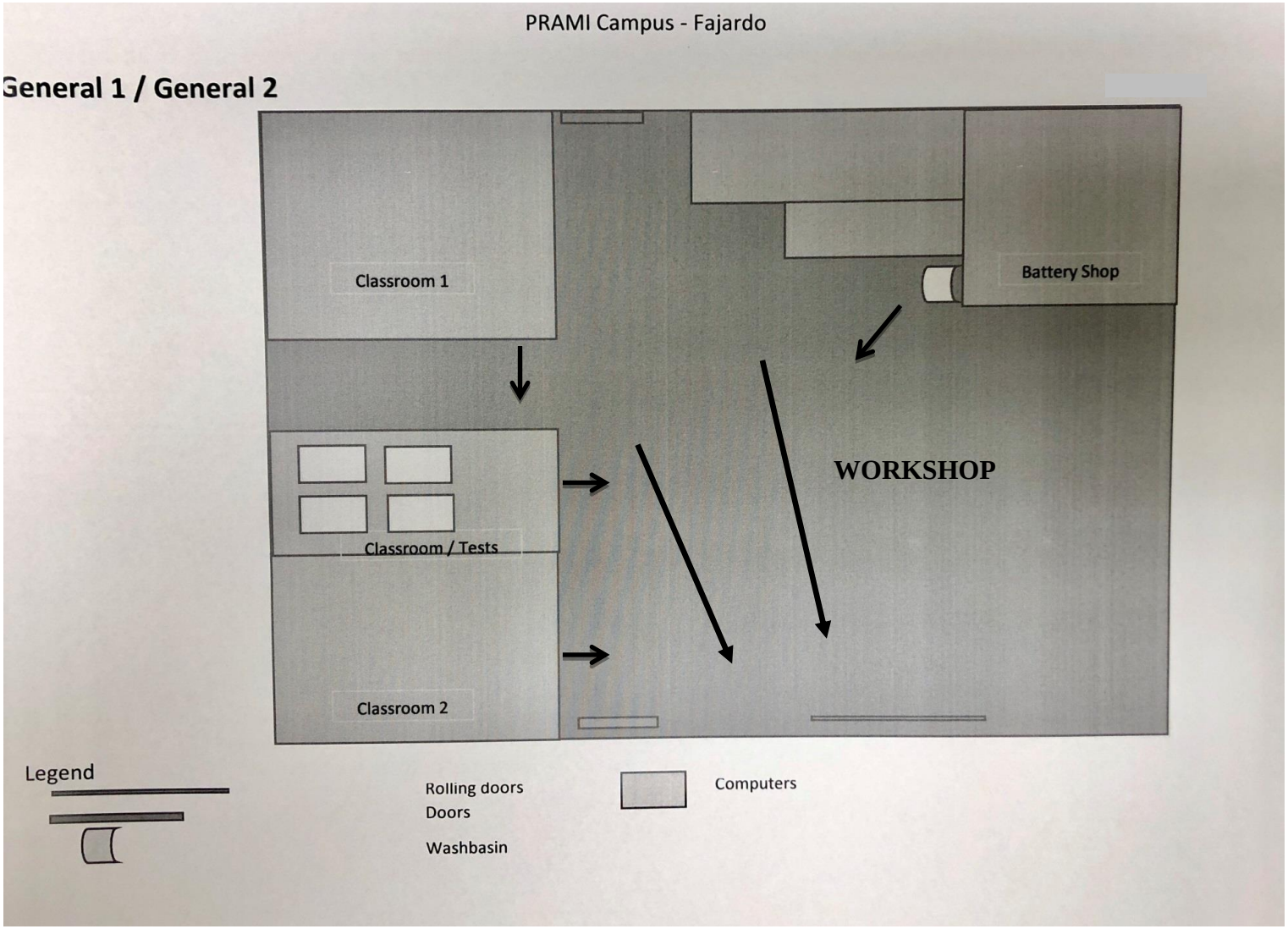


FIGURE 5 – Emergency Exit Plan, Building C-2, First floor
General Classrooms (C-104)

POWERPLANT 1

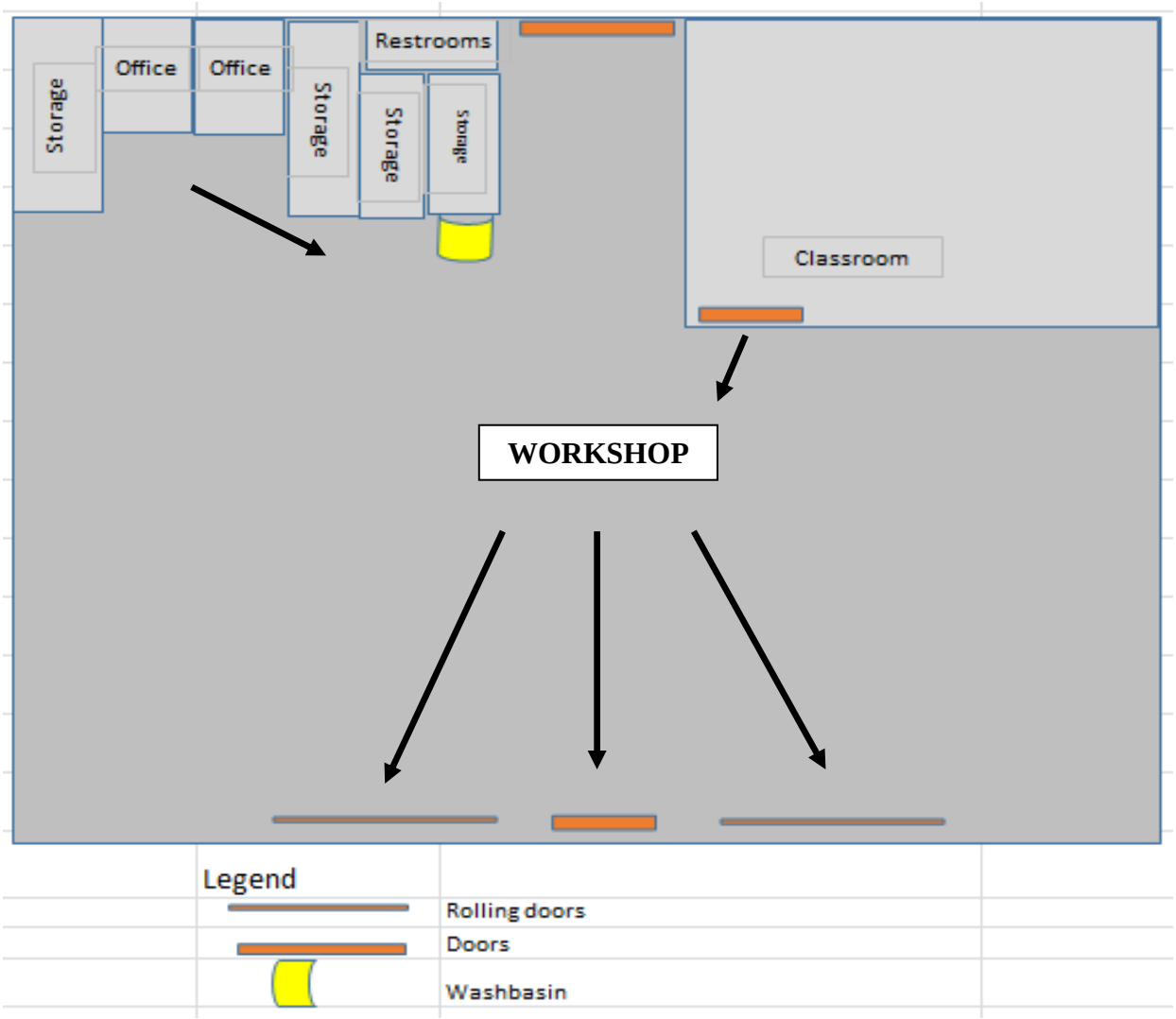


FIGURE 6 – Emergency Exit Plan, Building D-2, First floor
Powerplant Classroom (D - 101)

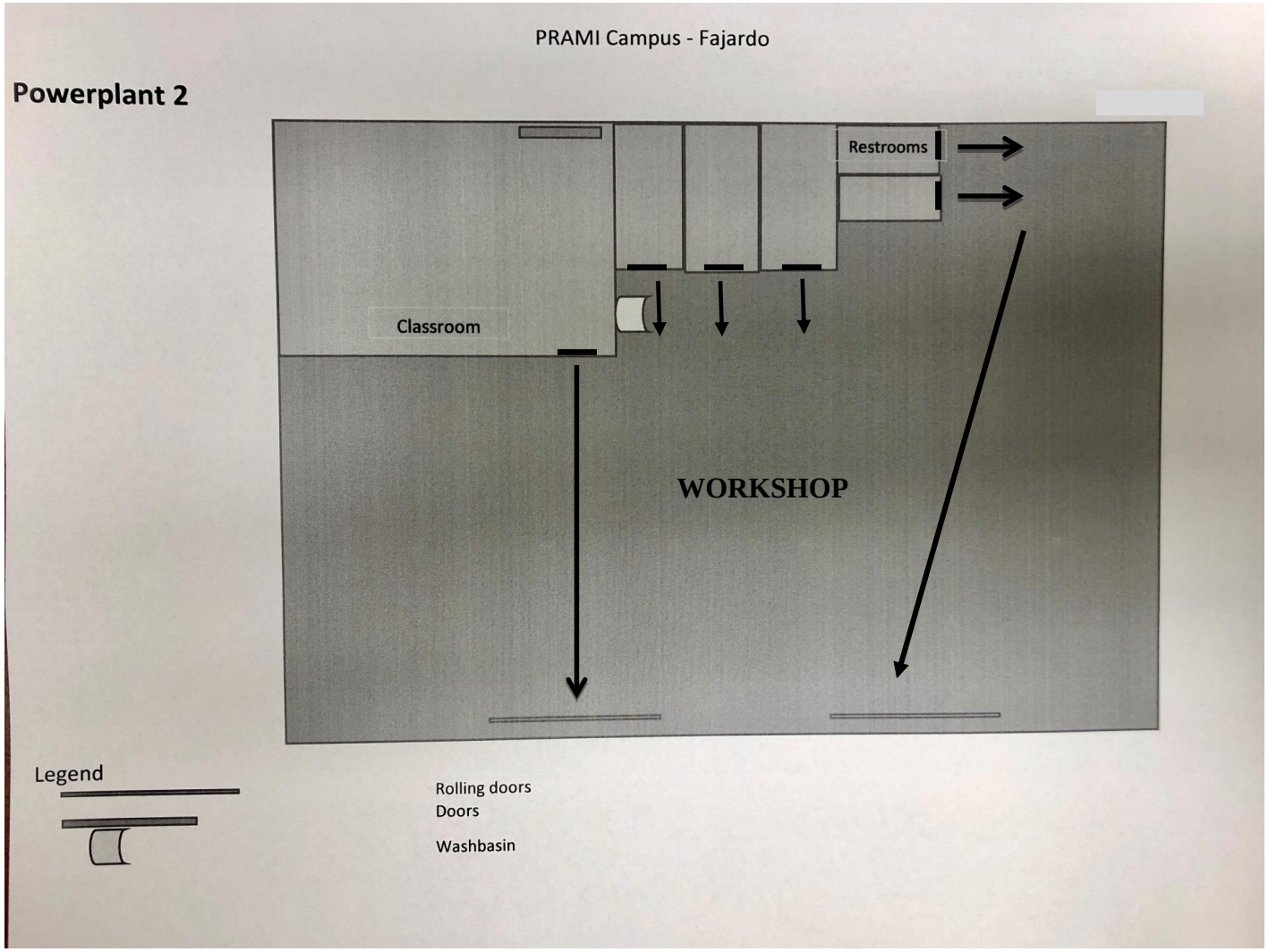


FIGURE 7 – Emergency Exit Plan, Building D-2, First floor
Powerplant Classroom (D - 102)

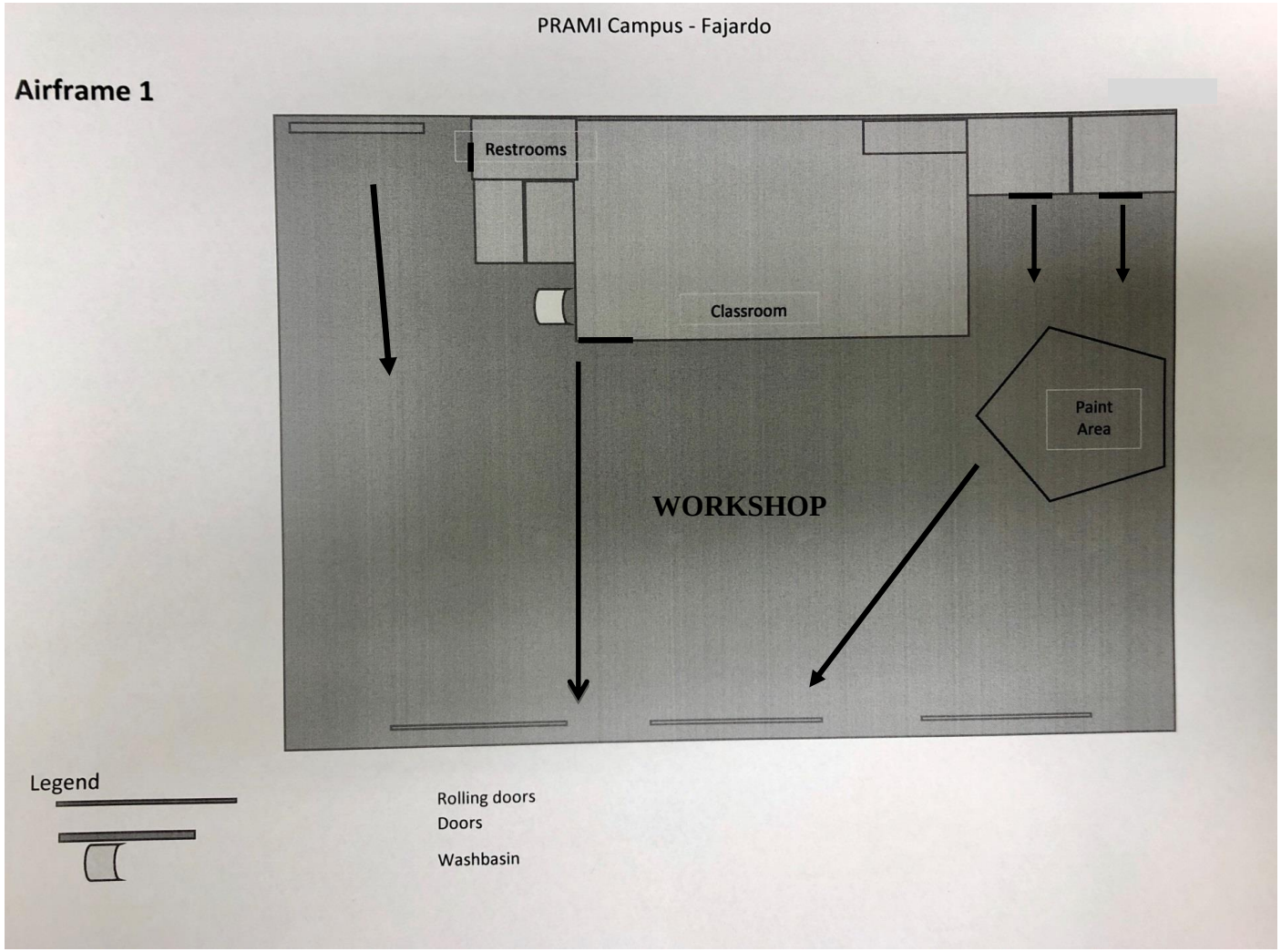


FIGURE 8 – Emergency Exit Plan, Building D-2, First floor
Airframe Classroom (D - 104)

AIRFRAME 2

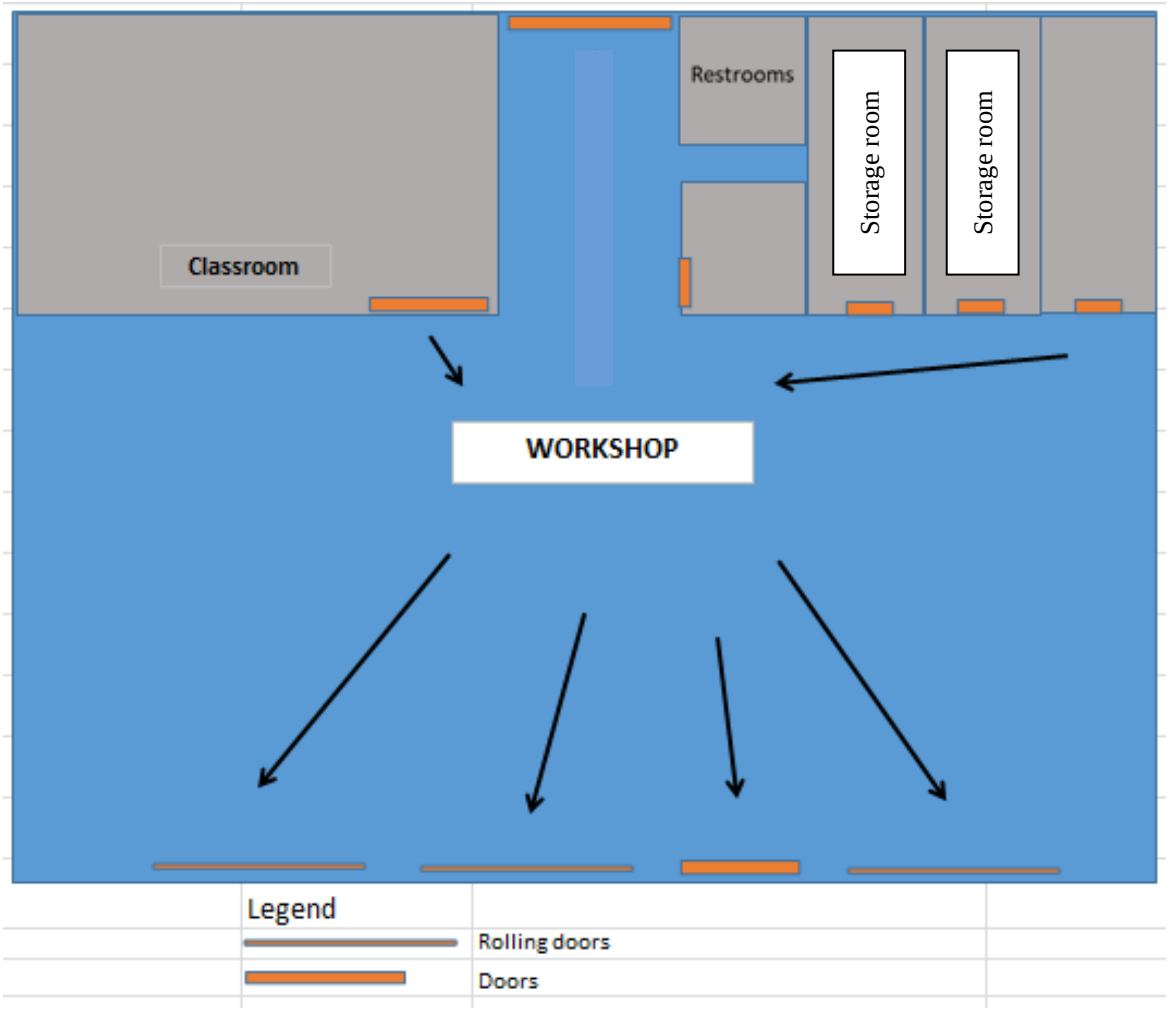


FIGURE 9 – Emergency Exit Plan, Building D-2, First floor
Airframe Classroom (D - 103)

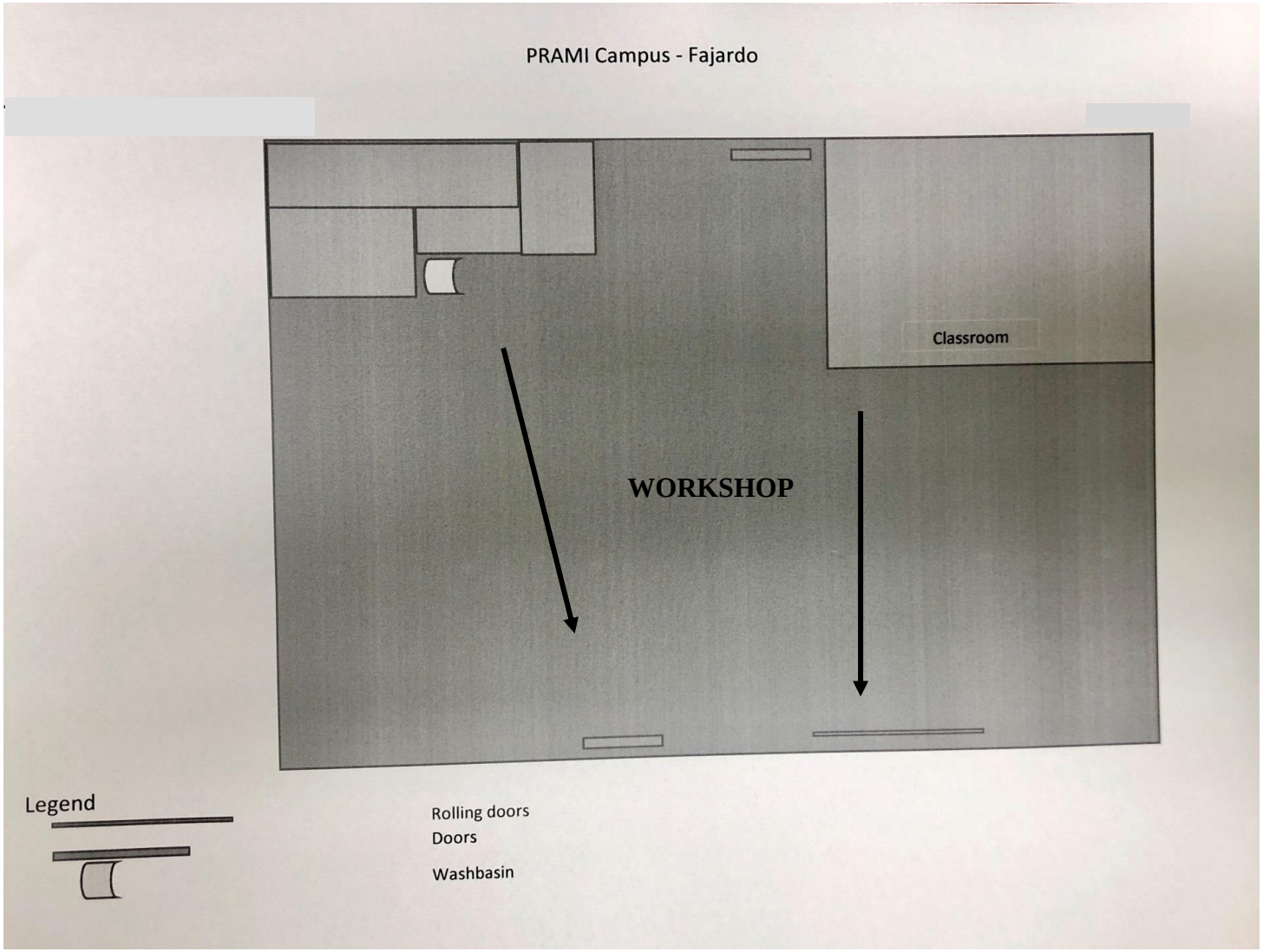


FIGURE 10 – Emergency Exit Plan, Building C-2, First floor
Airframe Classroom (welding) – C-103

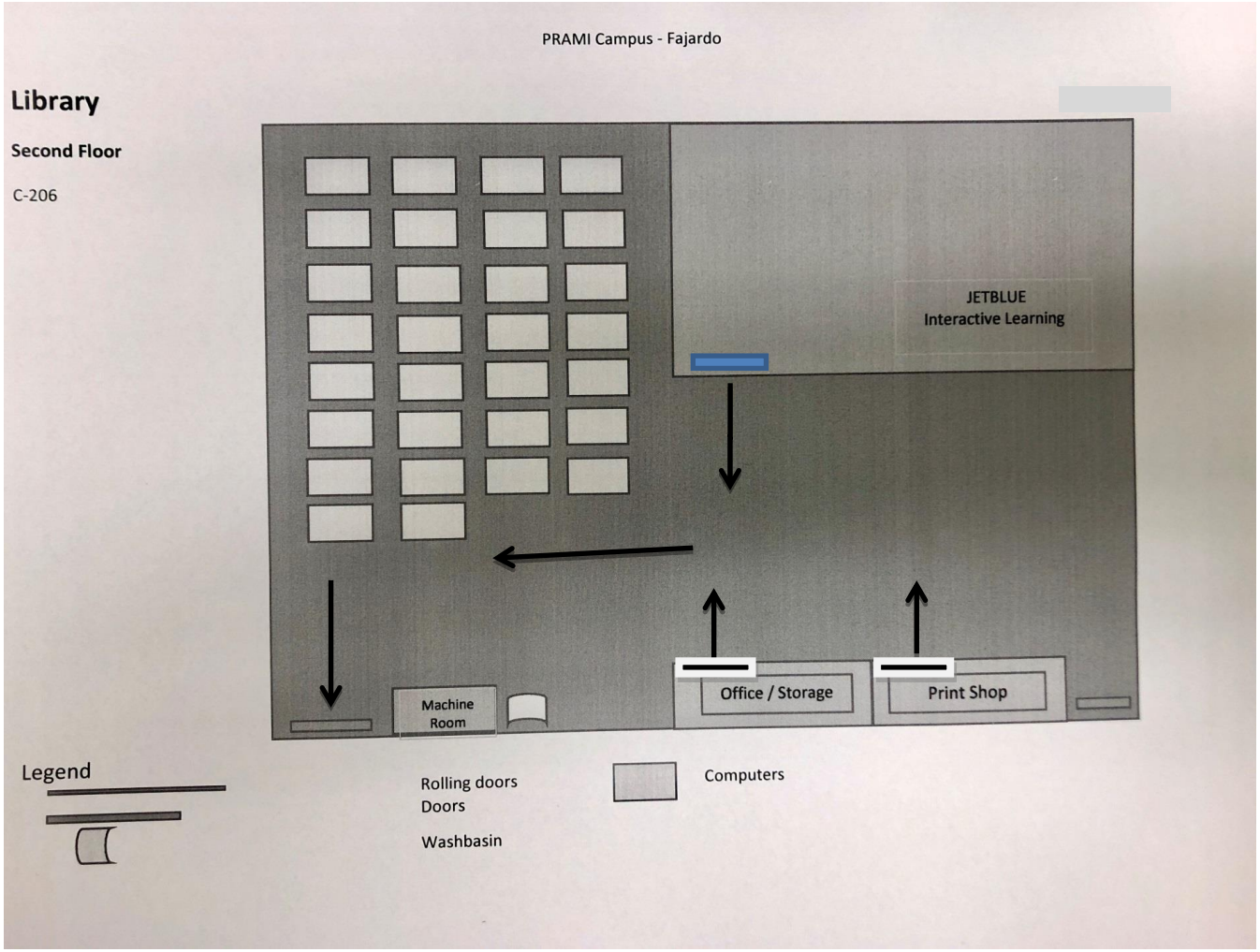


FIGURE 11 – Emergency Exit Plan, Building C-2, Second floor
JetBlue Interactive Space and Library – C-206

RULES AND PROCEDURES

ATTENDANCE AND ABSENCES

- PRAMI will not require any student to attend classes of instruction for more than eight (8) hours on any day or more than six (6) days or 40 hours in any 7day period.

- Regular and punctual attendance to classes is one of a number of expressions or interest and maturity. Complete course attendance is required, since the curriculum is a closed structured. The student must attend or make-up every hour as established in the **POLICY FOR MAKE-UP TIME PROCEDURES.**

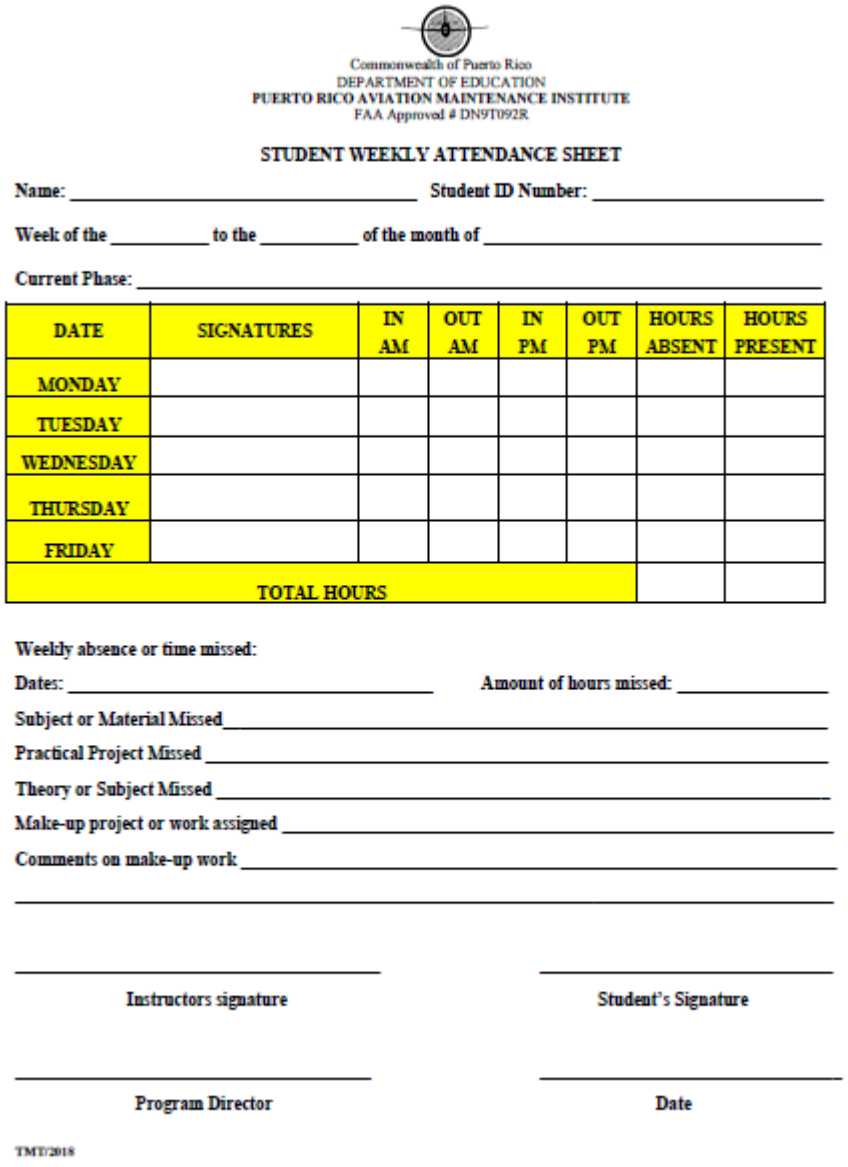
- All Students are required to account to the instructor for their absences. The instructors will make the necessary arrangements for make-up.

- Any student missing ten (10) minutes or more of an hour of instruction will be considered to be absent for that hour. The student can be counted absent for one hour, but not more than three (3) hours per day. More than three (3) hour of absence per day will be considered as being absent for the entire class day (six (6) hours).

- A student who has been absent from studies for more than one week due to illness or other emergencies will consult the instructor and Puerto Rico Aviation Maintenance Institute Program Director to set up a schedule to make-up the missed material and time.

- All missed hours must be made up prior to allowing the student to take the subject final test. To be considered a graduate, the student must complete all the required curriculum subjects and hours.

STUDENT WEEKLY ATTENDANCE SHEET



Commonwealth of Puerto Rico
DEPARTMENT OF EDUCATION
PUERTO RICO AVIATION MAINTENANCE INSTITUTE
FAA Approved # DN9T092R

STUDENT WEEKLY ATTENDANCE SHEET

Name: _____ Student ID Number: _____

Week of the _____ to the _____ of the month of _____

Current Phase: _____

DATE	SIGNATURES	IN AM	OUT AM	IN PM	OUT PM	HOURS ABSENT	HOURS PRESENT
MONDAY							
TUESDAY							
WEDNESDAY							
THURSDAY							
FRIDAY							
TOTAL HOURS							

Weekly absence or time missed:

Dates: _____ Amount of hours missed: _____

Subject or Material Missed _____

Practical Project Missed _____

Theory or Subject Missed _____

Make-up project or work assigned _____

Comments on make-up work _____

_____

_____ _____

Instructors signature Student's Signature

_____ _____

Program Director Date

TMT/2018

Figure 12 -- Student Weekly Attendance Sheet
(Reduced from original - Sample)

POLICY FOR MAKE-UP TIME

Students that miss class or workshop time due to tardiness or absenteeism that are justifiable will have the opportunity to make-up the lost time. The maximum allowable time to make-up will not exceed 20% of the total required hours of a particular subject area. If the tardiness or absenteeism exceeds this amount, the student will be required to repeat the entire subject area. The Program Director and the student instructor will evaluate each situation individually to make a final determination.

- Lost time and /or missed shall be made up in each subject area before finishing the subject area.

- Missed Practical Projects shall be made up before finishing the subject area.

- All make-up time or Practical Projects must be authorized by the student's instructor before the work is begun. The student instructor must assign the student work to be done. Missed time will be recorded in the Student Make-up hours Attendance Sheet.

STUDENT WEEKLY MAKE-UP ATTENDANCE SHEET

Commonwealth of Puerto Rico
DEPARTMENT OF EDUCATION
PUERTO RICO AVIATION MAINTENANCE INSTITUTE
FAA Approved # DN9T092R

STUDENT WEEKLY MAKE-UP ATTENDANCE SHEET

Name: _____ **Student ID Number:** _____

Week of the _____ **to the** _____ **of the month of** _____

DATE	SIGNATURES	IN AM	OUT AM	IN PM	OUT PM	HOURS ABSENT	HOURS PRESENT
MONDAY							
TUESDAY							
WEDNESDAY							
THURSDAY							
FRIDAY							
TOTAL HOURS							

Weekly absence or time missed:

Dates: _____ **Amount of hours missed:** _____

Subject or Material Missed _____

Practical Project Missed _____

Theory or Subject Missed _____

Make-up project or work assigned _____

Comments on make-up work _____

_____ _____
Student's Instructors signature **Student's Signature**

_____ _____
Make-up Instructor Signature **Date**

_____
Program Director

TMT/2018

Figure 13 -- Student Weekly Make-up Hours Attendance Sheet
(Reduced from original - sample)

EVALUATION

- Classes may be examined at any time with or without notice, on any part of the work established on the schedule to test in the curriculum. .

- The instructors in the Puerto Rico Aviation Maintenance Institute will rate each student and keep the appropriate records for each competency progress using the following methods:

  - Written Tests
  - Practical Project Evaluations

- The students shall be evaluated by being presented a written exam to cover the theoretical material presented within each subject unit. The test used to evaluate the student may include a section of oral evaluation of knowledge as well as a written section.

  If the test includes an oral evaluation section, the instructor must construct a rubric of what the proper responses should include for an objective evaluation. The rubric must also include the weight of the oral evaluation in regards to the examination as a whole.

- Subjected units that have many hours of instruction may include more than one exam. The minimum amounts of exams for each subject matter unit are included in the corresponding Curriculum Test Schedule.

- The instructor may present the students several quizzes covering the subject matter material and average the grades of each quiz as additional evaluation or test. The instructor must specify how the quizzes are included in the subject unit evaluation.

- The evaluated test results must be discussed with the students to clarify any doubts or misunderstanding of the concepts and knowledge learned of the particular subject matter. The discussion of the exam should be accomplished within a one week period after the examination.

- For **grading test** the academic standard to be used will be the same academic numerical grading system used by the FAA (100%), for successfully passing a particular subject matter exam shall be **70%**. Test and Quizzes are graded on percent of questions answered correctly. The standard rules of rounding decimals shall be used.

- The students that fail the initial subject matter test; shall have the right to be reexamine under the **Policy for Make-up Test/Retake Test.**

- Any student absent from an examination is required to report to the instructor before he/she is allowed to continue to the next subject. If the student presents a valid excuse for being absent, the instructor may arrange the examination for another time as established in the **POLICY FOR MAKE-UP/RETAKE TEST**.

- Each subject unit includes a section of practical projects or shop in addition to the theoretic portion of the unit. Each Practical Project must be successfully completed and passed with a score of 70%. The evaluation criteria are listed on the **Practical Project Evaluation Sheet**. Upon the failure or rejection of a Practical Project, the student shall repeat or redo the Practical Project.

- Successful completion of a particular subject unit includes having successfully completed both the theoretic and practical portions with passing grades.

POLICY FOR MAKE-UP AND RETAKE TEST

This policy establishes the conditions and procedures to be followed when a student is absent for a test or his/her test score is less than 70%.

- Students scoring less than 70% on a subject test will have the opportunity to retake the test. The passing score on the Retake Test is of 70% or, the addition of the failed exam plus the retake score and dividing the result by 2; whichever is higher.

- When a student is absent from a test and presents a valid excuse for being absent, he/she will have the opportunity to make-up the test. The minimum passing test score on the Make-Up Test shall be of 70%.

- If the student does not make-up or retake the test, he/she will lose the opportunity to make-up the test in the particular subject area. The student shall be referred to the PRAMI Disciplinary Committee, which will review the individual case.

- The student that fails the retake test shall not have another opportunity to be retested in that particular subject test.

- Failing a retest or having a subject area total test average of less than 70% will result in failing the entire subject area. The student shall retake the entire subject area at a later date.

- Any student that fails three (3) subject areas of a particular curriculum shall repeat these subject areas, no later than two (2) years after completing the particular curriculum. The failure of more than three (3) subject areas within a particular curriculum will require that the student retake the entire curriculum.

COURSE TEST SCHEDULE

SUBJECT	No. Written Test	Number of Hours
GENERAL COURSE CURRICULUM	19	28
POWERPLANT COURSE CURRICULUM	24	32
AIRFRAME COURSE CURRICULUM	20	27
TOTALS	**63**	**87**

GENERAL COURSE TEST SCHEDULE

	SUBJECTS	No. Written Test	Number of Hours
A.	Basic Electricity	2	4
B.	Aircraft Drawing	1	2
C.	Weight and balance	1	2
D.	Fluid Lines and Fittings	1	2
E.	Materials and Processes	2	3
F.	Ground Operation and Servicing	1	2
G.	Cleaning and Corrosion Control	1	2
H.	Mathematics	1	2
I.	Maintenance Forms and Records	1	2
J.	Basic Physics	1	2
K.	Maintenance Publications	1	2
L.	Mechanic Privileges and Limitations	1	2
M.	Safety Communications Program	1	1
	Totals	**15**	**28**

AIRFRAME COURSE TEST SCHEDULE

SUBJECTS	No. Written Test	Number of Hours
I. AIRFRAMES STRUCTURES		
A. Wood Structures	1	1
B. Aircraft Covering	1	1
C. Aircraft Finishes	1	1
D. Sheet Metal and NonMetallic Structures	2	5
E. Welding	1	1
F. Assembly and Rigging	1	2
G. Airframe Inspection	1	1
II. AIRFRAME SYSTEMS AND COMPONENTS		
A, Airframe Landing Gear and Components	1	2
B Hydraulic and Pneumatic Power Systems	1	1
C. Cabin Atmosphere Control Systems	1	1
D. Aircraft Instrumentation Systems	1	1
E. Communication And Navigation Systems	1	2
F. Aircraft Fuel Systems	1	1
G. Aircraft Electrical Systems	2	4
H. Position and Warning Systems	1	1
I. Ice and Rain Control Systems	1	1
J. Fire Protection	1	1
Totals	**19**	**28**

POWERPLANT COURSE TEST SCHEDULE

SUBJECTS	No. Written Test	Number of Hours
I. POWERPLANT THEORY AND MAINTENANCE		
A. Reciprocating Engine	3	3
B. Turbine Engines	3	6
C. Engine Inspection	1	1
II. POWERPLANT SYSTEMS AND COMPONENTS		
A. Engine Instrument Systems	1	1
B. Engine Fire Protection Systems	1	1
C. Engine Electrical Systems	1	2
D. Lubrication Systems	2	3
E. Ignition and Starting Systems	2	3
F. Fuel Metering Systems	2	3
G. Engine Fuel Systems	1	1
H. Induction and Engine Airflow Systems	1	1
I. Engine Cooling Systems	1	1
J. Engine Exhaust and Reverser Systems	1	1
K. Propellers	2	3
L. Unducted Fans	***1***	***1***
M Auxiliary Power Systems	1	1
Totals	**24**	**32**

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ACADEMIC RECORDS

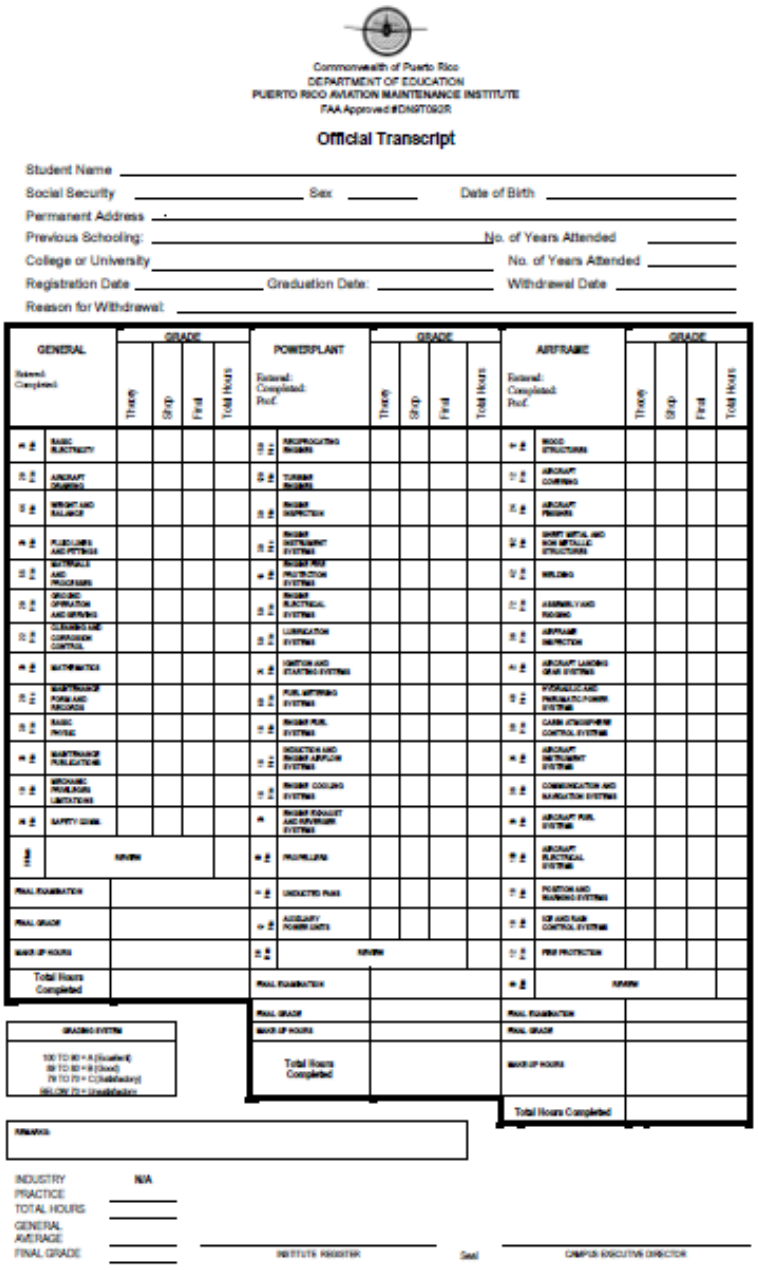
- Each student's academic record is that cumulative record maintained by the instructor with grades, hours, average and other matter relating to the progress of the student. The Registrar's Office retains the record for at least two (2) years after the end of the student's enrollment, and shall make each record available for inspection by the Federal Aviation Administration and/or officials of the Department of Education of Puerto Rico. Upon request, the Program Director of the Puerto Rico Aviation Maintenance Institute Office shall provide a transcript of the student's grades to each student who has graduated from the Institute or who leaves before having graduated. The transcript must state the curriculum in which the student was enrolled whether the student satisfactorily completed that curriculum or not and the final grades the student received.

AVERAGE

- The student's grade average is computed for each student at the end of each course on the Student Cumulative Record and becomes part of the academic record.

INTRUCTOR'S REGISTER

- The Instructor Register is an official document, which is the property of the Department of Education of Puerto Rico, and it will be delivered to the Campus Executive Director of the Puerto Rico Aviation Maintenance Institute to be on file when the academic year or Curriculum is finished. It is the accumulative registry for the activities of the student during their assistance to the course.



Commonwealth of Puerto Rico
DEPARTMENT OF EDUCATION
PUERTO RICO AVIATION MAINTENANCE INSTITUTE
FAA Approved #DN9T092R

Official Transcript

Student Name _____

Social Security _____ Sex _____ Date of Birth _____

Permanent Address _____

Previous Schooling: _____ No. of Years Attended _____

College or University _____ No. of Years Attended _____

Registration Date _____ Graduation Date: _____ Withdrawal Date _____

Reason for Withdrawal: _____

GENERAL	GRADE				POWERPLANT	GRADE				AIRFRAME	GRADE			
Entered: Completed:	Theor.	Shop	Final	Total Hours	Entered: Completed: Prof.	Theor.	Shop	Final	Total Hours	Entered: Completed: Prof.	Theor.	Shop	Final	Total Hours
BASIC ELECTRICITY					RECIPROCATING ENGINES					WOOD STRUCTURES				
AIRCRAFT DRAWING					TURBINE ENGINES					AIRCRAFT COVERING				
WEIGHT AND BALANCE					ENGINE INSPECTION					AIRCRAFT FINISHES				
FLUID LINES AND FITTINGS					ENGINE INSTRUMENT SYSTEMS					SHEET METAL AND NON METALLIC STRUCTURES				
MATERIALS AND PROCESSES					ENGINE FIRE PROTECTION SYSTEMS					WELDING				
GROUND OPERATION AND SERVICING					ENGINE ELECTRICAL SYSTEMS					ASSEMBLY AND RIGGING				
CLEANING AND CORROSION CONTROL					LUBRICATION SYSTEMS					AIRFRAME INSPECTION				
MATHEMATICS					IGNITION AND STARTING SYSTEMS					AIRCRAFT LANDING GEAR SYSTEMS				
MAINTENANCE FORMS AND RECORDS					FUEL METERING SYSTEMS					HYDRAULIC AND PNEUMATIC POWER SYSTEMS				
BASIC PHYSICS					ENGINE FUEL SYSTEMS					CABIN ATMOSPHERE CONTROL SYSTEMS				
MAINTENANCE PUBLICATIONS					INDUCTION AND ENGINE AIRFLOW SYSTEMS					AIRCRAFT INSTRUMENT SYSTEMS				
AIRCRAFT PRIVILEGES LIMITATIONS					ENGINE COOLING SYSTEMS					COMMUNICATION AND NAVIGATION SYSTEMS				
SAFETY EQUIP.					ENGINE EXHAUST AND REVERSER SYSTEMS					AIRCRAFT FUEL SYSTEMS				
REVIEW					PROPELLERS					AIRCRAFT ELECTRICAL SYSTEMS				
FINAL EXAMINATION					CONDUCTED TIME					POSITION AND WARNING SYSTEMS				
FINAL GRADE					AUXILIARY POWER UNITS					ICE AND RAIN CONTROL SYSTEMS				
MAKE-UP HOURS					REVIEW					FIRE PROTECTION				
Total Hours Completed					FINAL EXAMINATION					REVIEW				
					FINAL GRADE					FINAL EXAMINATION				
					MAKE-UP HOURS					FINAL GRADE				
					Total Hours Completed					MAKE-UP HOURS				
										Total Hours Completed				

GRADING SYSTEM

100 TO 90 = A (Excellent)
89 TO 80 = B (Good)
79 TO 70 = C (Satisfactory)
BELOW 70 = F (Unsatisfactory)

REMARKS:

INDUSTRY PRACTICE: N/A
TOTAL HOURS: _____
GENERAL AVERAGE: _____
FINAL GRADE: _____

_____ INSTITUTE REGISTER Seal _____ CAMPUS EXECUTIVE DIRECTOR

Figure 14 -- Official Transcript, Front Page
(Reduced from original - sample)

OFFICIAL CONVERSION FORM

The final grades recorded on student transcript are in percentages. Using the scale listed below, these percentages are translated into letter grades and grade points.

PERCENTAGES	GRADE POINTS	GRADE
100	4.00	A
99	3.95	A
98	3.90	A
97	3.85	A
96	3.80	A
95	3.75	A
94	3.70	A
93	3.65	A
92	3.60	A
91	3.55	A
90	3.50	A
89	3.40	B
88	3.30	B
87	3.20	B
86	3.10	B
85	3.00	B
84	2.90	B
83	2.80	B
82	2.70	B
81	2.60	B
80	2.50	B
79	2.40	C
78	2.30	C
77	2.20	C
76	2.10	C
75	2.00	C
74	1.90	C
73	1.80	C
72	1.70	C
71	1.60	C
70	1.50	C
69	1.40	D
68	1.30	D
67	1.20	D
66	1.20	D
65	1.00	D
64	.90	D
63	.80	D
62	.70	D
61	.60	D
60	.50	D
50	.40	D
40	.30	F
30	.20	F
20	.10	F
0	.00	F

In addition to these grades, a student may also receive the following grades:

Grade	Meaning Grade
WF	Withdrawal Failing
TR	Credit for Previous Education
I	Incomplete
M	Credit for Military Aviation Training (US Air Force – US Army)

When a student repeats a unit, the last chronological grade for that unit grades replaces the original unit grade (even if the original unit grade was higher), and is used along with the student's other grades, to calculate the course grade point average.

Figure 15 -- Official Transcript, Back Page
(Reduced from original - sample)

CURRICULUM COMPLETION CERTIFICATED

DEPARTMENT OF EDUCATION
PUERTO RICO AVIATION MAINTENANCE INSTITUTE
AVIATION MAINTENANCE TECHNOLOGY
FAA Approved #_____

CERTIFICATION

This is to certify that _____, PR License # _____ has fulfilled the requirements of the _____ curriculum, approved by the Federal Aviation Administration under the terms of Air Agency Certificate No. _____ in Date with _____ hours, and a final grade of _____.

Given under my hand and school seal this _____.

By _____ and _____
Institute Registrar **Campus Executive Director / Program Coordinator**

_____
Institute Seal

Figure 16 - Curriculum Completion Certificate
(Reduced from original sample)

The blank for the ID Number shall contain the Government Issued ID Number and the type of document.

ASSESMENT OF INSTRUCTORS PERFORMANCE

As an AMTS training provider we follow procedures and guidelines delineated by the Department of Education of Puerto Rico for the evaluation of instructors. The purpose of faculty evaluations is to insure teaching effectiveness, professional development, and service to students. Instructor evaluations are conducted twice during the academic year.

The instructor evaluation process includes inputs from a rubric provided by the Department of Education and student evaluations. The evaluation includes classroom and workshop instruction. The evaluation process seeks to ensure teaching effectiveness in conformance to course objectives, Department of Education standards, continued program improvement, along with appropriate follow-up action as necessary.

POLICY FOR QUALITY OF INSTRUCTION

The approved Puerto Rico Aviation Maintenance Institute will provide instruction of such a quality that the graduates of a curriculum for each rating, who applies for a mechanic certificate or additional rating within 60 days after they have graduated, the percentage of those passing the applicable Federal Aviation Administration written test on their first attempt during any period of 24 calendar months is at least the percentage figured as follows:

(a) Institutions graduating fewer than 51 students during any 24 calendar month period; the national passing norm minus the number 20.

(b) In the event that the school's 24 month norm falls below the parameter as figured in accordance with 14 CFR Part 147.38a; the following action will be accomplished.

(c) The Quarterly School Norm Report (FS808008147) will be reviewed at the beginning of each semester to identify the areas that reflect a significant decrease in scholastic achievement. The areas that are found to reflect a decrease in performance will be given educational reinforcement in the class presentation.

(d) The Quarterly School Norm Report (FS808008147) can be obtained from the Federal Aviation Administration's Internet web site: http://avinfo.faa.gov/atssn/.

The Program Director will review the Quarterly School Norm Report (FS808008147) at the beginning of each semester to identify the areas that reflect a significant decrease in scholastic achievement.

The Program Director will discuss the report with the instructors to determine the strategies to be followed to improve any area that reflects a significant decrease in scholastic achievement.

FAA WRITTEN, ORAL AND PRACTICAL TEST

It is the student's responsibility to coordinate to take the Federal Aviation Administration Written, Oral and Practical Test with an approved computerized testing center and the FAA Designated Mechanic Examiner (DME) of their preference. The students should test within sixty (60) days after receiving their Institute certificate of course completion.

The Department of Education will authorize the use of the Puerto Rico Aviation Maintenance Institute facilities, when and if necessary to administer the Federal Aviation Administration Oral and Practical Tests to Institute students.
These tests will be conducted only after official hours.

INSTITUTE LOCATION AND FACILITY LAYOUT

Puerto Rico Aviation Maintenance Institute is located at the adjoining buildings to the Ana Delia Flores Vocational High School in Fajardo, Puerto Rico. is located on the East coast of the island. The physical address of the Institute is Carretera #3, Km 49.5, Marginal, Bo. Quebrada Vueltas, Fajardo, PR.

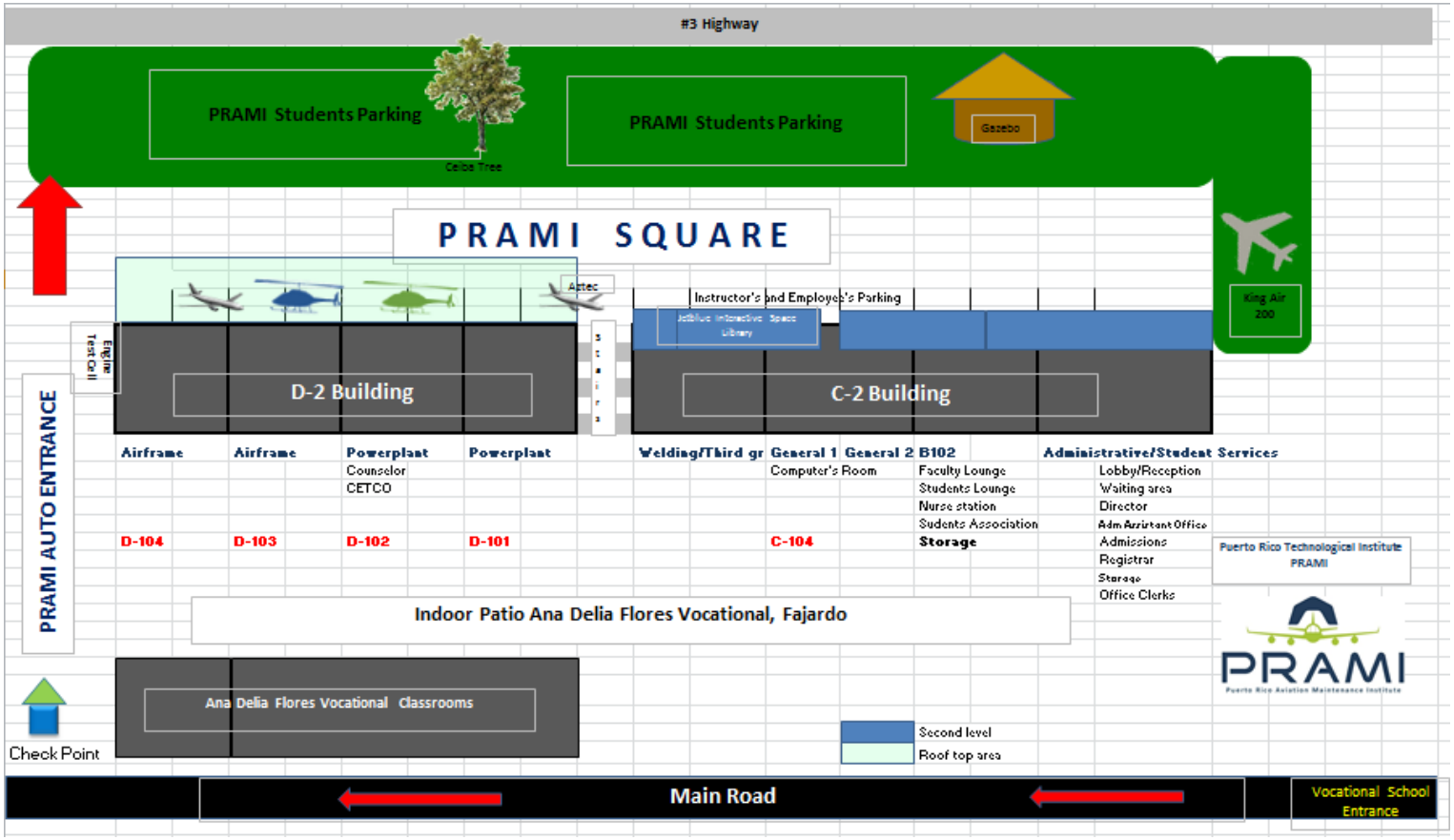


Figure 17 – PRAMI Facility Layout

**WRITTEN DESCRIPTION OF THE FACILITIES*

US 14 CFR Part 147.37

The Puerto Rico Aviation Maintenance Institute has the following properly illuminated and ventilated facilities specified in 14 CFR Parts 147.14 through 147.19 and they are appropriate for the maximum number of students that are expected to be taught at any given time. Shop work area layouts will comply with 14 CFR Part 147.15 (b); any changes to the physical distribution of equipment will ensure proper separation from working space, for parts, tools, materials, and similar articles. Layout drawings will be maintained on file in the Administration Office when revised. Copy of the layout revision will be forwarded to the local FSDO.

The layout of the buildings is illustrated in the following figures.

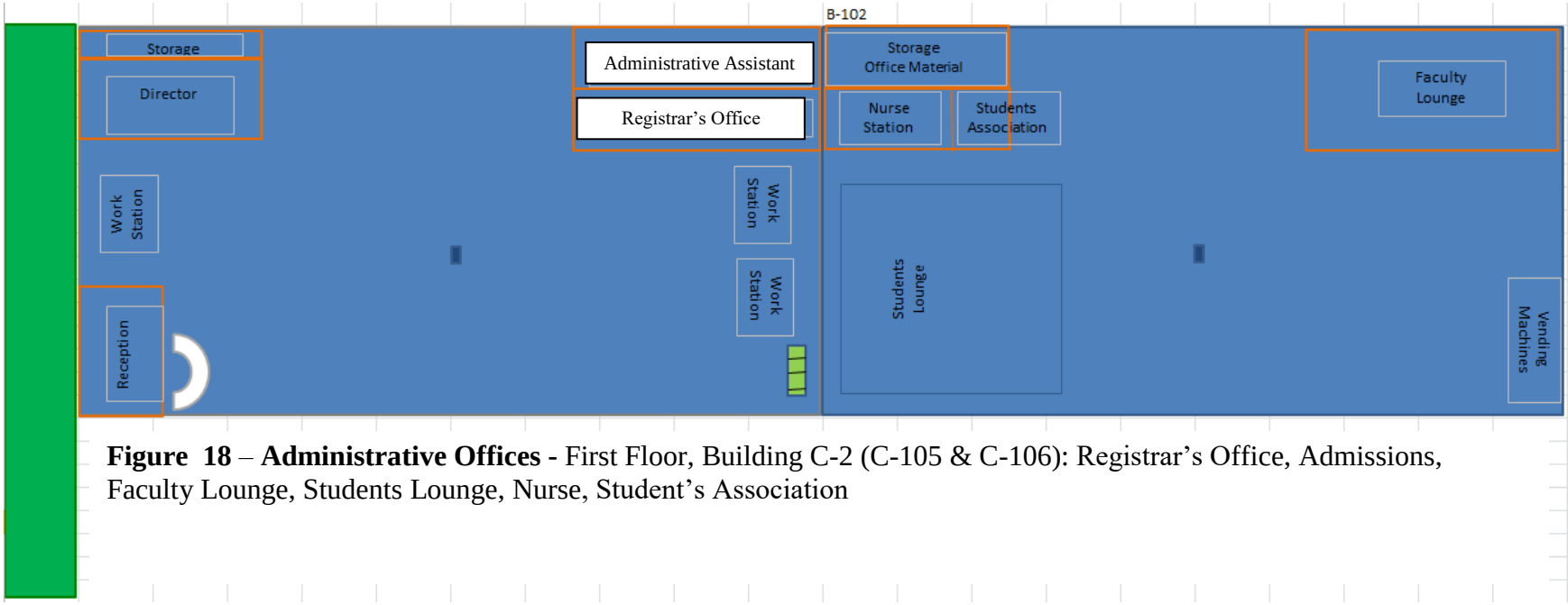


Figure 18 – **Administrative Offices -** First Floor, Building C-2 (C-105 & C-106): Registrar's Office, Admissions, Faculty Lounge, Students Lounge, Nurse, Student's Association

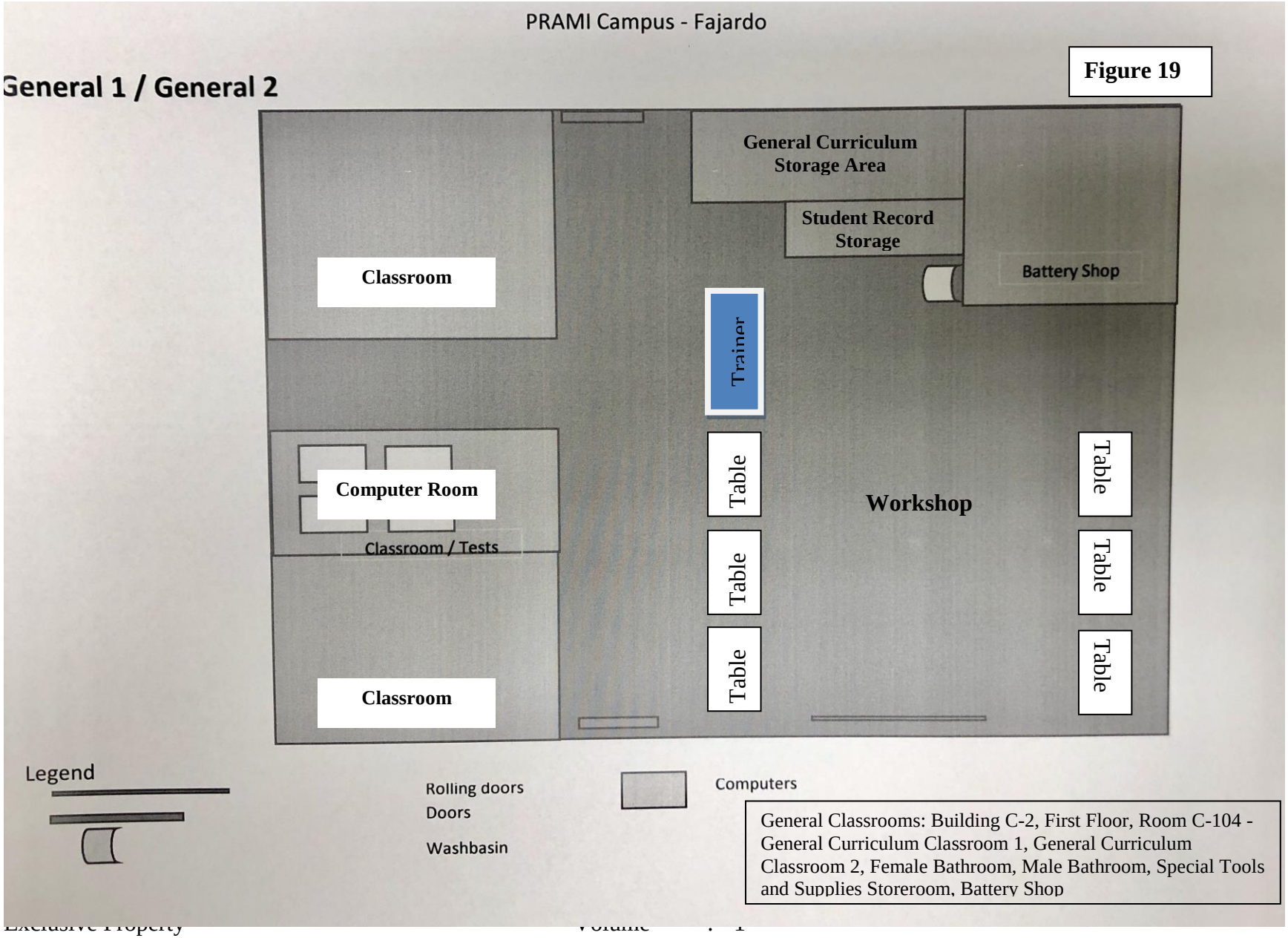
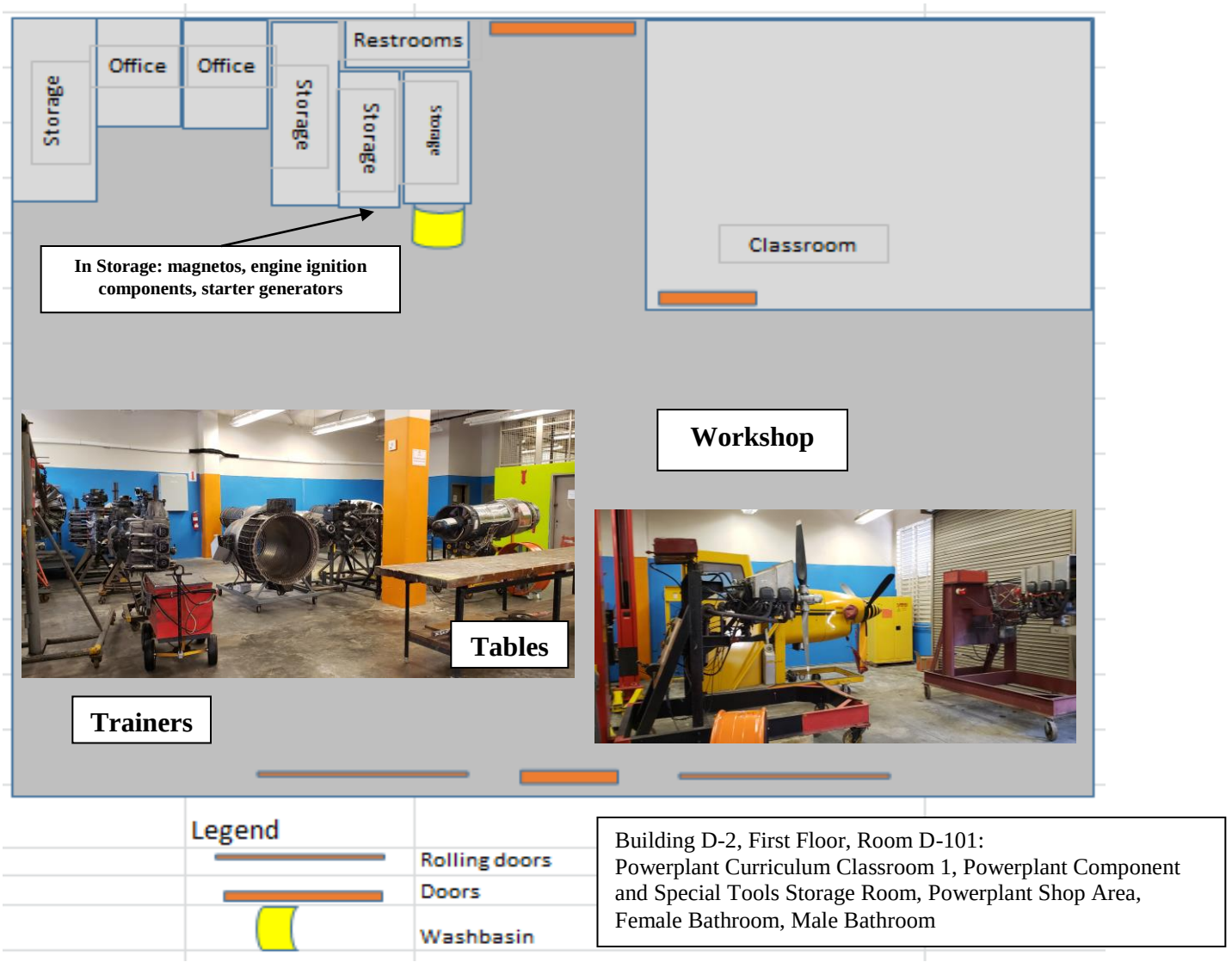
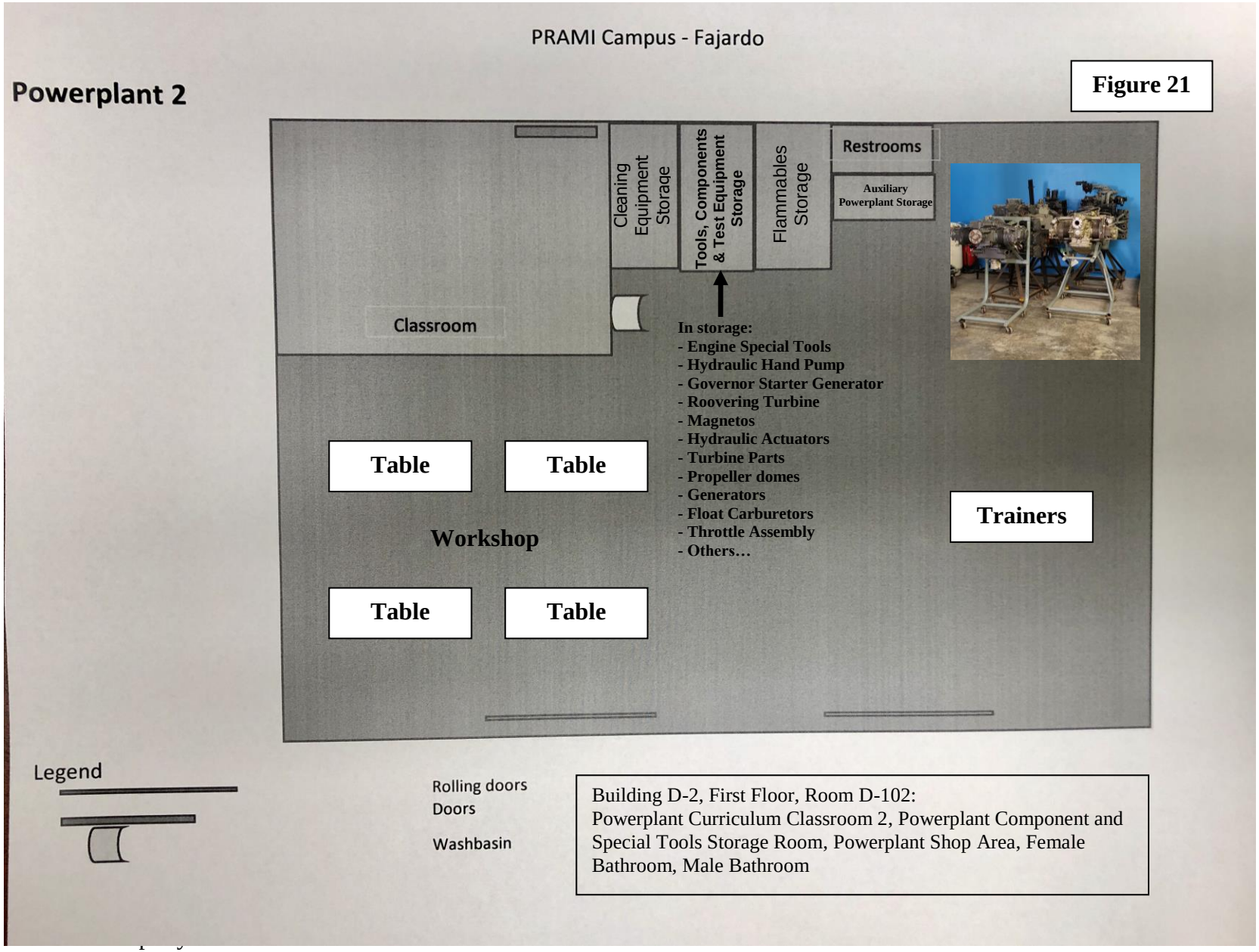

PRAMI Campus - Fajardo
General 1 / General 2
Figure 19
General Curriculum Storage Area
Student Record Storage
Battery Shop
Classroom
Trainer
Computer Room
Classroom / Tests
Table
Table
Table
Workshop
Table
Table
Table
Classroom
Legend
Rolling doors
Doors
Washbasin
Computers
General Classrooms: Building C-2, First Floor, Room C-104 - General Curriculum Classroom 1, General Curriculum Classroom 2, Female Bathroom, Male Bathroom, Special Tools and Supplies Storeroom, Battery Shop

Figure 20



Building D-2, First Floor, Room D-101:
Powerplant Curriculum Classroom 1, Powerplant Component and Special Tools Storage Room, Powerplant Shop Area, Female Bathroom, Male Bathroom


PRAMI Campus - Fajardo
Powerplant 2
Figure 21
Cleaning Equipment Storage
Tools, Components & Test Equipment Storage
Flammables Storage
Restrooms
Auxiliary Powerplant Storage
Classroom
In storage:
- Engine Special Tools
- Hydraulic Hand Pump
- Governor Starter Generator
- Roovering Turbine
- Magnetos
- Hydraulic Actuators
- Turbine Parts
- Propeller domes
- Generators
- Float Carburetors
- Throttle Assembly
- Others…
Table
Table
Workshop
Table
Table
Trainers
Legend
Rolling doors
Doors
Washbasin
Building D-2, First Floor, Room D-102:
Powerplant Curriculum Classroom 2, Powerplant Component and Special Tools Storage Room, Powerplant Shop Area, Female Bathroom, Male Bathroom

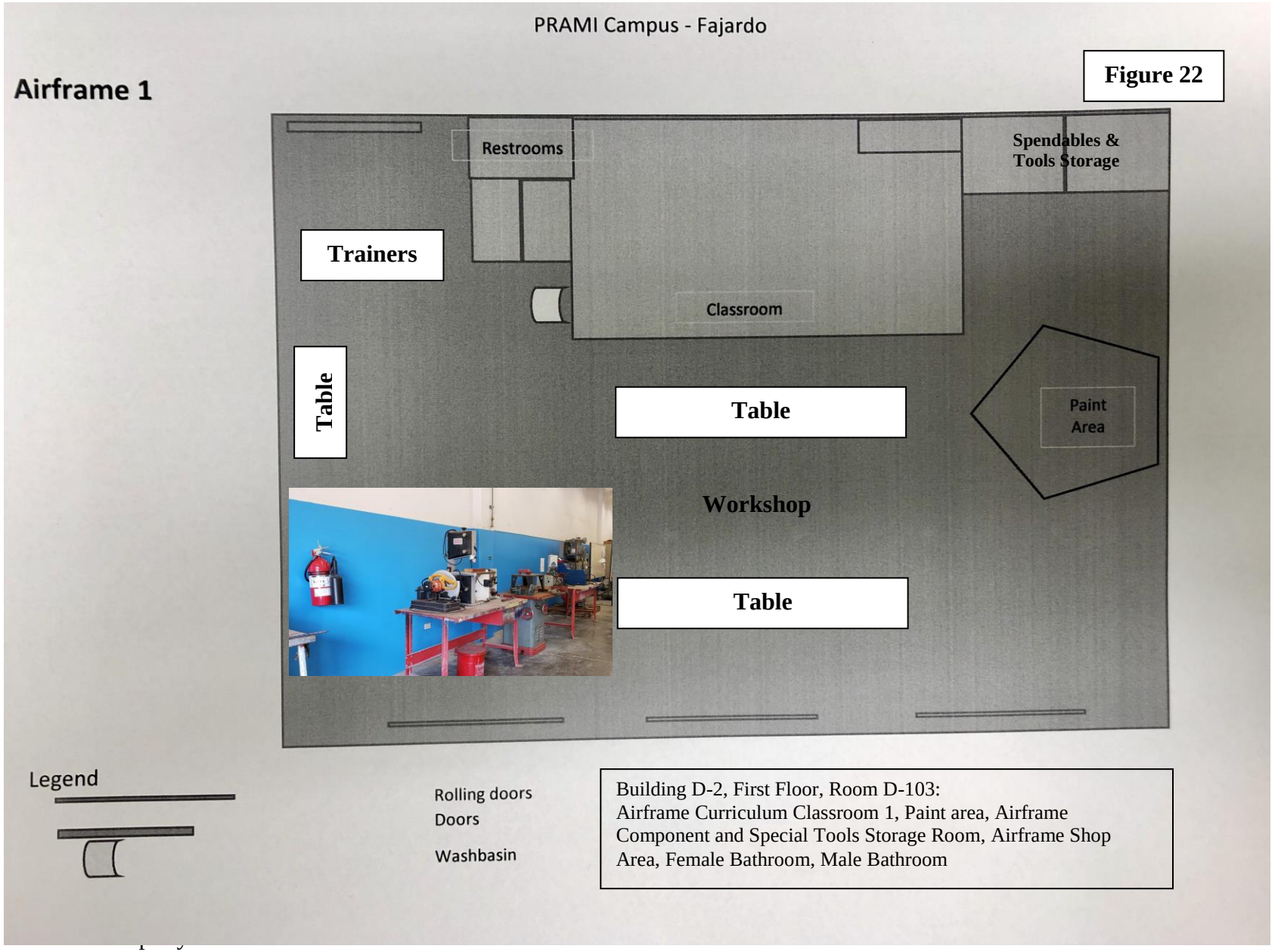
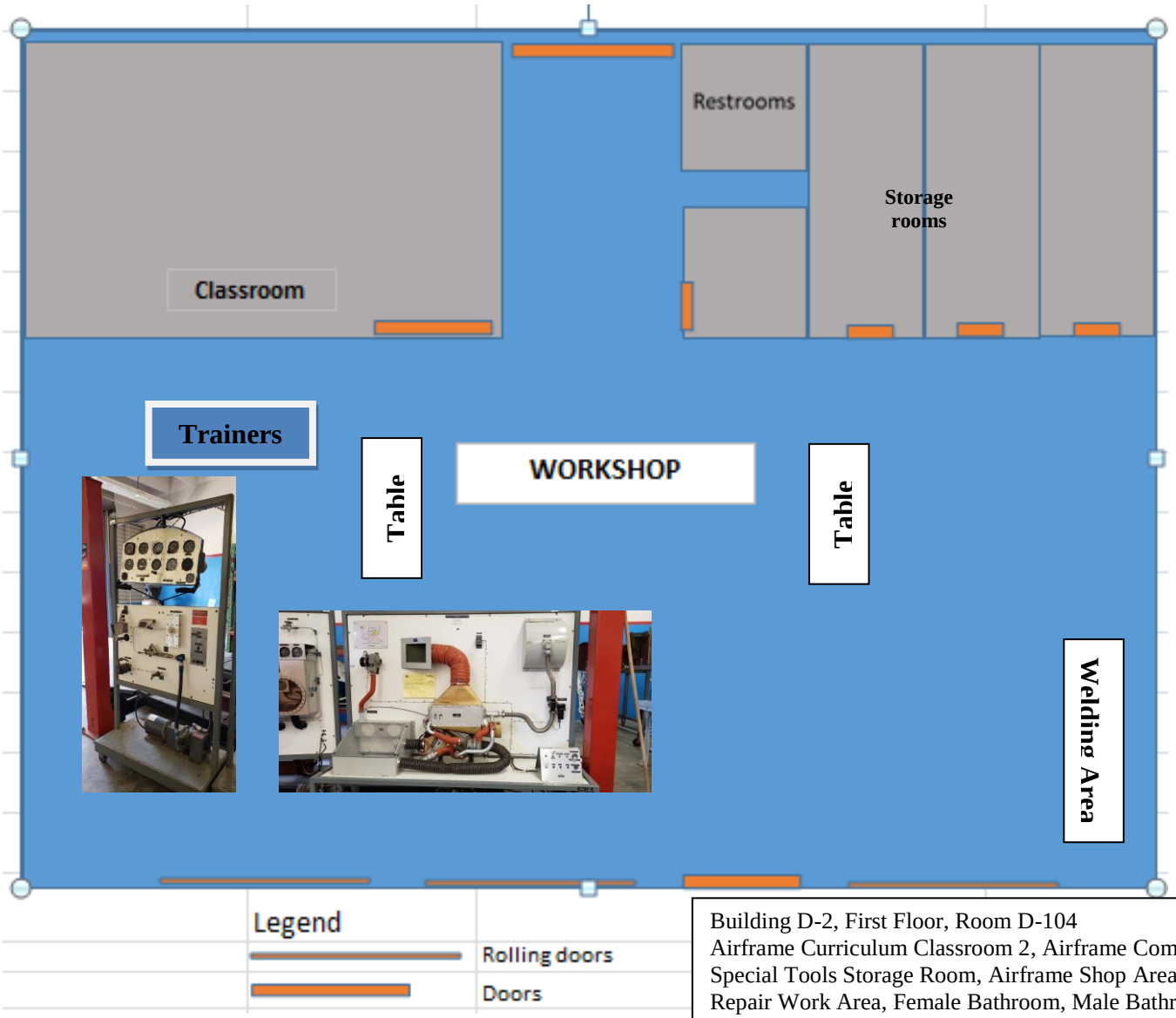
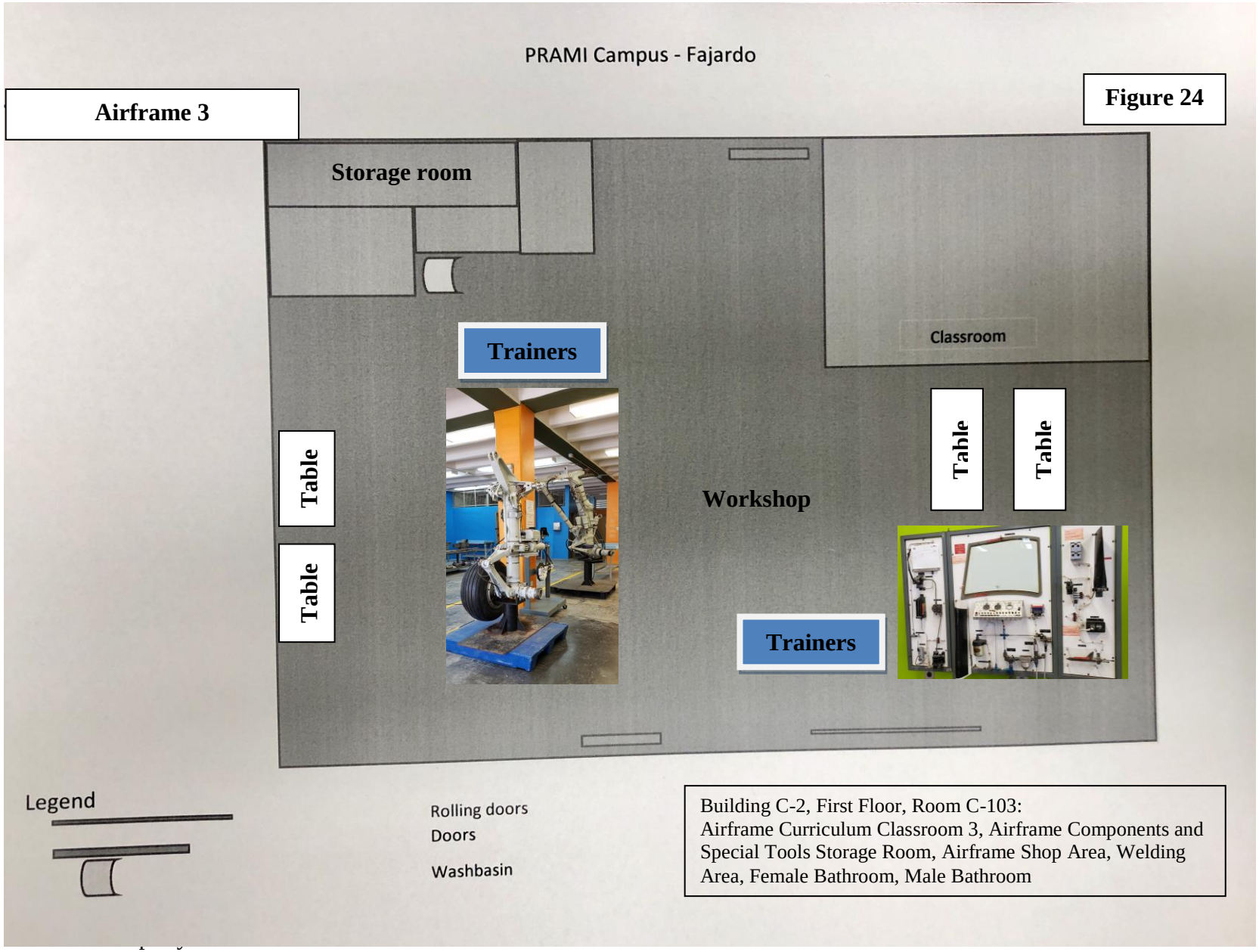

PRAMI Campus - Fajardo
Airframe 1
Figure 22
Restrooms
Spendables & Tools Storage
Trainers
Classroom
Table
Table
Paint Area
Workshop
Table
Legend
Rolling doors
Doors
Washbasin
Building D-2, First Floor, Room D-103:
Airframe Curriculum Classroom 1, Paint area, Airframe Component and Special Tools Storage Room, Airframe Shop Area, Female Bathroom, Male Bathroom

Figure 23



Building D-2, First Floor, Room D-104
Airframe Curriculum Classroom 2, Airframe Components and Special Tools Storage Room, Airframe Shop Area, Composite Repair Work Area, Female Bathroom, Male Bathroom

Figure 24


PRAMI Campus - Fajardo
Airframe 3
Storage room
Trainers
Classroom
Table
Table
Table
Table
Workshop
Trainers
Legend
Rolling doors
Doors
Washbasin
Building C-2, First Floor, Room C-103:
Airframe Curriculum Classroom 3, Airframe Components and Special Tools Storage Room, Airframe Shop Area, Welding Area, Female Bathroom, Male Bathroom

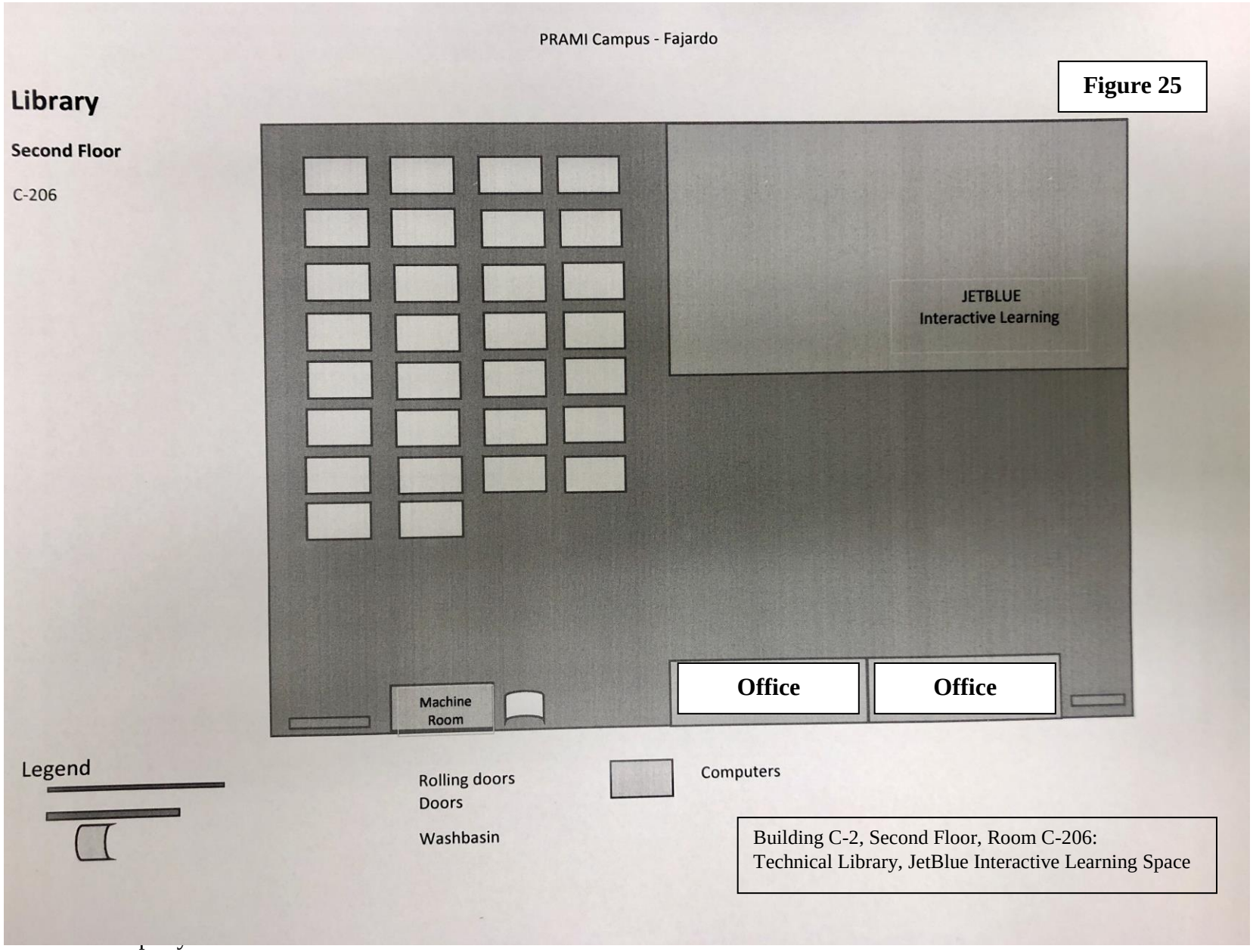


Figure 25

Building C-2, Second Floor, Room C-206:
Technical Library, JetBlue Interactive Learning Space

EQUIPMENT AND MATERIAL INVENTORY

The current inventories of the required instructional aids and equipment, special tools, common hand tools, workshop and classroom equipment, educational materials and technical library will be maintained on file in the Puerto Rico Aviation Maintenance Institute Administrative Office.

The inventories will be accomplished periodically during the academic year as directed by the Puerto Rico Aviation Maintenance Institute Campus Director.

The Puerto Rico Aviation Maintenance Institute will maintain a sufficient amount of common materials required to complete the Practical Projects detailed in the Puerto Rico Aviation Maintenance Institute Curriculums.

PRAMI Instructional Equipment and Material Inventory

Item #	Instructional Equipment	Model-Scale Reading	Quantit	Condition / Comments	
1	Avotek Turbine Fuel System	Item F-51	1	Good Condition / Operational	AF /PP
2	Avotek Anti-Skid Brake System	Item AL-37	1	Good Condition / Operational	AF
3	Avotek Cabin Atmosphere System	Item AS-64	1	Good Condition / Operational	AF
4	Avotek Cockpit Instructional System	Item AS-76	1	Good Condition / Operational	AF /PP
5	Avotek Ice and Rain Protection System	Item AS-61	1	Good Condition / Operational	AF
6	Aviation Technologies Hyd. Line Pressure Tester	Side Land 2 Range 8,000 Pst.	1	Good Condition / Operational	
7	Electrical System	28 V Mockup	1	Good Condition / Operational	
8	Aviation Technologies Oxygen System	Cessna Aircraft Co	1	Good Condition / Operational	AF
9	Oxygen System Installation	Mock-up	1	Good Condition / Operational	AF
10	Air Cycle AirConditioning	Avotek AS-66	1	Good Condition / Operational	AF
11	Flaps Types	Mock-up	1	Good Condition / Operational	AF
12	Ignition System	Mock-up	1	Good Condition / Operational	PP
13	Engine and Swash Plate Assembly	Mock-up	1	Good Condition / Operational	PP
14	Jato-Rocket	Mock-up	1	Good Condition / Operational	PP
15	Engine P/W R-1820	Cut-Away Mock-up	1	Good Condition / Operational	PP
16	Engine P/W R-1830 Electric Motor Drive	Cut-Away Mock-up	1	Good Condition / Operational	PP
17	Westinghouse Turbo-Jet Gas Turbine Engine J-34	Cut-Away Mock-up	1	Good Condition / Operational	PP
18	Allison 250 Gas Turbine Turboshaft Engine	Cut-Away Mock-up	1	Good Condition / Operational	PP
19	Avotek Aircraft Electric System	Item AE-42	1	Good Condition / Operational	AF /PP
20	Fire Detection System Boeing 727	Mock-up	1	Good Condition / Operational	AF /PP
21	Avotek Fire Detection and Smoke Detector System	Power-one-HE 24 Volt 7.5 Amp. and Pneumatic	1	Good Condition / Operational	AF /PP
22	Avotek Turbine Engine Removal and Replacement System	Item E-47	1	Good Condition / Operational	PP
23	Avotek Thrust-Reverser System	Item TA-44	1	Good Condition / Operational	PP
24	Avotek Gas-Turbine Allison 250 Turbo Shaft Engine	Item E-49	1	Good Condition / Operational	PP
25	Avotek Hartzell Reversing Propeller	Item P-26	1	Good Condition / Operational	PP
26	Pneumatic System	Mock-up AS-62	1	Good Condition / Operational	AF
27	Bendix Magnetos	S6LN-PW1063010	6	Good Condition / Operational	PP
28	Twin-Bonanza Landing Gear	Mock-up	1	Good Condition / Operational	AF
29	Teledyne Continental Fuel Injection System	Avotek F52	5	Good Condition / Operational	PP
30	Fuel Manifold Valve	Model EA 6A	5	Acceptable conditions for overhaul simulation	
31	Magneto Bendix	Model 20 EA 22	5	Acceptable conditions for overhaul simulation	
32	Magneto Bendix	Model 1200 EA 33	5	Acceptable conditions for overhaul simulation	
33	Magneto Bendix	Model 200 EA 20	5	Acceptable conditions for overhaul simulation	
34	Magneto Slick	Model 6234 EA-30	10	Acceptable conditions for overhaul simulation	
35	Magneto American	Model SB 9RV-BA21	5	Acceptable conditions for overhaul simulation	
36	Magneto Bendix	Model 2000 EA 28	4	Acceptable conditions for overhaul simulation	
37	Magneto Bendix	Model 3000 BA 28	4	Acceptable conditions for overhaul simulation	
38	Magneto Bendix	Model 20 EAV19	5	Acceptable conditions for overhaul simulation	
39	Starter Light Aircraft	Model MZ 4204-EA41	5	Acceptable conditions for overhaul simulation	
40	Carburetor Marvel Series	Model SPA-MA3	5	Acceptable conditions for overhaul simulation	
41	Carburetor Press. Type	Model PS-5	5	Acceptable conditions for overhaul simulation	
42	Carburetor Press-Type Bendix	Model PD12K-18 BA-18	5	Acceptable conditions for overhaul simulation	
43	Carburetor Marble Scheibler	Model MA 4-5	5	Acceptable conditions for overhaul simulation	
44	Carburetor NAR 9 B	Model-NAR9-19	5	Acceptable conditions for overhaul simulation	

Figure 26

PRAMI Instructional Equipment and Material Inventory

Item #	Instructional Equipment	Model-Scale Reading	Quantit	Condition / Comments	
45	Generator	Bendix R. 1852	4	Acceptable conditions for overhaul simulation	
46	Generator	Delco Remy 1101912	4	Acceptable conditions for overhaul simulation	
47	Altenator	Delco Remy 1100660	4	Acceptable conditions for overhaul simulation	
48	Altenator	TA-42	2	Acceptable conditions for overhaul simulation	
49	Starter	Bendix 756-21-C/W	8	Acceptable conditions for overhaul simulation	
50	Fuel Pump Assembly	Model EA-59	5	Acceptable conditions for overhaul simulation	
51	Fuel Injection	Model RS10B1-EA62	5	Acceptable conditions for overhaul simulation	
52	Fuel Pumps	Teledyne 638154-9	5	Acceptable conditions for overhaul simulation	
53	Electric Fuel Pumps	4013-C	1	Acceptable conditions for overhaul simulation	
54	Fuel Pumps diaphragm	AC	4	Acceptable conditions for overhaul simulation	
55	Propeller Governor	Woodward 210080	12	Acceptable conditions for overhaul simulation	
56	Hydraulic Pumps	Engine Driven	7	Acceptable conditions for overhaul simulation	AF
57	Hydraulic Pumps	Hand operated	2	Acceptable conditions for overhaul simulation	AF
58	Hydraulic Filters	Mesh Types	4	Acceptable conditions for overhaul simulation	AF
59	Fuel Filters	Strainer	5	Acceptable conditions for overhaul simulation	
60	Hydraulic Simulator	Diaphragm	1	Acceptable conditions for overhaul simulation	AF
61	Hydraulic Simulator	Piston Type	1	Acceptable conditions for overhaul simulation	AF
62	Hydraulic Simulator	Blade Type	1	Acceptable conditions for overhaul simulation	AF
63	Industrial Vacuum	Voc. 250383 Voc. 250382	2	Acceptable conditions for overhaul simulation	
64	Voltage Regulator	Carbon Pile 1-D	8	Acceptable conditions for overhaul simulation	
65	Electric Relay	Hartman RN 3025-1	6	Acceptable conditions for overhaul simulation	
		Turbines and Propellers			
66	McCauley Propeller	2 Blade. Full Feather	1	Acceptable conditions for overhaul simulation	
67	Hartzell Propeller	3 Blade Full Feather	2	Acceptable conditions for overhaul simulation	
68	Hartzell Propeller	2 Blade Full Feather	5	Acceptable conditions for overhaul simulation	
69	Hamilton Standard Propeller	2 Blades Fixed	10	Acceptable conditions for overhaul simulation	
70	Hamilton Standard Propeller	3 Blades . Reversible	5	Acceptable conditions for overhaul simulation	
71	Engine Radial, 9 Cylinder	PW R-985	1	Acceptable conditions for overhaul simulation	
72	Engine, Radial, 9 Cylinders(CUTAWAY)	PWR-1820	1	Acceptable conditions for overhaul simulation	
73	Engine, Radial,Jacobs 9 Cylinders	R-755-9	1	Acceptable conditions for overhaul simulation	
74	Engine, Radial,Jacobs 9 Cylinders		1	Acceptable conditions for overhaul simulation	
75	Engine Lycoming, 6 Cylinders	G-50-480-BIAS	4	Acceptable conditions for overhaul simulation	
76	Engine Lycoming, 6 Cylinders	IO-435-2	1	Acceptable conditions for overhaul simulation	
79	Engine Lycoming, 6 Cylinders	IO-540-E4C5	2	Acceptable conditions for overhaul simulation	
77	Engine Lycoming, 6 Cylinders	O-435	3	Acceptable conditions for overhaul simulation	
78	Engine Lycoming, 4 Cylinders	Opposed	1	Acceptable conditions for overhaul simulation	
80	Engine Continental, 6 cylinders	O-470	1	Acceptable conditions for overhaul simulation	
81	Engine Helicopter, Hiller	Mock-up	1	Acceptable conditions for overhaul simulation	
82	Engine, Turbine; Westinghouse	JT-23	2	Acceptable conditions for overhaul simulation	
83	Engine, Turbine; Westinghouse	J-34	1	Acceptable conditions for overhaul simulation	
84	Engine, Turbo-shaft	T53-L13B	2	Acceptable conditions for overhaul simulation	
85	28 VDC 400/1600Amp Tron Air Mobile Grd Power Unit		1	Turbine Engine start unit	
86	Engine Lycoming, 4 Cylinders	Lycoming O-320	1	Runable Engine	
87	Engine, Teledyne Continental	GTSIO520	1	Runable Engine	
88	P&WC Runable Turbine Engine	PT6-20	1	Engine runable	

Figure 27

PRAMI Instructional Equipment and Material Inventory

Item #	Instructional Equipment	Model-Scale Reading	Quantity	Condition / Comments
89	Helicopter	UH-1H	2	Aircraft system operable (Non-Flight)
90	Piper Aztec	PA-23	1	Aircraft Operable (Non-Flight)
91	Piper Cherokee 300	PA-26-300	1	Aircraft Operable (Non-Flight)
92	Beech King Air BE-200T	BE-200T	1	Aircraft Operable (Left Engine In-Op)
93	McDonnel Douglas Airliner	MD-82	1	All systems operable (No Main Engines)
94	Maintenance stands		3	Good Condition / Operational
95	Welding machines		8	Good Condition / Operational
96	CES Electrical Trainer, Analog		10	Good Condition / Operational
97	CES Electrical Trainer, Digital		10	Good Condition / Operational
98	Magnaflux machine		2	Good Condition / Operational

G = GENERAL
AF = AIR FRAME
PP = POWER PLANT

1 SYSEMS THEORY TRAINING
1 SYSTEM TRAINING
SYSTEM TRAINING
MULTIPLE

Figure 28

HAND TOOLS THAT MUST BE SUPPLIED BY THE STUDENT:

Each student must acquire the following tools for use in completing the curriculum Practical Projects:

Tool	Quantity
Ball Peen Hammer, 4 oz. And 8 oz.	2
Mallet, Rubber or Plastic Faced	1
Diagonal Cutter, 8 inch	1
Water Pump or Channel Lock Pliers, 8 to 10 inch	1
Duckbill Pliers, 8 inch	1
Crimping Pliers, Electrical Terminal	1
Safetywire Pliers	1
Needle Nose Pliers	1
Needle Nose Pliers 45 Degree	1
Set, Curved Jaw Vise Grip Pliers, 5” and 7”	2
Set, Allen Wrench, 1/8” thru 3/8”	1
Set, Combination Wrenches, 1/4” thru 1”	1
Set, Open end Wrenches, 3/16” thru 1”	1
Set, Ignition Wrenches	1
Set, Deep Sockets, 1/2” drive, 3/8” thru 1/2”	1
Set, Shallow Sockets, 1/2” drive, 1/2” thru 1”	1
Set, Shallow Sockets, 3/8” drive, 3/8” thru 3/4” (12 Point)	1
Set, Shallow Sockets, 1/4” drive, 3/16” thru 1/2” (12 Point)	1
Set, SwivelSocket, 1/4” drive, 3/16” thru 9/16” (12 Point)	1
ExtraDeep Socket, 1/2” drive, 7/8” (6 Point)	1
Ratchet, 1/4” Drive	1
Ratchet, 3/8” Drive	1
Ratchet, 1/2” Drive	1
Breaker Handle, 1/2” drive (18” – 20” long)	1
Breaker Handle, 3/8” drive (10” – 12” long)	1
Breaker Handle, 1/4” drive (6” long)	1
Speed handle or equivalent, 3/8” drive	1
Set, Extensions, 1/4” drive, (4”, 6”, and 10”)	3
Set, Extensions, 3/8” drive, (4”, 8” or longer)	2
Set, Extensions, 1/2” drive, (6”, 12” or longer)	2
Set, Universal Joints (1/4”, 3/8” and 1/2” drive)	3
Wrench, Adjustable or “Crescent”, 6” and 8”	2
Set, Phillips Screwdriver, Sizes 0,1, 2, 3,	4
Set, StraightSlot Screwdriver	3

Cotterpin Extractor		1
Set, Cold Chisels (3 pc. – 1/4", 3/8" and 1/2")		1
Set, Punches (2pc – Pin Punch and Center Punch)		1
Set, Files, Bastard Cut (Round, Square, HalfRound)		1
Flashlight (2 – D cell)		1
Inspection mirror		1
Magnetic Handle		1
Utility Knife		1
Safety Glasses		1
Magnifying glass, 10X		1
Set, Drill Bits Numerical (#1 – #60)		1
Kit, Basic Sheet Metal work. Required for the Airframe Curriculum. (Items in kit are listed below)		1
Taylor 3X Rivet Gun	T3X	1
Taylor Air Drill, 3/8"	T7788N	1
Straight Universal Rivet Set, 3/32	10021	1
Straight Universal Rivet Set, 1/8"	10026	1
Straight Universal Rivet Set, 5/32"	100211	1
Straight Universal Rivet Set, 3/16	100216	1
Flush Rivet Set w/ rubber guard	FR010	1
Microstop Countersink Cage	CC01KIT4	1
Threaded Countersink Cutters, Piloted (#40, #30, #21, #10)		4
Bucking Bar	BB150	1
Bucking Bar	BB29	
Cleco Pliers	K200	1
Spring Clecos, 3/32"		6
Spring Clecos, 1/8"		6
Spring Clecos, 5/32"		6
Spring Clecos, 3/16"		6
Retaining Springs (Beehive and QuickChange)		2
Air Nipple, Quick Disconnect, 1/4"		2
Air Regulator		1
Mechanic's Tool Bag		1

GLOSSARY OF TERMS AND DEFINITIONS

AMTS	Aviation Maintenance Technician School
AC 43.13.1B /2A	An Advisory Circular in book form issued by the Federal Aviation Administration, which covers acceptable methods, techniques and practices for aircraft inspection and repair.
FAAH808330	Handbook reference for the General Section of this A&P course.
Aircraft Flight Manual	Approved information, which is, must be carried in any aircraft. This Pertains to the speed, engine operating limits and any other information that is vital to the pilot.
Aircraft Type Certificate	The official specifications of an aircraft, engine, or propeller. The FAA uses these. For an aircraft, engine or propeller to be airworthy, it must conform to these specifications.
AAIPR	Aeronautical and Aerospace Institute of Puerto Rico
Engine	A machine that uses heat energy to develop mechanical power.
FAA	Federal Aviation Administration. A part of the Department of Transportation. The Federal Aviation Administration establishes the rules and regulations as well as enforces those rules. The purpose of the FAA is to set the standards of civil aircraft for public safety.

FAA Approved Data Information, instructions, drawings, diagrams, etc. that has been approved by the Federal Aviation Administration to perform repairs or alterations on a certificated aircraft. Approved data examples are: Airworthiness Directives (AD's), Manufacturer's FAA Approved data under a (DOA) manufacturer's manual. Type Certificate Data and Specifications Sheets (TCDS), Supplemental Type Certificates (STC), FAA Designated Engineering Representatives (DER), FAA Designated Alteration Station (DAS), Parts Manufacturer Approved (PMA) and Technical Service Order (TSO).

14 CFR Part 147 Federal Aviation Regulation

14 CFR Part 1 Federal Aviation Regulation section that contains the definitions and abbreviations that pertain to all aviation operations.

14 CFR Part 43 Federal Aviation Regulation that prescribes the rules governing the maintenance, preventive maintenance, rebuilding, and alteration of any aircraft having a U.S. Airworthiness Certificate; airframe, aircraft engines, propellers, appliances and component parts of such aircraft.

14 CFR Part 45 **Identification and Registration Markings**

14 CFR Part 65 Federal Aviation Regulation that prescribes the requirements for issuing the following certificates and associated ratings and the general operating rules for the holders of those certificates and ratings.

b) Air Traffic Controllers
c) Aircraft Dispatchers
d) Mechanics
e) Repairmen
f) Parachute Riggers

14 CFR Part 91	Federal Aviation Regulation that prescribes the flight rules governing the operation of aircraft within the United States and 12 nautical miles from the coast of the United Stated
FAA Form 337	A Federal Aviation Administration form required to record major repairs and major alterations performed on any aircraft airframe, powerplant, propeller or appliance.
Mockup	A fullscale reproduction of a part or assembly used to determine whether or not all the components would fit as they are designed. It is also used as an expedient for instruction when the real object is impractical to use.
Operational Check	Checks made to a unit to determine that it is operating properly.
Powerplant	Is considered the complete installation in an aircraft of the engine, propeller, and all of the accessories and controls needed for its proper operation.
Reciprocating Engine	An engine that converts heat energy from burning fuel into the reciprocating movement of the pistons. This movement is converted into rotary motion by the connecting rods and crankshaft.
Standard	The degree of excellence required for a particular purpose.
Turbine	A rotary device actuated by impulse or reaction of a fluid or air flowing through the vanes or blades, arranged around a central shaft.
Turbine Engines	A type of aircraft engine, which consists of an air compressor, a combustion section, and a turbine. Increasing the velocity of the air flowing though the engine produces thrust.

DESCRIPTION OF THE OCCUPATION

The dictionary of Occupational Titles, Volume II, Fourth Edition, Revised 1991, Published by the U.S. Department of Labor – Employment and Training Administration, Page 566; describes the occupations as follows:

621.281014 AIRFRAME AND POWERPLANT MECHANIC (aircraft mfg.; air trans.) alternate titles: aircraft mechanic; airplane mechanic

Services, repairs and overhauls aircraft and aircraft engines to ensure airworthiness. Repairs, replaces, and rebuilds aircraft structures, such as wings and fuselage, and functional components including rigging, surface controls, and plumbing and hydraulic units, using hand tools, power tools, machines, and equipment such as shears, sheetmetal brakes, welding equipment, rivet guns and drills. Reads and interprets manufacturer's and airlines maintenance manuals, service bulletins, and other specifications to determine feasibility and method of repairing or replacing malfunctioning or damaged components. Examines engines for cracked cylinders and oil leaks, and listens to operating engines to detect and diagnose malfunctions, such as sticking or burned valves, inspects turbine blades to detect cracks or breaks. Test engine operation, using testing equipment, such as ignition analyzer, compression checker, distributor timer, and ammeter, to locate source of malfunction. Replaces or repairs worn or damaged components, such as carburetors, alternators, and magnetos, using hand tools, gauges, and testing equipment. Removes engine from aircraft, using hoist or forklift truck. Disassembles and inspects parts for wear, warping or other defects. Repairs or replaces defective engine parts and reassembles and installs engine in aircraft. Adjusts, repairs, or replaces electrical wiring system and aircraft accessories. Performs miscellaneous duties to service aircraft, including flushing crankcase, cleaning screens, greasing moving parts, and checking brakes. May be required to be licensed by the Federal Aviation Administration. May service engines and airframe components at line station making repairs, short of overhaul, required to keep aircraft in safe operating condition and be designated Airframe and Powerplant Mechanic, Line Service (air trans.). May service and repair aircraft and engines prior to, during, or after flight to ensure airworthiness, working on flight line of aircraft manufacturing facility, and be designates Aircraft and Engine Mechanic, Field and Hangar (aircraft mfg.); Flightline Mechanic (aircraft mfg.); Mechanic, Field Service (aircraft mfg.). May specialize in rework, repair and modification of structural, precision, and functional spare parts and assemblies at

manufacturing facility and be designated Spares Rework Mechanic (aircraft mfg.). may specialize in engine repair and be designated Aircraft Engine assembler (air trans.); Aircraft Engine Cylinder Mechanic (air trans.); aircraft Engine Dismantler (air trans.); Aircraft Engine Installer (air trans.); Aircraft Engine mechanic (air trans.); Aircraft Engine Mechanic, Overhaul (air trans.). May be designated: Carburetor Mechanic (air trans.); Helicopter Mechanic (air trans.); Hydraulic Tester (air trans.); ignition Specialist (air trans.); Overhaul and Repair Mechanic (aircraft mfg.); Supercharger Mechanic (air trans.).

APPENDIX A

APPENDIX A

TERMS AND DEFINITIONS

This appendix defines the terms used in Appendixes B, C, and D and describes the levels of proficiency at which the items under each subject in each curriculum must be taught, as outlined in Appendixes B, C and D.

1. Definitions – as used in Appendixes B, C, and D:

    a. "Inspect" means to examine by sight and touch.

    b. "Check" means to verify proper operation.

    c. "Troubleshoot" means to verify proper operation.

    d. "Service" means to perform functions that assure continued operation.

    e. "Repair" means to correct a defective condition. A repair of an airframe or powerplant system includes replacement and adjustment of components.

    f. "Overhaul" means to disassemble. Clean, inspect, repair as necessary, reassemble and tested in accordance with approve standards and technical data.

2. Teaching Levels

   a. Level 1 requires:

      1) Knowledge of general principles, but not practical application

      2) No development of manipulative skill.

      3) Instruction by lecture, demonstration and discussion.

   b. Level 2 requires:

      1) Knowledge of general principles, and limited practical application.

      2) Development of sufficient manipulative skill to perform basic operations.

      3) Instruction by lecture, demonstration, discussion, and limited practical application.

   c. Level 3 requires:

      1) Knowledge of general principles and performance of high degree of practical application.

      2) Development of sufficient manipulative skill to simulate return to service.

      3) Instruction by lecture, demonstration, discussion, and a high degree of practical application.

3. Teaching materials and equipment – The curriculum may be presented utilizing currently accepted educational materials and equipment, including, but not limited to: calculators, computers and audiovisual equipment.

APPENDIX B

APPENDIX B

GENERAL CURRICULUM SCHEDULE

US 14 CFR Part 147

This appendix lists the subjects required in that at least 424 hours in the General Curriculum subjects.

The number in parenthesis before each item listed under each subject heading indicates the level of proficiency at which that item must be taught.

A.	**Basic Electricity**		
	Teaching Level		
	(2)	1.	Calculate and measure capacitance and inductance
	(2)	2.	Calculate and measure electrical power
	(3)	3.	Measure voltage, current, resistance and continuity.
	(3)	4.	Determine the relationship of voltage, current, and resistance in electrical circuits.
	(3)	5.	Read and interpret aircraft electrical circuit diagrams, including solidstate devices and logic functions.
	(3)	6.	Inspect and service batteries.
B.	**Aircraft Drawings**		
	(2)	7.	Use aircraft drawings, symbols, and systems schematics.
	(3)	8.	Draw sketches of repairs and alterations.
	(3)	9.	Use blueprint information.
	(3)	10.	Use graphs and charts.
C.	**Weight and Balance**		
	(2)	11.	Weigh aircraft.
	(3)	12.	Perform complete weight and balance check and record data.
D.	**Fluid Lines and Fittings**		
	(3)	13.	Fabricate and install rigid and flexible lines and fittings.
E.	**Materials and Processes**		

Appendix B continued:

	(1)	14.	Identify and select appropriate nondestructive testing methods.
	(2)	15.	Perform dye penetrant, eddy currents, ultrasonic and magnetic particle inspections.
	(1)	16.	Perform basic heattreating processes.
	(3)	17.	Identify and select aircraft hardware and materials.
	(3)	18.	Inspect and check welds.
	(3)	19.	Perform precision measurements.
F.	**Ground Operation and Servicing**		
	(2)	20.	Start, ground operate, move, service, and secure aircraft and identify typical ground operation hazards.
	(2)	21.	Identify and select fuels.
G.	**Cleaning and Corrosion Control**		
	(3)	22.	Identify and select cleaning materials/
	(3)	23.	Inspect, identify, remove, and treat aircraft corrosion and perform aircraft cleaning.
H.	**Mathematics**		
	(3)	24.	Extract roots and raise numbers to a given power.
	(3)	25.	Determine areas and volumes of various geometrical shapes.
	(3)	26.	Solve ratio, proportion, and percentage problems.
	(3)	27.	Perform algebraic operations involving addition, subtraction, multiplication and division of positive and negative numbers.
I.	**Maintenance Forms and Records**		
	(3)	28.	Write descriptions of work performed including aircraft discrepancies and corrective actions using typical aircraft maintenance records.
	(3)	29.	Complete required maintenance forms, record, and inspection reports.
J.	**Basic Physics**		
	(3)	30.	Use and understand the principles of simple machines, sound, fluid, and heat dynamics, basic aerodynamics, aircraft structures, and theory of flight.

Appendix B continued:

K.	**Maintenance Publications**		
	(3)	31.	Demonstrate the ability to read, comprehend and apply information contained I FAA and manufacturers' aircraft maintenance specifications, data sheets, manuals, publications, and related Federal Aviation Regulations, Airworthiness Directives and Advisory Circulars.
	(3)	32.	Read technical data
L.	**Mechanic Privileges and Limitations**		
	(3)	33.	Exercise mechanic privileges within the limitations prescribed by Part 65 of this chapter.
M.	**Safety Communications Program**		
	(2)	34.	The student will search and study the content of an appropriate SDS on file and answer a number of questions given by the instructor.
	(2)	35.	Given the necessary equipment and text material, the student will demonstrate on the shop machines, the proper procedures to comply with the machine lockout and to return it to service.
	(3)	36.	The student will inspect all the fire extinguishers in each station and report any discrepancy noted. He will explain and demonstrate the proper use of a fire extinguisher.

DEPARTMENT OF EDUCATION
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OPERATIONS MANUAL

APPENDIX C

APPENDIX C

AIRFRAME CURRICULUM SCHEDULE

This Appendix list the subjects required in the 762 hours of the Airframe Curriculum, in addition to the 424 hours in the General Curriculum subjects.

The number in parenthesis before each item listed under each subject heading indicates the level of proficiency at which that item must be taught.

I. AIRFRAME STRUCTURES			
A.	**WOOD STRUCTURES**		
	Teaching Level		
	(1)	1.	Service and repair wood structures.
	(1)	2.	Identify wood defects.
	(1)	3.	Inspect wood structures.
B.	**AIRCRAFT COVERING**		
	(1)	4.	Select and apply fabric and fiberglass covering materials.
	(2)	5.	Inspect, test and repair fabric and fiberglass.
C.	**AIRCRAFT FINISHES**		
	(1)	6.	Apply, trim letters and touchup paint.
	(2)	7.	Identify and select aircraft finishing materials.
	(2)	8.	Apply finishing materials.
	(2)	9.	Inspect finishes and identify defects.
D.	**SHEET METAL AND NONMETALLIC STRUCTURES**		
	(2)	10.	Select, install, and remove special fasteners for metallic, bonded and composite structures.
	(2)	11.	Inspect bonded structures.
	(2)	12.	Inspect, test, and repair fiberglass, plastic, honeycomb, composite and laminated primary and secondary structures.

Appendix C continued:

	(2)	13.	Inspect, check, service and repair windows, doors, and interior furnishings.
	(3)	14.	Inspect and repair sheet metal structures.
	(3)	15.	Install conventional rivets.
	(3)	16.	Form, layout and bend sheet metal.
E.	**WELDING**		
	(1)	17.	Weld magnesium and titanium.
	(1)	18.	Solder stainless steel.
	(1)	19.	Fabricate tubular structures.
	(2)	20.	Solder, braze, gas weld and arc weld steel.
	(1)	21.	Weld aluminum and stainless steel.
F.	**ASSEMBLY AND RIGGING**		
	(1)	22.	Rig rotarywing aircraft.
	(2)	23.	Rig fixedwing aircraft.
	(2)	24.	Check alignment of structures.
	(3)	25.	Assemble aircraft components, including flight controls.
	(3)	26.	Balance, rig and inspect moveable primary and secondary flight control surfaces.
G.	**AIRFRAME INSPECTION**		
	(3)	28.	Perform airframe conformity and airworthiness inspections.
II.	**AIRFRAME SYSTEMS AND COMPONENTS**		
A.	**AIRCRAFT LANDING GEAR SYSTEMS**		
	(3)	29.	Inspect, check, service and repair, landing gear, retraction systems, shock struts, brakes, wheels, tires and steering systems.
B.	**HYDRAULIC AND PNEUNMATIC POWER SYSTEMS**		
	(2)	30.	Repair hydraulic and pneumatic power systems
	(3)	31.	Identify and select hydraulic fluids.
	(3)	32.	Inspect, check, service, troubleshooting, and repair hydraulic and pneumatic power systems.
C.	**CABIN ATMOSPHERE CONTROL SYSTEMS**		
	(1)	33.	Inspect, check, troubleshoot, service and repair heating, cooling, air conditioning, pressurization systems and air cycle machines.
	(1)	34.	Inspect, troubleshoot, service, and repair heating, cooling air conditioning and pressurization systems.
	(2)	35.	Inspect, check, troubleshoot, service, and repair oxygen systems.

Appendix C continued:

D.	**AIRCRAFT INSTRUMENT SYSTEMS**		
	(1)	36.	Inspect, check, service, troubleshoot, and repair electronic flight instrument, systems and both mechanical and electrical heading, speed, altitude, temperature, pressure and position indicating systems to include the use of builtin test equipment.
	(2)	37	Install instruments and perform static pressure system leak test.
E.	**COMMUNICATION AND NAVIGATION SYSTEMS**		
	(1)	38.	Inspect, check, and troubleshoot autopilot, servos, and approach coupling systems.
	(1)	39.	Inspect, check, service aircraft electronic communication and aviation systems, including VHF passenger address interphones and static discharge devices, aircraft VOR, ILS, LORAN, Radar beacon transponders, flight management computers and GPWS.
	(1)	40.	Inspect and repair antenna and electronic equipment installations.
F.	**AIRCRAFT FUEL SYSTEMS**		
	(1)	41.	Check and service fuel dump systems
	(1)	42.	Perform fuel management, transfer, and defueling.
	(1)	43.	Inspect, check and repair pressurefueling systems.
	(2)	44.	Repair aircraft fuel system components.
	(2)	45.	Inspect and repair fuel quantity indicating systems
	(2)	46.	Troubleshoot, service, and repair fluid pressure and temperature warning systems.
	(3)	47.	Inspect check, service, troubleshoot and repair aircraft fuel systems.
G.	**AIRCRAFT FUEL SYSTEMS**		
	(2)	48.	Repair and inspect aircraft electrical system component; crimp and splice wiring to manufacture’s specifications and repair pins and sockets of aircraft connectors.
	(3)	49.	Install, inspect and service aircraft electrical wiring, controls, switches, indicators and other protective devices
	(3)	50 a.	Inspect, check, troubleshoot, service and repair alternating and direct current electrical systems.
	(1)	50 b.	Inspect, check, and troubleshoot constant speed and integrated speed drive generators.

Appendix C continued:

H.	**POSITION AND WARNING SYSTEMS**		
	(2)	51.	Inspect, check and service speed and configuration warning systems, electrical brake control and antiskid.
	(3)	52.	Inspect, check, troubleshoot, and service landing gear position indicating and warning systems.
I.	**ICE AND RAIN CONTROL SYSTEMS**		
	(2)	53.	Inspect, check, troubleshoot, service, and repair airframe ice and rain control systems.
J.	**FIRE PROTECTION**		
	(1)	54.	Inspect, check, and service, smoke and carbon monoxide detection systems.
	(3)	53.	Inspect, check, service, troubleshoot, and repair aircraft fire detection and extinguishing systems.

APPENDIX D

APPENDIX D

POWERPLANT CURRICULUM SCHEDULE

This Appendix list the subjects required in the 750 hours of the Powerplant Curriculum, in addition to the 454 hours in the General Curriculum subjects.

The number in parenthesis before each item listed under each subject heading indicates the level of proficiency at which that item must be taught.

I.	**POWERPLANT THEORY AND MAINTENANCE**		
A.	**RECIPROCATING ENGINES**		
	Teaching Level		
	(1)	1.	Inspect and repair a radial engine.
	(2)	2.	Overhaul reciprocating engine.
	(3)	3.	Inspect, check, service, and repair reciprocating engines and engine installations.
	(3)	4.	Install, troubleshoot, and remove reciprocating engines.
B.	**TURBINE ENGINES**		
	(2)	5.	Overhaul turbine engine.
	(3)	6.	Inspect, check, service, and repair turbine engines and turbine engine installations.
	(3)	7.	Install, troubleshoot and remove turbine engines.
C.	**ENGINE INSPECTION**		
	(3)	8.	Perform powerplant conformity and airworthiness inspections
II.	**POWERPLANT SYSTEMS AND COMPONENTS**		
A.	**Engine Instrument Systems**		
	(2)	9.	Troubleshoot, service, and repair electrical and mechanical fluid rateofflow indicating systems.
	(3)	10.	Inspect, check, service, troubleshoot, and repair electrical and mechanical engine temperature, pressure, and R.P.M. indicating systems.

Appendix D continued

B.	**ENGINE FIRE PROTECTION SYSTEMS**		
	(3)	11.	Inspect, check, service, troubleshoot and repair engine fire detection and extinguishing systems.
C.	**ENGINE ELECTRICAL SYSTEMS**		
	(2)	12.	Repair engine electrical system components.
	(3)	13.	Install, check, and service engine electrical wiring, controls, switches, indicators and protective devices.
D.	**LUBRICATING SYSTEMS**		
	(3)	14.	Identify and select lubricants.
	(2)	15.	Repair engine lubrication system components.
	(3)	16.	Inspect, check, service, troubleshoot, and repair engine lubrication systems.
E.	**IGNITION AND STARTING SYSTEMS**		
	(2)	17.	Overhaul magneto and ignition harness.
	(2)	18.	Inspect, service, troubleshoot, and repair reciprocating and turbine engine ignition systems and components.
	(3)	19a.	Inspect, service, and troubleshoot turbine engine electrical starting systems
	(1)	19b.	Inspect, service, and troubleshoot turbine engine pneumatic starting systems.
F.	**FUEL METERING SYSTEMS**		
	(1)	20.	Troubleshoot and adjust turbine engine fuel metering systems and electronic engine fuel controls.
	(2)	21.	Overhaul carburetor.
	(2)	22.	Repair engine fuel metering system components.
	(3)	23.	Inspect, check, service, troubleshoot and repair reciprocating and turbine engine fuel metering systems.
G.	**ENGINE FUEL SYSTEMS**		
	(2)	24.	Repair engine fuel system components.
	(3)	25.	Inspect, check, service, troubleshoot, and repair engine fuel systems.
H.	**INDUCTION AND ENGINE AIRFLOW SYSTEMS**		
	(2)	26.	Inspect, check, troubleshoot, service, and repair engine ice and rain control systems.

Appendix D continued

	(1)	27.	Inspect, check, service, troubleshoot, and repair heat exchanger, superchargers and turbine engine airflow and temperature control systems.
	(3)	28.	Inspect, check, service, and repair carburetor air intake and induction manifolds.
I.	**ENGINE COOLING SYSTEMS**		
	(2)	29.	Repair engine cooling system components.
	(3)	30.	Inspect, check, troubleshoot, service, and repair enginecooling systems.
J.	**ENGINE EXHAUST AND REVERSER SYSTEMS**		
	(2)	31.	Repair engine exhaust system components.
	(3)	32a.	Inspect, check, troubleshoot, service, and repair engine exhaust systems.
	(1)	32b.	Troubleshoot and repair engine thrust reverser systems and related components.
K.	**PROPELLERS**		
	(1)	33.	Inspect, check, service, and repair propeller synchronizing and ice control systems.
	(2)	34.	Identify and select propeller lubricants.
	(1)	35.	Balance propellers.
	(2)	36.	Repair propeller control system components.
	(3)	37.	Inspect, check, service, and repair fixedpitch, constantspeed, and feathering propellers and propeller governing systems.
	(3)	38.	Install, troubleshoot, and remove propellers.
	(3)	39.	Repair aluminum alloy propeller blades.
L.	**UNDUCTED FANS**		
	(1)	40.	Inspect and troubleshoot unducted fan systems and components.
M.	**AUXILIARY POWER UNITS**		
	(1)	41.	Inspect, check, service, and troubleshoot turbine driven auxiliary power units

APPENDIX E

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CHARTER FOR THE ESTABLISHMENT OF THE PUERTO RICO AVIATION MAINTENANCE INSTITUTE ADVISORY COMMITTEE

The Director, Technical Education authorizes the establishment of a continuing committee to known as the **PUERTO RICO AVIATION MAINTENANCE INSTITUTE ADVISORY COMMITTEE.**

An advisory committee is a group of concerned people working together to use their expertise, experience, or other entity. The Carl D. Perkins Vocational and Applied Technology Education Amendments of 1998 require that vocational and technical programs have a functioning advisory committee. These committees are an effective tools for the advising about and recommending curriculum content and revision, serving as political allies, assisting in identifying materials and resources, and providing relevance to the world of work. Legal and policy requirements, the availability of personnel to serve on the committee, and the potential benefits to the Puerto Rico Aviation Maintenance Institute should all be assessed.

The Carl D. Perkins Vocational and Applied Technology Education Amendments of 1998 require that state and local agencies involve "parents, student, teachers, representatives of business and industry labor organizations, representatives of special populations and other interested individuals in the development, implementation and evaluation of vocational and technical education programs". The Puerto Rico Aviation Maintenance Institute Advisory Committee members must understand the program and its place within the education. And be sure that they know why they were selected as members of the committee

The purpose of the Puerto Rico Aviation Maintenance Institute Advisory Committee is to serve as an arm of the Institute board by providing advice and counsel to the Director, Technical Education Program.

The Puerto Rico Aviation Maintenance Institute Advisory Committee serves at the pleasure of **t**he Director, Technical Education Program, which reserves the right to dissolve the committee at any time or for any purpose.

Charter for the Establishment of the Puerto Rico Aviation Maintenance Institute – Advisory Committee (cont.)

The Puerto Rico Aviation Maintenance Institute Advisory Committee is expected to contribute to the improvement of Technical Education.

1. Assisting with annual and long-range planning.

2. Advising on current and long-range labor market trends.

3. Conducting occupational/community surveys as related to the Puerto Rico Aviation Maintenance Institute needs of the community.

4. Advising the administration and the Director, Technical Education Program concerning course content and development.

5. Assisting in finding industry practice centers and job placement of the student.

6. Facilitating the communications that create good public relations between the Institute and the community.

7. Providing a consulting service to the administration and to the Director, Technical Education Program in areas of equipment and facility planning

8. Providing assistance to the Institute administration, through assigned activities associated with program staffing.

9. Assisting in course review activities and/or program evaluation.

10. Identifying and assessing community resources that will offer support to the instructional program.

In authorizing the organization of the Puerto Rico Aviation Maintenance Institute Advisory Committee, the Director, Technical Education pledges cooperation in the committee work. The Puerto Rico Aviation Maintenance Institute Advisory Committee will be expected to operate within the guidelines set forth.

Charter for the Establishment of the Puerto Rico Aviation Maintenance Institute – Advisory Committee (cont.)

STEPS IN FORMING THE PUERTO RICO AVIATION MAINTENANCE INSTITUTE ADVISORY COMMITTEE

STEPS		HOW TO ACCOMPLISH	
1.	Profesors will be instructed on the functions of the Advisory Committee	1.1	Study and learn the duties and functions of the Advisory Committee
		1.2	Study the advantages of organizing an advisory committee.
		1.3	Explain the function of an advisory committee.
		1.4	Prepare a list of people as a pool from which members will be selected.
		1.5	The Puerto Rico Aviation Maintenance Institute Coordinator will contact these people and complete the Prospective Advisory Committee Interview Form.
		1.6	The Director, Technical Education Program will write an invitation letter to these people
		2.1	The Director, Technical Education Program will make an appointment for the first meeting and write an invitation letter.
		3.1	Explain the job of the advisory committee.
		3.2	Elect a temporary chairperson, secretary and appoint the nomination committee.
		3.3	Decide on a definite meeting place and time.
		3.4	Prepare a Working Plan for the Puerto Rico Aviation Maintenance Institute Advisory Committee.