AIAA Design Competitions
Official Rules

ELIGIBILITY REQUIREMENTS

- All AIAA University Student members (hereinafter "students") are eligible and encouraged to participate. All student participants must have a current membership with AIAA to submit a report and to receive any prizes.
- At least one Project/Faculty Advisor must be an AIAA member.
- Students must submit their intent to participate and final report via the online submission site (www.aiaa-awards.org) to be eligible to participate. **No extensions will be granted.**
- More than one design may be submitted from students at any one school. At large student members may collaborate with each other even if they do not attend the same university.
- If a design group withdraws their final report from the competition, the team leader must notify AIAA Headquarters immediately.
- Use of the competition RFPs as part of an organized classroom requirement are eligible and encouraged for competition.
- Designs submitted must be the work of the students, but guidance may come from the Faculty/Project Advisor and should be accurately acknowledged.
- Prize funds will only be awarded if at least three valid final entries are received in the category.

SCHEDULE

- The schedule for AIAA Design Competitions will be posted to the Design Competitions program website each year by mid-August. The schedule posted to the program website is the final schedule unless otherwise stated.
- A general schedule may be found below:
    - **Mid-August**: RFPs posted to website
    - **Early February**: Intent to Participate and Team Roster submitted via online submission site
    - **Mid-May**: Final Design Proposal submitted via online submission site
    - **Mid-June**: Proposals accepted or denied for judging
    - **August-September**: Results announced and winners notified

CATEGORIES/SUBMISSIONS

The number and types of categories/competitions offered in any given year is at the discretion of the AIAA Foundation.

- **Team Submissions:** Team competitions will be groups of not less than three and not more than ten AIAA Student Members per entry, unless otherwise specified in the competition Request for Proposal (RFP).
- **Individual Submissions:** Individual competitions will consist of only one AIAA Student Member per entry.
- **Graduate Category:** Graduate students may participate in the graduate and open categories only. Graduate category entries must comprise at least 2/3 graduate students.
- **Undergraduate Category:** Undergraduate entries must be comprised of all undergraduate students. No graduate students may participate in the undergraduate category.
- **Open Division:** Both graduate and undergraduate students may participate in the Open Division. Teams can be a mix of any level. Individuals or teams may participate in this category.

Team Roster and Intent to Participate:

- Team Roster and Intent to Participate (basic proposal information) indicating interest in participating in the design competitions is required before submitting a final report.
- All Team Roster and Intent to Participate Forms must be submitted through the online submission system. This only asks for basic information about your proposal and team.
- Team Roster and Intent to Participate must include the competition of interest, proposal title, student's names, emails, AIAA membership numbers and expiration dates, faculty advisor(s) names, emails, and project advisor(s) names and emails. Incomplete forms will result in the Team or Individual being ineligible to compete in the competition.

Submission of Final Design Report:

- Each team or individual must provide an electronic (.pdf) copy of their design report as outlined below, or according to the RFP instructions, to the online submission site, https://www.aiaa-awards.org/a. Only the person who submitted the intent to participate may submit the final design report.

- An electronic copy of the report in PDF format must be submitted to AIAA using the online submission site referenced above. Total size of the file cannot exceed 25 MB.
- Electronic report files must be named (example): "year_[name of university]_Design_Report.pdf"
- A separate "signature" page must be included with your submission and include the following:
  - All student participants, their AIAA numbers and signatures.
    - Individual or team photos are highly recommended but not required. AIAA will collect a team photo for use in their promotional materials for the winning reports.
  - Faculty and/or Project Advisors, their signatures, and AIAA number(s) as appropriate per the Eligibility Requirements.
  - If the submitting team is comprised of at-large student members, each student member needs to include the name of the university he or she attends.
- Electronic reports should be **no more than 100 pages**, double-spaced (including graphs, drawings, photographs, and appendices) if it were to be printed on 8.5"x11.0" paper, and the font should be no smaller than 10 pt. Times New Roman, unless otherwise stated in the relevant competition RFP. Default margins should be 1" on all sides.
  - Any text that is not double-spaced will incur a page-count penalty of 1.75 pages for each improperly spaced page (or portion thereof), with a minimum penalty based on ½ page. For grading purposes, improperly spaced pages will be replaced by their penalized page-count equivalent.
    - Example: An 85-page report in which 40 pages are formatted with 1.5 spacing and 45 pages are correctly double-spaced will be counted as 115 pages for grading purposes, calculated as 45 (properly spaced pages) + 70 (40 × 1.75) = 115 pages (resulting in a report that is now over the limit and thus subject to penalties, including possible disqualification)
  - NO foldouts (11"x17") are acceptable
  - Team may adjust the landscape and portrait layout of a page at their discretion
- Failure to adhere to all the above formatting requirements may result in your report being penalized at the discretion of the judges.

- Minimum penalty will be 10% on the final score
- Maximum penalty will be disqualification

COPYRIGHT

- All submissions to the competition shall be the original work of the team members. Authors retain copyright ownership of all written works submitted to the competition. By virtue of participating in the competition, team members and report authors grant AIAA a non-exclusive license to reproduce submissions, in whole or in part, for all of AIAA's current and future print and electronic uses. Appropriate acknowledgment will accompany any reuse of materials. Winning reports will be posted on the AIAA website.

CONFLICT OF INTEREST

- It should be noted that it shall be considered a conflict of interest for a design professor to write or assist in writing RFPs and/or judging proposals submitted if (s)he will have students participating in, or that can be expected to participate in those competitions. A design professor with such a conflict must refrain from participating in the development of such competition RFPs and/or judging any proposals submitted in such competitions.

AWARDS

- The prize money provided for the competitions is funded through the AIAA Foundation. The monetary awards may differ for each competition, with a maximum award of $750. The award amounts will be listed on the AIAA Design Competitions program website once per year at the beginning of each cycle. One representative from the first-place team may.be invited by the Technical Committee responsible for the RFP to make a presentation of their design at an AIAA forum. A travel stipend may.be available for some competitions, with a maximum travel stipend of $750 which may be used to help with costs for flight, hotel, or conference registration to attend an AIAA forum.
- Paper certificates will be provided to each individual team member plus a faculty advisor and project advisor, only if the team or individual places first, second or third place. This does not include institutions/individuals from nations subject to US government sanction. It is the team's/individual's responsibility to provide an appropriate mailing address to AIAA HQ for the purposes of mailing these certificates.

- Participation certificates may be requested in writing to studentprogram@aiaa.org and they will be delivered in electronic format only. Teams may request participation certificates up to 01 October of the same year.

PROPOSAL REQUIREMENTS

- The technical proposal is the most important factor in the award of a contract. It should be specific and complete. While it is realized that all of the technical factors cannot be included in advance, the following should be included:
    - Demonstrate a thorough understanding of the Request for Proposal (RFP) requirements.
    - Describe the proposed technical approaches to comply with each of the requirements specified in the RFP, including phasing of tasks. Legibility, clarity, and completeness of the technical approach are primary factors in evaluation of the proposals.
    - Particular emphasis should be directed at identification of critical, technical problem areas. Descriptions, sketches, drawings, systems analysis, method of attack, and discussions of new techniques should be presented in sufficient detail to permit engineering evaluation of the proposal. Exceptions to proposed technical requirements should be identified and explained.
    - Include tradeoff studies performed to arrive at the final design.
    - Provide a description of automated design tools used to develop the design.
- All analytical modeling tools, data sources, computer codes, and technical resources used to generate, analyze, model and produce the design and associated report must be:
    - Available for inspection, download, and/or sale to all individuals and entities regardless of nationality as allowed by US export laws; OR
    - Generated personally by the students on the team without the use of codes falling under restriction or substantial material assistance by individuals or entities outside of the team.
- Teams are required to list all computer codes used along with the URL where they may be obtained under the conditions above (e.g. https://www.mathworks.com/products/matlab.html). Teams must agree to this provision when submitting their materials.
- The use of generative AI is discouraged in AIAA Design Competition submissions as these are learning focused competitions. Individual RFPs may prohibit AI, make sure to read the entire RFP for guidance.

- Please refer to the AIAA policy on the use of AI (https://aiaa.org/publications/publish-with-aiaa/ethical-standards-for-publication-of-aeronautics-and-astronautics-research/). Per the AIAA research and AI policy, all submissions to the competition shall be the original work of the team members.
- Consistent with the AIAA policy, if AI has been used in the creation of the design or report in any manner, a 1-page disclosure must be included with the report (NOT included in the 100 page count). Any usage of AI shall be covered in this disclosure.
- Teams should note that if the use of AI is observed or suspected in the submissions, judges may use their individual discretion in deciding whether the use of AI has been properly acknowledged and disclosed, whether it follows the AIAA policy listed above, and whether report evaluations and scoring will be impacted.

RULES, REGULATIONS, AND LAWS GOVERNING TECHINICAL REVIEW AND FINANCIAL AWARDS

- This competition is subject to all applicable laws, including US export control laws. US law prevents AIAA from awarding prize money to, or providing substantive feedback on entries from, persons residing in sanctioned countries. Currently those countries are Iran, Cuba, North Korea, Crimea, Sudan, or Syria, but these are subject to change. Furthermore, any persons or entities on the US Department of Treasury's Specially.Designated.Nationals.and.Blocked.Persons.List ("SDN List") may not participate. Therefore, AIAA will not accept submissions from residents of sanctioned countries or any individuals or entities from the SDN List. AIAA is not responsible for US export laws concerning the provision of technical feedback or prize money, and AIAA will not make any exceptions to this provision and will comply with all relevant US export laws.
- NON-HARASSMENT: Any faculty, advisor(s), student or student(s) found to be sending or directing harassing messages to any staff member, professional volunteer, or other competition participant regarding application of the Design Competition program rules is subject to a ban on themselves and their university's future participation in this AIAA program, up to and including a permanent ban. The determination of staff and volunteers regarding the application of U.S. government rules and regulations regarding financial awards, technical feedback and review are final.

- By participating in an AIAA sponsored activity, all participants, regardless of membership status, are subject to the AIAA Code of Ethics and the Anti-Harassment Policy.

BASIS FOR JUDGING

- The AIAA Technical Committee that developed the RFP will serve as the judges of the final reports. Unless other judging criteria are outlined in the relevant RFP, reports will be evaluated according to the criteria below. Please refer to the RFP for your competition to see if the criteria are different. Judges reserve the right to not award all three places. Judges' decisions are final, and candidates will be provided feedback via judging comments after the program has closed for the cycle. Points listed below are guidelines given to the judges. They are approximate as each competition varies slightly on its emphasis.
    - **Technical Content (40 points)**
        - This concerns the correctness of theory, validity of reasoning used, apparent understanding and grasp of the subject, etc. Are all major factors considered and a reasonably accurate evaluation of these factors presented?
        - Historical judging criteria
            - Requirements
            - Concept Selection
            - Quantitative Analysis of Selected Concept
            - Tools and Methods
            - Technical Soundness and Completeness
    - **Organization and Presentation (20 points)**
        - The description of the design as an instrument of communication is a strong factor in judging. Organization of written design, clarity, and inclusion of pertinent information are major factors.
        - Historical judging criteria
            - Overall neatness and style of report
            - Paper follows a logical flow, is easy for the reader to follow
            - Introduction clearly defines purpose of paper
            - Figures, graphs, tables are uncluttered and are easy to understand

- Proper grammar and spelling
- All previous relevant work cited
- Conclusions are concise and fully substantiated

- **Originality (10 points)**
  - The design proposal should avoid standard textbook information, and should show the independence of thinking or a fresh approach to the project. Does the method and treatment of the problem show imagination? Does the method show an adaptation or creation of automated design tools?
  - Historical judging criteria
    - Concepts considered show originality
    - Overall treatment and approach to the problem showed imagination
    - Unconventional approaches and concepts were considered
    - Innovation and creativity demonstrated during the design process
- **Practical Application and Feasibility (30 points)**
  - The proposal should present conclusions or recommendations that are feasible and practical and not merely lead the evaluators into further difficult or insolvable problems.
  - Historical judging criteria
    - Technical Feasibility
    - Economic Feasibility
    - Broader Impacts

- The following table highlights typical sections included in the design reports.
  - This table is for guidance only
  - This table is NOT comprehensive
  - This table does not guarantee any level of score
  - Judges typically expect these topics covered in the report and per the RFPs
  - The RFP requirements take precedence over this chart

	AIRCRAFT	SPACE	MISSILE
Executive Summary	X	X	X
Table of Contents	X	X	X
Nomenclature	X	X	X
List of Figures	X		
List of Tables	X		
Compliance Checklist	X	X	X

Introduction	X	X	X
SE-ConOps, Requirements, Schedule	X	X	X
Sizing/Vehicle Approach/High Level Trade Studies	X	X	X
Tools and Methods	X		X
Launch Facility Considerations			
Launch Platform Considerations			
Internal and External Configuration	X		X
Staging		X	
Propulsion	X	X	X
Power		X	
Aerodynamics	X		X
Performance/Orbital Mechanics	X	X	X
Stability and Control	X	X	X
Structures	X		X
Loads			
Mass Properties	X	X	X
Systems	X	X	X
Avionics/Guidance			X
Landing Gear			
Cost Analysis	X	X	X
Ordnance/Drop/Refill			
Targeting and Effectiveness			X
Acoustics, Survivability, Observability, Emissions, Environmental Considerations			
Development Plan and Manufacturing			X
Repair and Maintenance	X		
Conclusions	X	X	X
References	X	X	X
Appendices			

CONTACT DETAILS

- For more information about this program, please contact us at studentprogram@aiaa.org.
- For technical questions about the RFPs, please contact the point of contact listed in the RFP.

Request for Proposal

Hybrid Electric STOL Commuter Aircraft Design

AIAA 2026-2027 Open Division Graduate/Undergraduate Aircraft Design Competition
Aircraft Design Technical Committee, POC: Doug Wells douglas.p.wells@gmail.com

Background

Developments in electric motors, controllers, power generation and most importantly batteries have led to the development of hybrid gas-electric cars, such as the Toyota Prius and Chevrolet Volt, entering the market from the year 2000 onwards. These vehicles use a combination of energy storage in fossil fuels and chemical batteries to achieve their fuel efficiency, range, and performance goals. Modern fully electric cars such as the Tesla Model S and Nissan Leaf followed around the start of the 2010s marking the beginning of the modern electric vehicle era. In the coming decade, the technology for batteries will be challenged to achieve the size and energy density required for practical general aviation flight. A mix of propulsion technologies will likely define the transition toward more sustainable future general aviation flight (Ref. 1). Current research and industry development activities focus on hybrid electric concepts as a transitional solution between conventional fuel-powered aircraft and fully electric propulsion (Ref. 2,3).

Project Objective

This Request For Proposal is for the design of a Hybrid Electric Short Take off and Landing (STOL) commuter aircraft, including the design of the high-voltage/high-power distribution propulsion system. The entry into service (EIS) is 2035 for a STOL 8-seater with 400 nmi of range. The intent is to have energy storage to supplement takeoff, climb, and full-electric cruise capability via batteries and electric motors. A combustion engine providing additional power and/or direct propulsion for cruise to extend the range and to supply for go-around and emergencies.

One potential mission for such a vehicle includes commuter services between metropolitan centers (San Francisco to LA is ~300 nmi) that originate from and arrive at small airports near urban centers. This would enable point-to-point travel in new markets that otherwise would be difficult to service. Identification of other new markets and how the vehicle can be used to serve them should be considered an important part of the design process.

Engine = internal combustion engine
Motor = electric motor powered by batteries or generated power

Requirements (T-Threshold, O-Objective)

- **General Requirements**
  - (T) Capable of taking off and landing from runways (asphalt & concrete)
  - (T) Minimum cruise speed of 225 knots
    - (O) Target cruise speed: 250 knots or greater
  - (T) Design range at max payload: 400 nmi
    - (O) Target electric range: 200 nmi or greater
  - (T) Capable of VFR and IFR flight
  - (O) Capable of flight in known icing conditions
  - (T) Meets applicable certification rules in FAA/EASA
    - Assume reserves and equipment required to meet applicable FAR/EASA requirements.
  - (T) Engine/propulsion system specifications and assumptions documented
    - Use of engine(s) that will be in service by 2035.
      - At a minimum, assumptions on specific fuel consumption/efficiency, thrust/power and weight should be specified.
      - Ensure that the power used by alternators, generators or other devices are accounted for.
    - Use of electric motor(s) that will be in service by 2035
      - Document battery energy and power density assumptions based on reasonable technology trends.
      - Document system efficiency and calculate the total propulsive efficiency using, at a minimum, the efficiency of the batteries, wires, controllers, thermal management system, connectors, motors and propellers.
      - Document electric propulsion system weight.
  - (T) Show the emergency range to get to an alternate airport at the maximum feasible weight from an engine failure at 5000' AGL (ISA+ 18^{O}F) with electric power from batteries alone.
  - (O) Capable IFR flight with autopilot
    - Provide systems and avionics architecture that will enable autonomous flight.
    - Provide a market justification for choosing to either provide or omit this capability.
- **Mission Requirements**
  - (T) Crew: 1 pilot
  - (T) 7 passengers
  - (T) Passenger/pilot and baggage weight assumptions:
    - Passenger/pilot weight of 190 lb.
    - Baggage weight per passenger/passenger of 30 lb and volume of at least 4 cubic feet per passenger.
  - (T) 400 nmi design range mission with IFR reserves.
  - (T) Maximum takeoff and landing field lengths of 300' over a 50' obstacle to a runway with dry pavement (sea level ISA + 18^{O}F day).
  - (T) Initial climb rate at sea level (ISA+ 18^{O}F) at least 1500 fpm with both electric and fossil fuel propulsion operating.

- (T) Meet FAA Climb with a Critical Loss of Thrust (CLoT) condition. CLoT being defined by the FAA as a single failure that most significantly impacts the climb performance of the aircraft.

Design Objectives

- Minimize the life cycle environmental impact by choosing appropriate materials and manufacturing methods.
- Identify different operating/business concepts for the aircraft and identify important features for different mission operators.

Other features and considerations

- Identify possible systems functionality and components that are required for the aircraft to operate in both controlled and uncontrolled airspace.
- Consider which aircraft features will be included in the base model and which will be optional for a customer.

Notes and assumptions:

- Assume an entry into service (EIS) of 2035 when making technology decisions and justify all decisions with appropriate references.

Report and Design Data Requirements

The technical report shall present the design of this aircraft clearly and concisely; it shall cover all relevant aspects, features, and disciplines. Pertinent analyses and studies supporting design choices shall be documented.

Full descriptions of the aircraft are expected along with performance capabilities and operational limits. These include, at a minimum:

1. A description of the design missions defined for the proposed concepts for use in calculations of mission performance as per design objectives. This includes the selection of cruise altitude(s), cruise speeds and V_speeds (stall, minimum control, etc.) supported by pertinent trade analyses and discussion.
2. Aircraft performance summaries shall be documented and the aircraft flight envelope shall be shown graphically.
    a. Takeoff, and landing performance should also be shown at 5,000' above mean sea level (ISA + 18^{O}F) as well as for concrete fields at sea level (ISA+18^{O}F)
3. Payload range chart(s), indicating at least design range and max electric range missions
4. A V-n diagram for the aircraft with identification of necessary aircraft velocities and design load factors. The maximum dive speed of the aircraft shall be specified.
5. Materials selection for main structural groups and general structural design, including layout of primary airframe structure as well as the strength capability of the structure and how that compares to what is required at the ultimate load limits of the aircraft and identify the major load paths.
6. Complete geometric description, including dimensioned drawings, airfoil selection, control surfaces sizes, and internal arrangement of the aircraft illustrating sufficient volume for all necessary components and systems.
    a. Scaled three-views (dimensioned) and 3-D model imagery of appropriate quality are expected. The three-view must include at least:
        i. Fully dimensioned front, left, and top views
        ii. Location of aircraft neutral point
        iii. Location of average CG location (relative to nose)
        iv. Wing planform definition
        v. Aspect ratio, taper ratio, thickness, sweep, etc., and a description of the high-lift devices
        vi. Tail moment arms
        vii. Extended and retracted landing gear position (if applicable)
    b. Diagrams and/or estimates showing that internal volume requirements are met, including as a minimum the internal arrangements of the passenger, and cargo.
        i. Cross-section showing passenger seats
        ii. Layout of passenger cabin
        iii. Layout of cockpit
        iv. Layout of cargo and size and location of any unique cargo doors
        v. Inboard profile of aircraft
    c. Diagrams showing the location and functions for all aircraft systems.
7. Important aerodynamic characteristics and aerodynamic performance for key mission segments and requirements including climb, cruise, descent, approach, and for low-speed operations (i.e., takeoff and landing)

   a. Derivation of airplane lift and drag models
   b. Aircraft drag polars for cruise, takeoff, and landing configurations
8. Aircraft weight statement, aircraft center-of-gravity envelope reflecting payloads, and fuel allocation for each mission.
9. Establish a forward and aft center of gravity (CG) limits for safe flight.
   a. Weight assessment summary shall be shown at least at the following level of detail:
      i. Propulsion (engine/motor, batteries, controller, wiring, heat sink, cowl, strut, propeller, spinner etc. as applicable)
      ii. Airframe Structure
         1. Wing
         2. Empennage
         3. Landing Gear (including wheels tires and brakes)
         4. Fuselage
      iii. Payloads (seats, seatbelts, cushions and other cabin systems)
      iv. Systems
         1. Instruments and Avionics
         2. Fuel/oil (battery if electric)
         3. Hydraulic/pneumatic/electrical systems (if chosen)
10. Propulsion system description and characterization including performance, dimensions, and weights. The selection of the propulsion system(s), sizing (including propeller design and performance in cruise, take-off (STOL) and climb), and airframe integration must be supported by analysis, trade studies, and discussion. Provide the overall electrical power distribution: batteries location(s), DC network, power converter(s), AC link to e-motors, e-motors. Optimization of the DC voltage vs current. Also justify through engineering trades the hybridization scheme and fraction.
11. Aircraft systems description and layout including (as applicable) but not limited to: landing gear, electrical, hydraulics, fuel/energy, pressurization, air conditioning, avionics, control system actuators, flight control computers.
12. Summary of basic stability and control characteristics; this should include, but is not limited to:
   a. An analysis is required for climb, cruise, descent, approach, and for low-speed operations (i.e., takeoff and landing).
   b. Flight control system architecture and major components shall be specified. Deliverables shall include:
      i. Criteria for horizontal and vertical tail sizing
      ii. Longitudinal static stability and trim analysis
      iii. Longitudinal and lateral/directional dynamic stability analysis
13. Summary of cost estimate and a business case analysis in 2035 dollars. This assessment should identify the cost groups and drivers, assumptions, and design choices aimed at the minimization of production costs.
   a. Estimate the non-recurring development costs of the airplane including engineering, FAA/EASA certification, production tooling, facilities and labor
   b. Any design features, engineering/analytical techniques, and manufacturing processes that increase or decrease cost should be explained. Cost trades between threshold and objective requirements should be discussed.
   c. Estimate the fly away cost

d. Estimate the price required to generate at least a 15% profit
    i. Show how the airplane could be produced profitably at production rates ranging from 4 to 10 airplanes per month or a rate that is supported by a brief market analysis
e. Estimate of direct operating cost per airplane flight hour
    i. Fuel, oil, tires, brakes, battery cost and other consumable quantities
    ii. Estimate of maintenance cost per flight hour
    iii. Flight and cabin crew costs per hour

The design report will include trade documentation on the two major aspects of the design development, a) the concept selection trades, and b), the concept development trade studies.
The student(s) is (are) to develop and present the alternative concepts considered leading to the down-select of their preferred concept. The methods and rationale used for the down-select shall be presented. At a minimum a qualitative assessment of strengths and weaknesses of the alternatives shall be given, discussing merits, leading to a justification as to why the preferred concept was the best design. Quantitative justification of why the selected concept is the best at meeting the measures of merit(s) will strengthen the report.
In addition, the submittal shall include the major trade studies conducted justifying the optimization, sizing, architectural arrangement and integration of the specifically selected concept. Quantitative data shall be presented showing why their concept 'works' and is the preferred design compromise that best achieves the design requirements.

Reference Material

1. Kuśmierek, A., Galiński, C. Stalewski W., Review of the hybrid gas - electric aircraft propulsion systems versus alternative systems, Progress in Aerospace Sciences Volume 141, 1 August 2023.
2. Cozzolino et al. 2023, Technology readiness assessment and performance forecast on a 19 seats E-STOL EIS 2032, https://iopscience.iop.org/article/10.1088/1742-6596/2526/1/012016/pdf.
3. Bonnin & Hoogreef 2025, Exploration of Off-Design Performance for Hybrid Electric Regional Aircraft https://repository.tudelft.nl/record/uuid:067483d8-b241-47ad-b0ee-0b3b2adff545, https://arc.aiaa.org/doi/10.2514/1.C037893.
4. Borer, NK, Blaesser, NJ, Patterson, MD, "Regulatory Considerations for Future Regional Air Mobility Aircraft" AIAA 2023-3294, AIAA Aviation 2023, https://doi.org/10.2514/6.2023-3294.
5. De Vries, R. et al. Conceptual Design of Electrified Aircraft: A Practical Guide for Engineering Students and Practitioners, AIAA Aviation 2026