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Michael G. Whitaker
Administrator
Federal Aviation Administration
800 Independence Avenue, S.W.
Washington, D.C. 20553-0002

Subject Addressing Critical Workforce Shortages and Bureaucratic Inefficiencies in the Aviation Industry

Dear Administrator Whitaker:

The challenges facing international aviation authorities, and the aerospace industry are well-documented and acknowledged for years. Despite widespread awareness, little action has been taken to mitigate the issues. Today, we are experiencing the full impact of long-foreseen challenges, especially the workforce shortages in key technical roles. The aviation sector's current crisis of approximately 24,000 unfilled Aviation Maintenance Technician (AMT) and Air Traffic Controller positions [Oliver Wyman Global Fleet and MRO Market Forecast 2024-2034] highlights only one area of the problem.

While the Agency has taken important steps through grants, rulemaking, and other initiatives to address shortages in the AMT and Air Traffic Controller sectors, it is equally critical to focus on the professional engineering talent necessary to review and approve maintenance data, provide aftermarket support, perform inspections and quality functions, and handle type certification. Acknowledging the need, on June 4, the Agency messaged its designees seeking help in filling AVS inspector and engineering positions.

Unfortunately, simply increasing the number of personnel will increase inefficiencies if the right talent isn't placed in key positions. These individuals must be able to work efficiently and effectively to address the current workload and backload, but to prepare for future industry growth.

Currently, communication with industry has become fragmented, the number of approvals and layers of review have increased, the agency personnel are inexperienced and moved frequently, and industry demands have increased. Tasks that were once resolved through simple email or phone interactions now take 2-20 weeks, requiring multiple levels of engagement. Oversight managers now respond with "I don't have that authority," despite position or title. Guidance to the agency's workforce has tripled despite relatively few changes in regulatory language. The bureaucratic complexity creates a significant administrative burden without discernible increase to the safety of the national air space.

For example, policy [FAA Order 8000.95C Page 9-7] discourages agency personnel from engaging with future designees creating a chilling effect on both industry employment and Agency operations. Potential designees are discouraged when the agency won't even acknowledge their applications. Additionally, changes to the designee system have exacerbated these inefficiencies. "Recommend Approvals" are underutilized and expanded designations require egregious reviews, leading to further delays and resource mismanagement.

The Agency is also engaged in enforcement actions that have unintentionally diminished the value of designee system. The enforcement of FAA Order 8110.37F, Ch. 4, Para 1 creates reluctance by new ACO engineers to rely on its designee's approval. This fosters distrust between agency personnel and its designees. This creates a risk of apathy in Designees, doubling the work for agency personnel, which further compounds the workforce crisis.

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As the FAA replaces its retiring workforce and adjusts its technical staff, regulatory experience, technical knowledge, and industry acumen necessary to meet today's challenges reside largely with the designees. Given the stringent requirements for becoming a designated engineering representative (DER) (*e.g.*, 8 years of industry experience), DERs represent the most experienced sector of the workforce. It is concerning that many agency engineering personnel would not qualify for DER status, yet they hold authority over designees.

To be clear, I am not advocating for a reduction in scrutiny of the designee system. Rather, I am highlighting the inequality in vetting designees compared to the ease with which agency positions are filled. To balance this disparity, it is imperative that the agency addresses the inefficiencies and bureaucratic barriers that threaten aerospace capacity for innovation and growth.

Proposed Solutions to Address Key Issues

While the challenges may seem overwhelming, there are methods of effectively addressing them without rulemaking or complex policy changes. Instead, tangible actions can leverage available tools and resources and provide immediate and long-term benefits. These solutions will help restore trust between the FAA and the industry, rekindling the collaborative partnership that made the U.S. a global leader in aviation.

Develop On-Site Training Programs: A key step in bridging the gap between the FAA and the industry is to foster greater understanding and collaboration through on-site training programs at both FAA and industry facilities. These programs, which can be implemented using existing frameworks, should be formalized as a robust part of the agency's educational requirements. Through agency personnel experiencing certificate holder training in real-world industry environments and vice versa, both parties will gain deeper insights into the practical challenges of obtaining certification and maintaining compliance. Although some engagements with FAA engineers have already begun, expanding this initiative requires no rulemaking, just a commitment to solidifying and scaling the collaboration. This will promote transparency, build trust, and ensure long-term engagement.

Leverage Risk-Based Resource Management (RBRM): The FAA must leverage its existing Risk-Based Resource Management (RBRM) system by applying it strategically to applicants and designees. By utilizing RBRM, the agency can reduce its resource burden while enabling applicants to assume more responsibility. This approach requires no policy changes—just a more effective deployment of current resources. Acceptance or approval of minor/major repair procedures for repair stations, expanded eligibility procedures for PMA holders, and mutually agreed-upon criteria for part criticality are some of the areas which can all be formalized using existing tools. These measures naturally extend the involvement of FAA designees, allowing them to take on tasks that would otherwise require direct FAA involvement.

Reinforce Applicant Oversight and Compliance: Strengthening the role of the applicant in showing compliance can be achieved without any rule changes. By fostering collaboration through training and formal agreements, applicants will be better equipped to provide robust showings of compliance during the application and continued airworthiness processes. This will allow FAA certification basis (CB) engineers to focus on critical areas, reducing overall agency and NAS risk. The improved showings of compliance will streamline the process, allowing the agency to focus resources on safety-critical areas, all within the current regulatory framework. Doing so with formal applicant/agency agreements that cite the established standards ensures oversight is timely, efficient, and effective.

Maximize the Designee System and Foster Engagement: The FAA should actively leverage its designee system by engaging current and potential designees more effectively. The designee system is in place and



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is populated by some of the most experienced experts in their field of aerospace. The agency update the method of obtaining potential designee expertise so when a specialist or type of designee is needed *anywhere* by the agency or the industry, the application can be processed accordingly. Applying the RBRM system more aggressively will enhance oversight where necessary and expand delegations where appropriate—maximizing the impact of designees.

Initiatives like allowing “recommend approval” or limited-scope expansions of designations, which are low-risk and already permitted, can be utilized more effectively. This would require simply developing a more strategic use of the available tools. Additionally, establishing a journeyman or apprenticeship program for engineering designees would create a continuous pipeline of qualified personnel, again without requiring any policy changes.

Conclusion

The proposed solutions do not require any significant policy shifts or regulatory changes. By simply utilizing available tools and systems A, we can streamline operations, reduce inefficiencies, and foster a more collaborative relationship between the agency and the industry. These actions will address both the immediate workforce crisis and future industry growth while maintaining regulatory integrity and safety.

Sincerely,

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