STATEMENT OF DORENDA BAKER, DIRECTOR OF THE AIRCRAFT CERTIFICATION SERVICE AND JOHN S. DUNCAN, DIRECTOR OF THE FLIGHT STANDARDS SERVICE, FEDERAL AVIATION ADMINISTRATION, BEFORE THE HOUSE COMMITTEE ON TRANSPORTATION AND INFRASTRUCTURE, SUBCOMMITTTEE ON AVIATION ON THE REVIEW OF FAA'S CERTIFICATION PROCESS: ENSURING AN EFFICIENT, EFFECTIVE, AND SAFE PROCESS, OCTOBER 30, 2013.

Chairman LoBiondo, Congressman Larsen, Members of the Subcommittee:

Thank you for the opportunity to appear before you today to discuss the Federal Aviation Administration's (FAA) certification processes. I am Dorenda Baker, the Director of the Aircraft Certification Service (AIR), and with me today is John Duncan, the Director of the Flight Standards Service (AFS). This is our first time formally appearing before this subcommittee and we look forward to informing you of the ongoing work for which our organizations are responsible. We share the view of this subcommittee that, in order to support the safest, largest, most complex aviation system in the world, FAA must continue to strive to make our processes as efficient and effective as possible, while also maintaining high standards of safety.

FAA Aircraft Certification Processes

First, I would like to recognize that we expect the Small Airplane Revitalization Act of 2013 to be passed by Congress quite shortly. This legislation is intended to support the manufacturers of, primarily, general aviation airplanes and components by requiring FAA to reorganize and streamline our regulations to improve the certification process applicable to small airplanes. We believe that transforming part 23 into requirements that are based on airplane complexity and performance will provide for streamlined approval of safety advancements, which will improve safety and reduce the regulatory cost burden for both the FAA and industry. This approach is

expected to advance the safety of general aviation by spurring innovation and adoption of technical advancements. AIR agrees completely that this undertaking is worthwhile. Last month, the FAA formally approved the rulemaking project to revise part 23 (the certification regulations applying to small airplanes), giving it the priority and necessary resources. We believe this project is essential to supporting the vitality of the general aviation community, which is an important foundation for all aviation-related operations and products in our industry. This is a priority of my organization and I am personally committed to seeing that the rework of part 23 is successful.

FAA certifies aircraft, aircraft engines, propellers and articles. We set standards to which an applicant must conform. Some version of our certification processes have been in place for over 50 years, but our regulations and policies have evolved in order to adapt to an ever-changing industry that uses global partnerships to develop new, more efficient and safer aviation products and technologies.

The FAA uses a risk based approach to improving aviation safety by focusing resources and efforts on those areas that have the highest risk. AIR continues to develop procedures and tools under this philosophy. The applicant is required to develop the plans and specifications and perform the inspections and tests necessary to establish that the design of an aircraft or article complies with the regulations. The FAA is responsible for determining that the applicant has shown that the design meets the required standards. Using our risk based approach, we focus our resources on areas of highest risk while leveraging our delegation system to focus on other areas.

FAA encourages applicants that want to apply for a type certificate to work with the FAA well in advance of presenting a formal application in order to both familiarize the applicant with the

applicable certification requirements and familiarize FAA with the proposed design. Once the certification basis is established for the proposed design, the FAA and the applicant develop and agree to a certification plan. In order to receive a type certificate, the applicant must show that the product is compliant with existing standards and any special conditions for novel or unusual design features. This is accomplished through detailed airplane-level analysis, lab tests, and flight tests, all of which are subject to FAA oversight. If the FAA finds that a proposed new type of aircraft, engine or propeller (product) complies with safety standards, it issues a type certificate.

AIR monitors the production and continued operational safety of all the products it certifies for the life of those products. In that respect, we are responsible for an ever expanding range of products. Effectively managing the safe oversight of the largest fleet of aircraft in the world, while continuing to support the innovation of new products and technologies is a challenge, but one that we recognize is vital to the economic growth of our country.

Flight Standards Certification Processes

Once the aircraft is certified and introduced into service, it is the responsibility of AFS to set the standards for the people and organizations who operate and maintain them. AFS sets standards for pilots, mechanics, airlines, repair stations and training schools.

Airmen certification standards are set at differing levels of privilege. For pilots, they range from student pilot, for those with the least experience, to airline transport pilot, for the most accomplished pilots in the system. In addition to pilot certificates, other airmen certificates include anyone who can impact operational safety in the system, from instructors and mechanics, to parachute riggers and flight attendants.

Individuals who hold FAA certificates must demonstrate proficiency for the type of certificate that they are applying for and hold. This is usually done through some type of training with a certified instructor, some number of hours logged doing the activity authorized by the certificate, and passing a practical test that includes both an oral and demonstration of proficiency component.

For operators, such as part 121 air carriers, the FAA uses a comprehensive certification process to determine whether an applicant is able to conduct business in a manner that complies with all applicable regulations and safety standards and allows the entity to manage the hazard-related risks in its operating systems and environment. The FAA's initial certification process assures that the operator's processes, programs, systems, and intended methods of compliance are thoroughly reviewed, evaluated, and tested. The certification process provides the traveling public confidence that the air carrier's infrastructure, including its programs, methods and systems, results in continued compliance and provides it with the ability to manage hazard related risks in the specific operating systems and environment. The certificate holder must provide service at a high degree of safety in the public interest.

As is the case with aircraft certification, AFS must monitor the continued operational safety of its certificate holders. As in other areas of the agency, this monitoring is based on risk identified by information FAA is continually obtaining through its oversight activities. Any action that has the potential for impacting a certificate holder, such as a merger or bankruptcy, triggers additional scrutiny to ensure compliance with FAA standards.

FAA Modernization and Reform Act of 2012

In February of 2012, Congress passed the FAA Modernization and Reform Act of 2012. The law contained two provisions that required the FAA to work with industry representatives to review and reform the aircraft certification process and standardize the FAA's regulatory interpretations (sections 312 and 313 respectively). Both sections required FAA to issue reports to Congress on the recommendations reached as a result of these Congressional directives. On August 13, 2012, FAA delivered the report pursuant to section 312. On July 19, 2013, FAA delivered its initial report on section 313. Both AIR and AFS are working internally and with industry on implementation of the recommendations contained in these reports.

Section 312

In response to section 312, the FAA and industry representatives met to develop consensus recommendations to review and reform the aircraft certification process, with the goal of reducing the time and cost of certification without compromising FAA safety standards. The group developed six recommendations. The recommendations were mapped to 14 FAA initiatives. The process is extremely transparent. FAA meets regularly with industry representatives to update them on the status of the initiatives and posts the status on the FAA website every six months.

The recommendations encourage FAA to more thoroughly utilize its delegation authority in several areas to better utilize FAA resources. Some of the changes required to implement the recommendations are long term in nature or require coordination with other agencies. Consequently, while initial steps have been taken to initiate implementation of the recommendations, such as the establishment of an Aviation Rulemaking Committee (ARC), or a

pilot program, full implementation, in most cases, will take several years. In addition, in order to determine if the agency actions are achieving the goals of the initiatives, metrics must be developed and agreed to. We are currently working with industry on those metrics.

Since the original release of the Implementation Plan on January 7, 2013, the FAA has made progress on all of the initiatives. To give you an idea of some of the foundational steps we have taken toward implementation of the recommendations, last August the FAA entered into a two year pilot program to expand delegation of noise findings to an organizational designation office (ODA). This will give the industry more flexibility in its planning of certification activities. This is an endeavor FAA has been working on for several years and required the assistance of FAA's Office of Environment and Energy and the agreement of the Environmental Protection Agency. We are hopeful the information generated by the pilot program will support the expansion of delegation in this area.

In addition, the FAA established an Aviation Rulemaking Committee (ARC) to update part 21 Certification Procedures for Products and Parts. The kickoff meeting was held last November with a goal of updating the regulations to reflect a systems safety approach to product certification processes and oversight of the design organizations.

Another area of importance to industry that was addressed in the report on section 312 is FAA's system for sequencing its certification projects. FAA put its system into place in 2005 and, while industry understood the need to prioritize work within the agency, it was critical of the inability to predict when a project would be initiated under this system. The FAA requested comments from the public on the original process in October of 2012. The public comments were assessed and a revised process was published for public comment in April 2013. Those comments have

now been reviewed and a revised process has been developed to address industry concerns. FAA expects to begin to transition to the new process in 2014.

Finally, as part of FAA's ODA Action Plan, FAA published an order that included a number of enhancements requested by industry to increase the efficiency of ODA certification processes and improve the utilization of ODA authority. The order provides for better communication between FAA and ODA holders, as well as more flexibility for the ODA. Greater flexibility translates into the ODA having more control over its projects timelines. The effectiveness of the changes made in the order will be evaluated with industry in the first quarter of calendar year 2014.

Section 313

In response to section 313, the FAA reviewed and accepted the Consistency of Regulatory Interpretation Aviation Rulemaking (CRI ARC) recommendations. The recommendations were reviewed by multiple FAA policy divisions, and we developed a preliminary implementation plan that was included in the FAA Report to Congress on the Consistency of Regulatory Interpretation. The FAA has since developed and begun executing a detailed implementation plan to address the root causes identified by the ARC, including the need for clear regulatory requirements, standardized regulatory application training, and a change in the enforcement-based culture.

The Director of the FAA Flight Standards Service and the Director of the FAA Aircraft Certification Service participated actively with the industry stakeholders in developing six recommendations to improve upon issues of consistency in regulatory interpretation by offices within each service organization, as well as between Flight Standards and Aircraft Certification.

We worked to address these concerns strategically through careful and systemic long-term improvements that will have lasting impact, as well as meaningful metrics that can be tracked internally and by industry. We noted that multiple recommendations are being addressed by current initiatives to change cultural norms within, and improve training for, the Flight Standards and Aircraft Certification workforce. The FAA also wanted to ensure that implementation of the recommendations is consistent with the safety management system framework used to assess and mitigate risk without compromising safety.

It became clear that long-term planning and culture change would be essential to affect the improvements sought by industry. In order to address the recommendations as soon as practical, the detailed implementation plan identifies near-, mid-, and long-term priorities related to each recommendation.

The near-term strategy addresses the foundational concepts in the recommendations that allow the FAA to use existing processes. For example, we were able to address and close the recommendation asking the FAA to improve its rulemaking procedures and guidance to ensure each proposed and final rule preamble contain a comprehensive explanation of the purpose, technical requirements, and intent of the rule. The Office of Rulemaking was able to address this recommendation by reviewing existing training requirements for rulemaking team members, as well as making improvements to existing processes.

The primary area of importance identified by industry was a standardized methodology whereby all FAA guidance documents, including legal interpretations and Chief Counsel opinions, are linked to a specific regulation. The FAA is currently reviewing existing IT systems to determine how best to achieve this goal. As one of its near-term strategies for implementation, we are

reviewing existing guidance documents used by FAA personnel that are not catalogued in one of the electronic databases. By the end of the year, we expect to identify all such documents and establish a protocol to determine if such documents are still applicable, in which case they will be integrated into one of our existing electronic systems. In the alternative, we will issue guidance to all personnel that any such documents not otherwise integrated into one of the electronic systems are cancelled. This process will address a significant concern on the part of industry involving ad hoc usage of guidance documents issued to address a specific and narrow set of circumstances.

Since the FAA concurs that a change in culture is the primary component of successful implementation of the recommendations, we have begun the process of reviewing and improving FAA workforce training. We started our evaluation with training for FAA personnel responsible for promulgating guidance material to ensure that all guidance is clearly linked to the underlying regulation and a standardized methodology is used to develop guidance documents. We will then review current FAA workforce training for personnel responsible for regulatory application.

The FAA met with industry representatives to review the implementation plan. We expect to complete the near-term priorities by the end of this year. The FAA agrees with industry stakeholders that a more standardized methodology for regulatory application at the national, regional, and field levels of Flight Standards and Aircraft Certification is necessary. We expect to continue a dialogue with industry stakeholders and evaluate the implementation plan on an ongoing basis as we work toward implementation of the feasible long-term priorities by 2015.

Conclusion

As the reports we have submitted and this testimony indicates, the FAA is underway in addressing the concerns identified as a result of the provisions in the FAA Modernization and Reform Act of 2012. Our efforts are transparent and are being done with the support of industry. The reports have clarified a path forward for the FAA to meet the ongoing and future demand of a dynamic industry that is crucial to the economic interests of all Americans. We are cognizant of the importance of our efforts and we look forward to working with industry and this subcommittee as we strive to achieve the goals that have been set for us.

Mr. Chairman, this concludes my statement. Mr. Duncan and I will be happy to answer any questions you have at this time.