Mike Borfitz, DER

1037 NE 65th St #80135, Seattle WA 98115 <u>mike@borfitz.com</u>, www.borfitz.com 206-714-8797

Designated Engineering Representative (DER), Aviation Regulatory Consultant

Forty years of industry and FAA experience in US and international aircraft type & production certification, specializing in validation projects with the FAA. Approve data as authorized, and manage certification programs as an FAA Designated Engineering Representative (DER); Management, Powerplant Installations and Flight Test, FAR 23 and 25. FAA experience includes Aircraft Certification Office (ACO) Manager, Standards Staff Manager, Engine and Propeller Directorate, and International Branch Project Manager, Transport Airplane Directorate Standards Staff.

Additional experience in aviation safety, Quality Management (AS9100), FAR 145 (Repair Stations), FAA policies, rulemaking, compliance, surveillance and enforcement. Noted for systemic knowledge of the regulatory system, and innovative solutions to difficult and emergent issues. Available as an expert witness for legal firms addressing subjects such as FAR 21.3 "Reporting of failures, malfunctions, and defects", safety, accident causes, flight test and theft of trade secrets.

CEO, Kilroy Aviation

January 2018 – Present: Co-founder and Chief Executive of Kilroy Aviation, an aerospace engineering firm formed for the purpose of providing FAA designee services for type (TC), production (PC), supplemental type certification (STC) and international certification; Organization Designation Authorization (ODA) authorization pending. The essence of the Kilroy business strategy is unmatched performance and the highest level of integrity, driven at the core by an intense focus on system safety. Significant interface with FAA and designees in all aerospace disciplines.

ODA Administrator, ALOFT AeroArchitects

September 2016 – Present: ODA Administrator responsible for issuing Supplemental Type Certificates (STC) as delegated by the FAA, for US and international projects. Responsible for developing all related processes, procedures and other qualifications including oversight of certification activities on behalf of the FAA. The ODA Administrator must have a deep knowledge of all FAA processes, procedures and requirements, and have a proven track record of high integrity and solid performance with the FAA.

Manager, Safety & Certification Engineering, Aviation Partners Boeing (APB)

June 2012 – January 2015: Management DER responsible for APB certification and safety processes, and principal contact for FAA and international certification agencies. Additional duties include oversight of APB internal process that determines Major vs Minor changes to Type Designs in accordance with APB-FAA Partnership for Safety Plan. Duties included certification plan and flight test coordination for performance, flutter, stability and control, minimum control speeds, etc.

Program Manager, FAA Transport Airplane Directorate (TAD), International Branch

September 2004 – December 2011 (Retirement): Responsible for FAA type validation and continued operational safety of non-US manufactured transport category airplanes. Assigned SAAB, Gulfstream Aerospace LP (GALP) and Israel Aerospace Industries (IAI) products. Program manager for FAA type

validation of GALP G150 (November 2005) and G280. FAA process owner for bilateral relationship with CAA of Israel (CAAI). Act as internal FAA subject matter expert (SME) for international harmonization and validation projects for bilateral efforts with countries such as China, Japan, Russia and others.

Associate Technical Fellow (ATF) Safety and Regulatory Affairs, Boeing Fleet Support

October 2002 – September 2004: Lead Airline Process owner, manage Boeing responsibilities for Air Transport Association (ATA) Lead Airline Process, a cooperative tool used by Boeing, ATA and the FAA to maximize continued operational safety in a cost-effective manner. Regulatory and fleet safety consultant, called upon frequently by all Boeing organizations for regulatory expertise in type certification, safety & risk mitigation, production and operational issues. Frequent direct interface with FAA and a wide variety of international authorities to facilitate negotiations on difficult issues.

Manager, FAA Liaison, Boeing Customer Support Engineering

August 2000 – October 2002: Direct interface between FAA Aircraft Certification Office (ACO) and BCA Customer Support (CS) Engineering with the mission to continuously improve working relationships and mutual understanding. CS Representative at internal FAA review boards for Continued Operational Safety Program (COSP). Responsible for intervention and facilitation in emergent issues related to safety and airworthiness.

Manager, Quality, Boeing Global Airline Inventory Network (GAIN)

September 1999 – August 2000: Identify regulatory issues and develop viable options to enable the GAIN distributorship business plan by ensuring compliance with customers' contractual and regulatory requirements. The GAIN business model required a broad and versatile approach to the development of an innovative Quality philosophy to allow GAIN to operate as a non-regulated distributorship in a highly regulated global aviation environment, while protecting Boeing's FAA issued Production Certificate.

Senior Manager, BCA Quality Assurance (Group QA), Seattle, WA

January 1997 - June 1999: Leader of a group of Quality Assurance managers whose primary function is to maintain and protect the integrity of the FAA issued Boeing Production Certificate (PC) #700 and 13 Repair Station Certificates. (Note dual duties below)

May 1998 – September 1999: BCA Quality Program Manager for the Boeing transition to enhanced FAA Organizational Delegation. Significant interface with Boeing Quality and Engineering (Certification & Delivery) and FAA Engineering and Manufacturing Inspection offices. Quality representative to Airplane Creation Process Strategy (ACPS) and Product Strategy & Development (also known as Creation Center) teams – think tank for new products such as the 787.

Manager, Engine & Propeller Directorate Standards Staff, FAA, Aircraft Certification (ANE-110)

May 1991 - January 1997: Office manager for a group of senior FAA engineers with responsibility for writing and maintaining regulations, policy and standards for engine (FAR 33), propeller (FAR 35) and auxiliary power unit (APU) certification, production and continued airworthiness (FAR 21 and 39). Considerable contact with all levels of management in FAA and industry on issues related to aircraft and engine safety, certification, manufacturing, modifications, repairs, deliveries and Continued Airworthiness. Significant activities included;

- Regulatory requirements for engines, propellers and all related installation requirements including engine/propeller compatibility and airframe installation requirements.
- Assistant Executive Director, Aviation Rulemaking Advisory Committee, Transport Airplane and Engine Issues
- Principal FAR 33 negotiator for FAA regulatory harmonization with the Russian Aviation Register (AR), whose authority was transferred to the Federal Air Transport Agency (FATA) in 2016.
- Chair of FAA/JAA Regulatory Harmonization Management Team (HMT)
- Represent policy staff in engine and propeller safety boards to mandate Airworthiness Directives for all units manufactured in the United States. Chair board as necessary.

Manager, Denver Aircraft Certification Office (ACO), FAA

May 1988 - May 1991: Managed ACO with broad range of Engineering and Manufacturing responsibilities in the states of Colorado, Wyoming, Montana, Idaho, and Utah. Type design approval, manufacturing, continued airworthiness, flight tests and accident investigation responsibilities for all FAA approved products within our geographic region. Evaluation and approval of aircraft designs and production systems. Compliance and enforcement of rules, policies and regulations, including FAR 21, 23, 25, 27, 29, 33 and 39. Types of approvals include Type Certificates, Supplemental Type Certificates, Production Certificates, Parts Manufacturer Approvals, TSO, standard and special airworthiness certificate issuance. Evaluation of qualifications for FAA Designees such as DER, DAR, DMIR and DAS.

Aerospace Engineer, Modification Branch, Seattle ACO, FAA

March 1985 - May 1988: Approval of business and general aviation modifications. Issuance of Supplemental Type Certificates (STC) for one time application and commercial marketing. Individually responsible for all aspects of FAA approval including conformity inspections, testing and production. Responsibilities included structural, aerodynamic and operational modifications of airframes, engines, propellers and systems. Flight analyst for major modifications involving engine intercoolers, stability and control, engine & propeller installations in single and twin engine airplanes.

Flight Test Engineer, Boeing, Seattle WA

June 1980 - March 1985: Planning and execution of all aspects of community noise and large turbine engine installation testing for certification of Boeing model 757, 767 and 737-300 airplanes. Responsibilities included prototype installation and testing, conformity inspection, test planning, data collection and evaluation for original product development and FAA certification. Instrumental in developing Boeing noise test procedure still in use. In 1984, presented "Boeing Noise Testing, New Methods and Techniques" to AIAA and Society of Flight Test Engineers (SFTE), co-author: Bill M Glover, BCAG. President, Seattle Chapter SFTE 1984. Total flight time approximately 1000 hours.

EDUCATION & Other

- BS Aeronautical Engineering, Rensselaer Polytechnic Institute (RPI), Troy NY, 1980
- Team leader in design & construction of RP-1, 120 lb composite sailplane
- Private Pilot, 700 hrs accumulated. Owned three airplanes from 1981-1994
- USAF, C141 Aircraft Loadmaster, 1900 hrs accumulated 1970-74