

## John (Jack) Gregory Hessburg

*“For the unique contribution to the scientific understanding of the aviation maintenance process that is the building block of Mirce Mechanics”*



Jack Hessburg has more than 40 years of experience in aviation, both in air carrier maintenance and flight operations with both airlines and the Boeing Company. He has worked for the U.S. and foreign scheduled and non-scheduled airlines in a variety of assignments. These have included positions in aviation, such as Director of Maintenance Training, Director of Flight Crew training, maintenance instructor, and aircraft mechanical systems engineer. He taught in both the degree and mechanic programs at Park College, and during the 25 years at Boeing, he taught an after-work-hours course in air carrier maintenance and operation to employees. Jack is both a mechanical engineer and a licensed Airframe and Powerplant Mechanic.

He joined the Boeing Company in 1973 as flight operations engineer, supporting a number of United States, European, African and Middle East operators. In 1980, he joined Boeing Field Service, providing on-site maintenance and engineering support to such airlines as United, Air Cal, World, Trans America and Air Canada. Jack returned to a factory assignment in 1986 as 747/767 airline support manager.

In 1991 he was appointed Chief Mechanic for the Boeing Commercial Airplane Group and was the first person in aviation history to hold such a post. In this capacity he represented the interests of the entire maintenance community in the 777 airplane design. He brought the air carrier mechanic's and maintenance engineer's perspective to the design table, notably in the design of the 777 computer-based maintenance system. His main focus was to make the 777 the most maintenance-friendly airplanes in the world. With this objective in mind he fought

many battles with the Boeing designers on behalf of the airline maintainers, continuously stressing “*aircraft manufacturers are in airplane business while airlines are in transportation business*”.

Many of the maintenance improvements Hessburg suggested for the 777 have contributed to the success of that model, as well as other Boeing twinjets. In addition, the design standards and methodologies developed for the 777 are successfully used in subsequent Boeing designs.

One, of the numerous examples, was moving the recirculating fan motor from its original location. The initial design placed it in an overhead compartment and at arm's length from a mechanic, requiring the mechanic to stand on a ladder to reach it. When Hessburg realised that the motor weighed 20 pounds, he asked one of his 777 mechanics to stand on a ladder and hold a 20-pound barbell at arm's length. The mechanic nearly fell off the ladder, Hessburg said, proving the point that the motor needed to be relocated.

Since the first delivery of 777 to United Airlines in May 1995, more than 1000 have been delivered worldwide. The fleet regularly delivers schedule reliability rate of over 99% per cent, meaning that 99.percent of the time the airplane departs the gate within 15 minutes of its scheduled departure. This high rate is one indicator of how well the 777 performs and how it requires little or no unscheduled maintenance between flights.

His efforts on behalf of maintenance features in the 777 design have been praised by airline customers and, in 1994, won him the Joe Chase Award from the Flight Safety Foundation and the Professional Aviation Maintenance Association. He was a recipient of the 1995 Commercial Aviation Engineering/ Technical Achievement award from the American Institute of Aeronautics and Astronautics. In 1997 Jack received an Industrial Fellowship from the University of Exeter for his contributions to the field of systems maintainability. In 1999, he received the Lifetime Achievement Award in Aviation MRO from Over-haul & Maintenance magazine and an Honorary Doctor of Science from the College of Aeronautics.

Jack retired in January 1999. He continues to be active in aviation as a consultant, writer and teacher.

On 26<sup>th</sup> May 1999 Jack Hessburg officially opened the MIRCE Akademy and regularly participated in numerous activities organised and run by the Akademy, world wide. In 2002 he was awarded Honorary Doctoral Diploma from the MIRCE Akademy

On 24<sup>th</sup> July Dr Knezevic, the founder and president of the MIRCE Akademy presented the Grand Fellowship Award to Jack Hessburg at the Seattle Medical Post Acute Care, where he was recovering after surviving a stroke earlier this year.

Jack Hessburg passed away on 12<sup>th</sup> August 2013, leaving behind the immortal sentence regarding the maintenance philosophy of the Chief Mechanics for New Airplanes:

***“All that I want to do is to go to Cleveland and never crash.”***