



Harold Andrews

"Hal"

Dates of Navy Active Duty:

1944-46 U. S. Navy.
 1946-54 U. S. Navy Reserve.
 1950-51 Active Duty, Aviation Electronics Technician.

Professional Experience:

1948-50 Draftsman/ Jr. Engineer, Boeing Aircraft Company
 1955-61 Stability & Control Engineer, BUAER.
 1961-66 Assistant Head, Stability & Control Section, Airframe Division, BUAER.
 1966-71 Head, Stability & Control Section, Airframe Division, BUAER.
 1971-7 Head, Aerodynamics & Hydrodynamics Branch, Airframe Division, NAVAIR.
 1973-77 Technical Director, Airframe Division, NAVAIR.
 1977-80 Director, Advanced Aircraft Development Office, NAVAIR.
 1980-84 Associate Technical Director, Research & Technology, NAVAIR.
 1984-86 Technical Director, Research & Technology, NAVAIR.
 1987 Independent consultant with several part-time agreements involving work for the Navy, FAA and DARPA in advanced aeronautical systems and their technologies.

Significant Career Events

- (1) The distinction of being the only NAVAIR Civilian Engineer to "depart" the F8U Crusader in flight. The TF-8 at Dallas with Chance Vought test pilot Stuart Madison in 1967.
- (2) Co-Manager, IAS/AIAA Project 60: Construction of Reproduction 1903 Wright Flyer for Visitors Center at Kitty Hawk, NC.



Technical Publications:

- 1952 Co-author: "Evaluation & Analysis of the Soviet IL-10 Aircraft" and Evaluation & Analysis of the Soviet MIG-15 Aircraft", Cornell Aeronautical Laboratory.
- 1954 Author: "Lateral Forces & Moment Characteristics of Pneumatic Tires", Cornell Aeronautical Laboratory.
- 1963 Author: Various aviation sections, "The Harper Encyclopedia of Science", Harper & Row, 1963.
- 1964 Author: "The Case for Flying Qualities Standards", IAS General Aviation Meeting, Wichita, Kansas.
- 1966 Co-author: "Human Dynamics & Aircraft Flying Qualities", AGARD, Paris, France.
- 1971 Author: "Stall/Spin - A NAVAIR View", Stall/ Post Stall/Spin Symposium, Wright-Patterson AFB, OH.
- 1972 Co-author: "Highly Maneuverable Fighter Aircraft Technology", Joint DoD/NASA Aeronautical Research & Development Study, Aeronautics Panel, AACB.
- 1978 Co-author: "Technical Evaluation Report of the Multi-Panel Symposium on Fighter Aircraft Design", AGARD Report AR-119.
- 1989-90 Author: Frequent talks on technology, advanced aircraft and VSTOL aircraft at professional society meetings. Typically, Co-author, "Application of Synthesized Tactics to the Design & Evaluation of VTOL, VSTOL, and STOVL Aircraft", AIAA/AHS/ASEE Aircraft Design at Operations Meeting, August, 1989. Co-author, "The North American Rockwell FV-12A - Reflections and Some Lessons", AIAA/ AHS/ ASEE Design, Systems & Operations Meeting, 1990.

Historical Publications

- 1966 Author: "The Curtis SB2C-1 Helldiver" and "The Grumman F8F-1 Bearcat", historical monographs covering design, development and operation of these aircraft, Profile Publications, Leatherhead, England.

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Historical Publications continued

1957-06 Author: Various articles similar to above on specific aircraft, or on aircraft generally, in Naval Aviation News, Aeroplane Monthly, Air Enthusiast, Wings, Airpower, Wings of Gold, and Skyways. Most recently, "Fame - Sort of. The Northrop and Vought Fighters of the 1930s", Skyways October 1998 and April 1999, and "Beyond the Scenes of New Technology", Naval Aviation News", Nov.- Dec. 1999.

Biographical Data

Born: Ithaca, NY, December 27, 1924

1948 BS degree, Mechanical Engineering, Cornell University.

1953-55 Cornell Graduate School, Aeronautical Engineering.

1968-98 Course coordinator and lecturer, Overview Aircraft Design and Development, University of Virginia for the Naval Air Systems Command.

1987-91 Member, National Advisory Committee, University of Tennessee Space Institute Tullahoma, TN.

1995-Pres Lecture, VSTOL Programs-Some Lessons in UTSI/AIA VSTOL Committee Short Course

2006 Elected Fellow, American Institute of Aeronautics and Astronautics