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David B. Thurston  
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U.S.A.

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Telephone and Fax

Born: 20 September 1918  
Mineola, L.I., New York

Married with three  
grown children



#### SUMMARY

With a background covering 63 years of intensive design and manufacturing experience in the aircraft industry, David B. Thurston has been responsible for the development of twenty new aircraft as well as the organization of five corporations. These companies were engaged in sheet metal fabrication and R&D programs of an aircraft nature, with business obtained from industry and the Department of Defense under highly competitive negotiation and contract bid procedures.

As a result of this experience, Mr. Thurston has become thoroughly familiar with the techniques of engineering and manufacturing to FAA and DOD specifications and quality requirements; capitalization and financing programs peculiar to the founding and expansion of growth operations (including full disclosure and Reg "A" equity offerings); and the many shop and personnel problems usually associated with new and growth situations.

#### I. Education

- (1) Graduated from Concordia Collegiate Institute, Bronxville, New York, June 1936
- (2) Graduated from the Guggenheim School of Aeronautics, College of Engineering, New York University, June 1940, with the degree of Bachelor of Aeronautical Engineering. Elected to Tau Beta Pi and Iota Alpha, national honorary societies. Received the Chance Vought Design Award for the senior year aircraft design project.

#### II. Employment

1. Brewster Aeronautical Corporation, Long Island City, New York; May 1940 to May 1942. (a) Design engineer and detailer, (b) shop liaison engineer, (c) an assistant to the project engineer for the "Buffalo" export fighter, (d) preliminary design engineer. Left this company because of union/management problems which created a very unfavorable working environment.

2. Grumman Aircraft Engineering Corporation, Bethpage, New York; May 1942 to January 1955. (a) Production and manufacturing engineering related to placing the F6F "Hellcat" fighter into quantity production, (b) the late war development of three RPV type aircraft directly under Mr. Grumman's supervision, (c) design

group leader for the F9F "Panther Jet" fighter, (d) in charge of Rigel guided missile design, test, and production from December 1947 through June 1953, (e) project supervisor for all development and test work (aerodynamic, static, and flight) for the F11F Tigercat fighter through June 1954, (f) in charge of the design and development of propeller driven aircraft at time of resignation in January 1955. At this time, Thurston was a member of a staff responsible for the operation of 1500 man engineering department; negotiated contracts with military personnel; and had been responsible for the supervision and expenditure of up to \$10,000,000 of military effort per year.

3. Colonial Aircraft Corporation, Sanford, Maine: President, January 1955 to January 1961. This company was organized to develop and market an executive type airplane, the SKIMMER Amphibian, \* designed by Thurston - as well as to undertake DOD development and production contracts. During 1958, total employment reached 275, with a 3% net operating profit. The SKIMMER program was sold during 1959 due to a decrease in General Aviation activity. The company was in profitable operation when Thurston sold his interest and resigned to form - (\* now the LAKE amphibian)

4. Thurston Erlandsen Corporation, Sanford, Maine (trade name TEC); President from the founding in March 1961 through April 1966. This company was established to provide a qualified engineering and manufacturing source for: (a) advanced research programs in the field of hydrodynamic development and (b) lightweight structures related to the aircraft, space vehicle, and electronics equipment fields. TEC successfully performed a number of basic hydro-ski development and flight test evaluation programs for the Bureau of Naval Weapons as well as completing a number of technically advanced manufacturing contracts for government and industry. Financial interest in this company was sold in 1966 to obtain capital to develop commercial sport aircraft to be produced by -

5. Thurston Aircraft Corporation, Sanford, Maine; President from July 1966 to November 1971. Founded originally to develop small amphibian aircraft and to perform continuing NASC R&D programs leading to development of the hydrofoil seaplane. Thurston designed the proprietary two/three place TEAL Amphibian, which received FAA Type Design approval during September 1969; nineteen aircraft were produced and delivered before operations were terminated during 1971 when stock market conditions precluded adequate financing. The TEAL program was sold to Schweizer Aircraft in December 1971.

6. 1/72-6/76; engineering Manager of Schweizer Aircraft Corp., Elmira, New York. Duties included engineering and production of the Grumman AG CAT program, certification work and static tests of the 1-35 high performance sailplane and coordination of seven active TC'd production aircraft.

7. 6/76 to present; President, Thurston Aeromarine Corporation, aircraft design consultants with active programs involving certification of one design and development of two other aircraft. Expert witness and consultant for aircraft accident and litigation in the fields of aircraft design, construction, operation and piloting, and aircraft crash reconstruction.

8. 1/80 thru 9/92: Director and Engineering Vice President of the International Aeromarine Corporation, Sanford, Florida. This company was organized to develop, obtain FAA certification, and produce the Model TA16 four-place "SEAFIRE" Amphibian airplane. The prototype was completed and successfully flown during December 1982. Required FAA Type Design Certification static tests and detail design are substantially completed. Production financing is being arranged.

9. FAA Designated Engineering Representative (DER) approved for static test work, Airframe Structural Design, Powerplant Installation, and Systems and Equipment Installation for CAR Parts 3, 4a&b, 8; FAR Part 23, 25, 27, and 29 (no flutter or vibration analysis). DERT-810069-N

10. Licensed private pilot since 1946 with single engine land, water, and instrument ratings

11. Director of Engineering for Aerodis America, Inc., Spring, TX. from 3/88 thru 8/91 on a consultant basis.

III. Activities: Associate Fellow - American Institute of Aeronautics and Astronautics through 2001.  
Member of Aircraft Owners and Pilots Association, Seaplane Pilots Association, and Experimental Aircraft Association. Former member of Aviation/Space Writers Association.

Consultant to small manufacturing companies in engineering and management.

Formerly instructed in aircraft structural design for New York University extension program.

Have served on school board, Chamber of Commerce Board of Directors, church vestries, and as college trustee.

Past member of: Northport Yacht Club, L.I., N.Y.; Portland YC, Portland, Maine; Essex, Pettipaug, and Frostbite Yacht Clubs, Essex, CT.; Presently a member of Northport Yacht Club, Northport, Maine.

Skiing - downhill and cross country.

USC course on Legal Aspects of Aviation Safety

Volunteer engineering consultant, trustee, and committee member of Owls Head Transportation Museum, Owls Head, Maine. This is considered to be one of the world's finest aviation museums, having flying replicas as well as original 1910 to 1930 aircraft on display.

Active member of local Lions Club.

IV. Published work

Texts: 1. The Manual For the President of a Growing Company; by Prentice-Hall, 1962. A business book concerned with the organizational, financial, administrative, and growth problems of small companies.

REED'S CAROL D. OSBORN  
AWARDED - COLLEGE TO  
PULITZER PRIZE FOR  
AVIATION WRITING  
ALSO AWA AWARDED

2. Design for Flying; published by McGraw-Hill in May 1978.  
Describes why aircraft must fly as they do, what makes them fly that way, and how to design them to fly that way.
3. Design for Safety; published by McGraw-Hill in 1980.  
Analyzes aircraft accidents with the purpose of indicating design and operational features which cause pilot error - and how to eliminate them by design.
4. Homebuilt Aircraft; published by McGraw-Hill during August 1981 (publication dated 1982). This book covers the homebuilt aircraft movement in detail, including drawings and design data for over 100 aircraft as well as providing suggestions for construction and safe flying procedures.
5. Consulting editor for McGraw-Hill's series of technical aviation books through 1990.
6. The World's Most Significant and Magnificent Aircraft, SAE Design Articles and Papers; August 2000

Key Considerations in Pressurized Cabin Design;  
Aviation Magazine, April 1944

Estimating Plane Performance - via Comparison  
Method; Aviation Magazine, September 1946

Amphibian Hydrofoil Performance;  
Vertical World, March-April 1969

Water Wings; Sport Aviation Magazine (Journal of  
the Experimental Aircraft Association), Jan. 1969

Contributing technical editor for Aero Magazine -  
articles concerning design details and flight  
characteristics developed from the earliest  
aircraft configurations.

Hydrofoil Seaplane Design; a detail design handbook  
prepared for the Naval Air Systems Command, May 1970

Amphibian Aircraft Design; a technical paper  
presented before the SAE National Business Aircraft  
Meeting, Wichita, Kansas, April 2-4, 1974.

FLIGHT TRENDS; a 10 part series re general aviation -  
published in Private Pilot magazine Dec 84-Sept 85.  
Received Aviation/Space Writers Award April 1986.

Technical design articles and lectures.

Major Aircraft Projects by David B. Thurston

1. Model G-63, G-65, and G-72 aircraft designed by Thurston as project engineer working for Mr. Roy Grumman. Aircraft carried through flight test but subsequently dropped at Navy request.
2. Forward fuselage and tail support structure for F9F-2 Grumman "Panther" jet fighter.
3. Project manager for the design, construction, and firing test evaluation of the Grumman "Rigel" supersonic ram-jet cruise missile successfully developed during 1947-53.
4. Project engineer Grumman F11F "Tiger" supersonic fighter.
- \* 5. Design, develop, and FAA certify Colonial Aircraft Model C-1 "Skimmer" Amphibian airplane.
- \* 6. Design, develop, and FAA certify Colonial Aircraft Model C-2 "Skimmer IV" Amphibian airplane.
7. Develop Hydroski and hydrofoil equipped aircraft design parameters and operating procedures under U.S. Navy contracts. Wrote hydrofoil seaplane design manual for navy use.
- \* 8. Design, develop, and FAA certify Thurston Aircraft Models TSC-1A and -1A1 "TEAL" Amphibian airplanes..
- \* 9. Design, develop, and FAA certify Schweizer Aircraft (Thurston) Model TSC-1A2 "TEAL II" Amphibian airplane.
- \* 10. Coordinate FAA certification of the Schweizer Model G164B "AgCat" crop duster.
- \* 11. Coordinate FAA certification for the Schweizer Model 1-35 high-performance sailplane.
12. Configuration design, applied loads, and homebuilder detail drawings for the "Sequoia 300" high-performance turbocharged landplane (300 mph at altitude; first plane flown 4/26/92).
- \* 13. FAA certification of the Schweizer "TurboCat" Modification.
- \* 14. Configuration design, applied loads, and detail drawings for Thurston Aeromarine Corporation Model TA16 "SEAFIRE" four-place amphibian airplane being FAA certified.
15. Configuration design, applied loads, and detail design for Aerodis America Model AA200 "ORION" four-place, pusher, composite landplane. Successfully flown 8 April '91.
16. Supervised the detail design and construction of a successful flying replica of the Curtiss 1908 "June Bug" for the Glenn H. Curtiss Museum, Hammondsport, N.Y. (1973-76); the Etrich "TAUBE" 1913 monoplane (1978-1990), and, currently, a 1910 Farman biplane replica (1990-95) for the Owls Head Transportation Museum, Owls Head, Maine

\*FAA Type Design Certification (TC) programs.

*David B. Thurston*