

## BIBLIOGRAPHY (Curr.Vitae)

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**NAME:** HENRY E. PAYNE III

**POSITION:** President, Payne Engineering Company, Inc.

**EDUCATION:** B.S. Mech. Eng. - Yale University 1957  
M.S. Aero-Eng. - Princeton University 1959  
Dr. Sc. Elec-Eng.- W.Va. Inst. of Technology 1986 - Hon.

**PROFESSIONAL BACKGROUND\*:**

- 1957 – 1961** Research Associate at Princeton's Forrestal Research Center.  
Responsible for basic and applied low-speed aerodynamics including:
- a) design and tests of tilt-wing VTOL transport.
  - b) design and test of airship flying wind-tunnel.
  - c) design of low-speed fans and propellers.
- 1959 – 1966** President/Chief Engineer of Payne Engineering Company.  
Responsible for conception and initial production of solid-state power control product line.
- 1966 – Present** President of Payne Engineering Company.  
Manufacturer of solid-state motor and power controls, sold through agents and distributors around the world. Typical products are:
- a) Model 11 series solid-state AC and DC contactors and motor starters.
  - b) Model 18 series solid-state AC variable voltage power controls and motor controls.
  - c) Model 47 series temperature controls.
  - d) Model 67 series AC power computer.
  - e) Model 31 series propeller/fan blades.
- 1966 – Present** Tomorrow's World monthly column, describing the impact of aerospace and energy technology on the world around us, published in West Virginia's Charleston Gazette and the State Journal.

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\*See attached for list of professional publications.

**PUBLICATIONS**  
**by: Henry E. Payne III**

Propeller Effects on the Stability and Control of VTOL Aircraft.  
AERO/SPACE ENGINEERING, March 1960.

A Stability Analysis of Tilt-Wing Aircraft.  
PRINCETON AERO REPORT #477 (Analytical) May 1960.  
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A Preliminary Evaluation of the Use of an Airship as a Test Vehicle for VTOL/STOL Aircraft Models.  
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Drag Investigation of Bodies of Revolution with Shrouds.  
(Proprietary for Electric Boat Division of General Dynamics)  
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Smoke Flow Visualization of SSN 585 Skipjack.  
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AERO/SPACE ENGINEERING. March 1961. (Cover story, February).

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Flight Comparison Analysis.  
PAYNE ENGINEERING REPORT #7, January 1961.  
(Proprietary for Curtiss-Wright Propeller Div.)

Helicopter-V/STOL Experimental Test Methods.  
IAS Paper #62-15, 30th Annual Meeting of the INSTITUTE of AEROSPACE SCIENCES.  
New York City, January 1962.

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PAYNE ENGINEERING REPORT #15, January 1962.  
UNDERSEA TECHNOLOGY March/April 1962, Vol. 3, No. 2.

A Feasibility Study of an Airborne Underwater Weapon System.  
PAYNE ENGINEERING REPORT #30, February 1963.

Semiconductor Fusing.  
PAYNE ENGINEERING REPORT #49, January 1968.

Propeller Design for Duffers Associates ACV (Liebeck Airfoil)  
PAYNE ENGINEERING REPORT #31D, November 1970.

Power Optimization Program.  
(Field excitation, capacitor switching and demand control)  
PAYNE ENGINEERING REPORT #62, December 1974.

Electric Heating of Bridge Decks and Roadways.  
PAYNE ENGINEERING REPORT #64, June 1975.

## Publications (contd.)

Laminar Flow Rethink - Using Composite Structure.

SOCIETY of AUTOMOTIVE ENGINEERS, SAE #760473, April 1976.

Design & Economical Protection of Thyristor AC Motor Starters from 5 KW to 1000 KW.

POWER CONVERSION INTERNATIONAL, July/August 1980.

Power Integrated Circuits: Know the Limitations.

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Submarine Maneuvering Instability.

SUBMARINE REVIEW, January 1988.

Want to Study About Modern Submarine Design?

SUBMARINE REVIEW, October 1988.

Why Do Our Attack Subs Try to Fly With Only 1/2 Wing? PART I.

SUBMARINE REVIEW, January 1989.

Why Do Our Attack Subs Try to Fly With Only 1/2 Wing? PART II.

SUBMARINE REVIEW, April 1989.

An Airborne Undersea Weapon System.

SUBMARINE REVIEW, October 1989.

Magic Black Boxes:----,

POWER QUALITY Philadelphia Conf.Proceedings, Oct. 1990.

Submarine Maneuver Control.

NAVAL INSTITUTE PROCEEDINGS, July 1992 pp.56-60.

The ALBACORE: Back to the Future,

NAVAL INSTITUTE PROCEEDINGS, April 1993 pp.105-107

The ALBACORE Advantage,

NAVAL INSTITUTE PROCEEDINGS, July 1993 pp.59-62.

Transformer Considerations w/Thyristor Controls.

PAYNE ENGINEERING, AN 11-18, June 1994

Journalist Energy Training Seminar

PAYNE ENGINEERING CO , Scott Depot, WV, June 2004

History of Electricity Seminar

PAYNE ENGINEERING CO , Scott Depot, WV, June 2005

The SILICON Revolution.

CONTROLS and SENSORS Conference, Cleveland, OH, May 1-2, 2007

May 2007