

# GREGORY T. DAVIS SENIOR MANAGING CONSULTANT

gtdavis@esi-il.com

Mr. Davis is a Senior Managing Consultant with Engineering Systems Inc. (ESI) working in the Marine Practice Group. Mr. Davis has joined ESI with 35 years' experience as a professional marine surveyor and investigator, as the founder and President of Davis and Company, the nation's leading marine survey and loss investigation firm. He is also an internationally recognized expert in marine forensics and marine survey. His subsidiary and full service marine consulting firm, Davis Consulting Group, has joined with ESI, to offer professional services to a wide variety of clients, for investigations related to marine losses that range from recreational and commercial watercraft design and loss evaluations to marina operations.

A Fellow of the American College of Forensic Examiners, Mr. Davis is also a Certified Fire and Explosion Investigator by the National Association of Fire Investigators, and a Certified Marine Surveyor by the National Association of Marine Surveyors, Inc.

He is a member of the Society of Naval Architects and Marine Engineers (SNAME), serving on their O-45 Fire Protection and Safety Panel, the American Boat and Yacht Council (ABYC), having served on their Board of Directors and currently on the Technical Board, the National Fire Protection Association (NFPA), permanent member of the "NFPA 303 Marinas and Boatyards" fire safety standard committee, the International Association of Arson Investigators (IAAI), and other professional organizations.

Mr. Davis has authored numerous articles on marine surveying that have been published in leading trade journals. He speaks frequently at boating and marine industry conferences, and has called upon to provide expert testimony at legal proceedings.

#### **Areas of Specialization**

Marine Forensics and Survey Marine Research and Failure Analysis Safety Assessments and Risk Analysis Fire and Explosion Origin and Cause

### **Education**

B.A. College of Santa Fe, Santa Fe, New Mexico, 1973

### **Certifications**

Certified Fire and Explosion Investigator, NAFI (No. 4152-738) Certified Marine Surveyor, NAMS (No. 113-264)

November 2012

Phone: (630) 851-4566 **F**ax: (630) 851-4870

## **Professional Certifications/Affiliations**

The American Board of Forensic Examiners

Board Certified Forensic Examiner, October 1994 Fellow, American College of Forensic Examiners Listed in the National Registry of Forensic Examiners Specialty: Marine Accident Reconstruction, Marine Fire Cause and Origin

The American Boat and Yacht Council

Board of Directors, 1999-2005 Technical Board, 2007- present ABYC Standards Certification

The American Society for Non-Destructive Testing

The Boat U.S. Speakers Bureau

The International Association of Arson Investigators

<u>The National Association of Fire Investigators</u> Certified Fire and Explosion Investigator, August 1993

The International Association of Marine Investigators

The National Association of Marine Surveyors

Certified Marine Surveyor, September 1978 Chair, Education Committee, 2006-2008 Chair, Yachts and Small Craft Technical Committee, 2000-2008 Co-Chair, 41st Annual National Meeting Committee, 2003

The Society of Naval Architects and Marine Engineers (SNAME)

Technical panel member, O-45: Life Safety and Fire Protection

The National Fire Protection Association

Permanent Member, NFPA 303: <u>Marinas and Boatyards</u> Marine Task force (industry Rep)-Marine Chapter, NFPA 921: <u>Fire and</u> <u>Explosion Guide</u>

<u>The National Marine Manufacturers Association</u> Member, Boating Industry Risk Management Council, 1990-2011



## Public/Private Sector Committee Service

Chair, Education Committee, The National Association of Marine Surveyors, Inc. Chesapeake, Virginia, 2006-2008

Chair, Yachts and Small Craft Technical Committee, The National Association of Marine Surveyors, Inc., Chesapeake, Virginia, 2000-2008

Chair, Communication Committee, The National Association of Marine Surveyors, Inc., Chesapeake, Virginia, 2002

Board of Directors, the American Boat and Yacht Council, Edgewater, Maryland, 1998-2005

Technical Board, the American Boat and Yacht Council, Annapolis, Maryland, 2007-present

Technical panel member, O-45 Life Safety and Fire Prevention, The Society of Naval Architects and Marine Engineers, 1977-present

Permanent panel member, NFPA 303 - Marinas and Boatyards, The National Fire Protection Association

Marine Task force, NFPA 921- Fire and Explosion Investigation Guide, at the request of ABYC and NMMA participated as the industry representative to the committee panel charged with authoring the Marine Chapter of the guide

Special panel member, Yacht Survey Report Standards Committee, The Society of Accredited Marine Surveyors, 1997

Member, Boating Industry Risk Management Council, National Marine Manufacturers Association, 1990-2011

Chairman, Insurance Committee, National Association of Marine Surveyors, Inc., 1982-1995

Member, UL Marine ad hoc Committee on Marine Fuel Hose (at the request of UL Marine), 1986



# **Awards and Recognition**

Who's Who in America, Marquis Publications

Who's Who in Science and Engineering, Marquis Publications

Who's Who in the World, Marquis Publications

Who's Who in the Midwest, Marquis Publications

Certificate of Appreciation, Speaker, National Association of Marine Surveyors, Inc., 1997

Award, Speaker, International Association of Marine Investigators, 1997

<u>Certificate of Appreciation</u>, United States Power Squadron, Mid-Illini Squadron, Bloomington, Illinois, Certificate of Appreciation, Service, 1996

Men of Achievement, 16th ed., International Biographical Centre, Cambridge, England, 1995

<u>Certificate of Appreciation, Service</u>, Tech Cor., Allstate Insurance Co. National Training Center, 1992

Certificate of Appreciation, Service, National Association of Marine Surveyors, Inc., 1991

<u>Certificate of Appreciation, Service</u>, United States Power Squadron, Calumet Squadron, Calumet, Illinois, 1990

# **Research Grants**

USCG/ABYC: Swamping, Capsizing, and Sinking of Small Boats - completed April 2012

NFPA Research Foundation: "Marina & Boatyard Indoor Rack Storage Sprinkler Protection," a data analysis co-authored with Dan O'Connor, AON Schirmer Engineering

### **Professional Development/Continuing Education**

Professional Course Work and Seminars:

<u>"Docks and Marinas"</u> University of Wisconsin, Madison; Department of Engineering, Professional Development, 2011

<u>"Fort Lauderdale Mariners Club"</u> annual marine insurance seminar, Fort Lauderdale, Florida, 2011

<u>"Fort Lauderdale Mariners Club"</u> annual marine insurance seminar, Fort Lauderdale, Florida, 2010



# **Professional Development/Continuing Education** (continued)

"Dry Stack Conference" International Marina Institute, Fort Lauderdale, Florida, 2010

"International Symposium on Fire Investigation Science and Technology (ISFI)", University of Maryland, 2010

<u>"Marine Accident Investigation</u>" (MS101), National Transportation Safety Board (NTSB) NTSB Academy, Washington, DC, 2009

"International Symposium on Fire Investigation Science and Technology (ISFI)", University of Cincinnati, 2008

"ABYC Standards Accreditation," American Boat and Yacht Council, Inc., 2007

<u>"London Surveying Conference"</u>, International Institute of Marine Surveying; Institute of Marine Engineering and Science Technology; National Association of Marine Surveyors, joint conference, London, England, 2005

<u>"National Seminar on Fire Analysis Litigation"</u>, National Association of Fire Investigators, Inc., 2003

"ABYC Standards Accreditation," American Boat and Yacht Council, Inc., 2002

Advanced Arson Seminar, "Reading the Fingerprint of Fire," MABAS Division 10 and Illinois Chapter, International Association of Arson Investigators, 1995

Accidents: From the Scene to the Trial, Sponsored by the American Boat and Yacht Council, 1994

Advanced Arson Investigation Course, Sponsored by MABAS Division 10 and Illinois Chapter, International Association of Arson Investigators, 1994

<u>Determining the Cause and Origin of Fires and Explosions Training Seminar</u>, Sponsored by National Fire Protection Association, and National Association of Fire Investigators, 1993

Advanced Fire Investigation Seminar, Sponsored by MABAS Division 10 and Illinois Chapter, International Association of Arson Investigators, 1992

Atlantic Marine Surveyors-Blistering and Laminate Failures in Fiberglass Boat Hulls, 1988

American Boat and Yacht Council-DC Electrical Systems in Boats, 1990

Corrosion Seminar, The Nickel Institute, 1989



# **Positions Held**

Engineering Systems Inc., Aurora, Illinois Senior Managing Consultant, 2012 – present

Davis Consulting Group, Lisle, Illinois Principal Forensic Consultant, 1995 – 2012

Davis & Company, Ltd., Lisle, Illinois President and Founder, 1977 – present

#### **Publications**

- "Capsizing, Swamping and Sinking of Small Boats," by Richard H. Akers, NA, PE, Gregory T. Davis and John D. Flaig, MSME. USCG, Office of Boating Safety: Grant 1902.05, 4/19/2012
- "Marina and Boatyard Indoor Rack Storage Sprinkler Protection," Co-Author (DCG) with Schirmer Engineering, research project report completed for the National Fire Protection Association Research Foundation
- Mr. Davis has authored articles for the following technical journals:

*Proceedings*: 4th International Marine Applications of Composite Materials Conference NAMS NEWS

Technical Information Exchange for Marine Professionals

Composites Fabrication, Composites Fabrication Association Magazine

Proceedings: 6th International Marine Applications of Composites Materials Conference

*Proceedings*: 7th International Marine Application of Composite Materials Conference *ABYC NEWS* 

The Business of Pleasure Boats, National Marine Bankers Association newsletter

Investigator, International Association of Special Investigation Units (IASIU) Michigan Chapter magazine, Vol. 4 Issue 2, May 2004

#### **Technical Presentations**

*Why do welds fail, Session #407,* Co-Presenter with Mark Hineman, P.E., Engineering Systems Inc., and Roberto Scalvini, Marine Survey Bureau, International Boat Builders Exposition and Conference (IBEX), October, 2012,



*Recreational Boating Collision Accident Reconstruction*, SNAME International Marine Forensics Symposium, April 2012

*Understanding Fire Risks of Marina Dry Storage Facilities*, Co-Presenter, International Marina Institute Dry Stack Conference, Fort Lauderdale, Florida, October 2010

*Understanding Marina Dry Storage Facilities*, Co-Presenter, National Fire Protection Association Annual Conference, Chicago, Illinois, June 2009

*How Boats Get Broken, a Review of the 'Davis' Relational Database*, Boating Industry Risk Management Council, National Marine Manufacturers Association, Miami International Boat Show, Miami, Florida, February 2009

*Beyond the Bard, a Look at Alternate Accident Databases*, Panelist USCG Accident Mitigation meeting, Miami International Boat Show, Miami, Florida, February 2009

*The Condition and Value Survey*, National City Bank Recreation Finance Service Company Symposia, Chicago, Illinois, July 2005

*Boat Owner Losses* PLRB (Property Loss Research Bureau) Claims Conference and Insurance Services Expo 2005, San Antonio, Texas, April 2005

Marine Surveyors- Investigators or Not, International Association of Arson Investigators, 55th Annual Meeting & Conference, St. Louis, Missouri, April 2004

*Boa Owner Losses,* Property Loss Research Bureau 2004 Claims Conference & Insurance Expo, Chicago, Illinois, March 2003

*Origin and Cause- Appraisals on Boat Losses,* Speaker at the National Association of Subrogation Professionals annual conference, Reno, Nevada, November 2003

*Non-Destructive Evaluation (NDE) for Surveyors,* panelist at IBEX (International Boat Builder Exposition and Conference), Miami Beach, Florida, October 2003

Alternate Dispute Resolution, panelist at IBEX (International Boat Builder Exposition and Conference), Miami Beach, Florida, October 2003

Evidence Collection- Spoliation and Other Issues- How Does ASTM Deal With This Experts Quagmire?, NAMS 41 Annual National Marine Conference East, Chicago, Illinois, April 2003

*Boat Owner Losses.* Property Loss Research Bureau 2003 Claims conference & Insurance Expo, Orlando, Florida, April 2003

Boat Fire Investigation, Wisconsin Arson Claims Council, Greenfield, Wisconsin, May 2002



## **Technical Presentations** (continued)

*The Electricity Challenged Boatyard,* International Boatbuilders Exhibition and Conference (IBEX), Ft. Lauderdale, Florida, February 2002

*Marine Accident Investigation*, Instructor, The American Boat and Yacht Council, Inc., Accident Investigation Seminar: Ft. Lauderdale, Florida, April 1998; Long Beach, California, October 1998; Annapolis, Maryland, March 1999; Chicago, Illinois, October 1999; Seattle, Washington December 2000

*Establishing a Good Working Relationship With a Marine Surveyor*, The American Boat Builders and Repairers Association, Providence, Rhode Island, September 1998

*Plastic Bag Overheat Syndrome*, Marine Applications of Composite Materials 7th International Conference, Melbourne, Florida, March 1998

*Outdrive Failure Diagnosis*, and *FRP Repair Estimating*, The Society of Accredited Marine Surveyors 4th Annual Pacific Region Conference, Vancouver, British Columbia, Canada, April 1997

*The Internet as an Advertising and Business Communication Tool,* The National Association of Marine Surveyors 35th Annual Conference, New Orleans, Louisiana, March 1997

*Marine Accident Reconstruction*, The International Association of Marine Investigators, Annual training seminar, St. Louis, Missouri, March 1997

*Risk Exposures of a Marine Surveyor and How to Insure Against Them*, The National Association of Marine Surveyors 34th Annual Conference, Houston, Texas, April 1996

*Marine Fire Cause and Origin Investigation*, TechCor (the educational division of Allstate Insurance Co., Special Investigations Unit) advanced training class, Wheeling, Illinois, April 1996; returning lecturer since 1989

In-Service Failures from the Marine Surveyor's Point of View, Marine Applications of Composites Materials 6th International Conference, Cocoa Beach, Florida, March 1996

*Marine Surveying*, United States Power Squadron, Mid-Illini Squadron, Bloomington, Illinois, January 1996

Advanced Boating Course, State Farm Insurance Illinois Office, Bloomington, Illinois, course agenda and presentation responsibilities, Chicago, Illinois, January 1996

*Lenders and Marine Surveys: Assessing Your Collateral*, panelist representing NAMS, National Marine Bankers Association, member conference, Chicago, Illinois, October 1994



## **Technical Presentations** (continued)

Boat Damage, is it Preventable?, USPS District 20 Annual Meeting, 'N' club, Deerfield, Illinois, March 1994

Marine Survey, Safety First, USPS Chicago Squadron, Wilmette Harbor, Evanston, Illinois, March 1994

Boat Damage, is it Preventable?, MORF, Burnham Harbor, Chicago, Illinois, February 1994

*Boat Fires, Accidental and Arson*, Multiple Automatic Box Alarm System (MABAS), Division 10, Advanced Fire Investigation Seminar (sanctioned by the Illinois chapter of the International Association of Arson Investigators), Darien, Illinois, November 1992

Investigating Marine Claims, Rural Insurance Company, Annual Claims Seminar, Fon du Lac, Wisconsin, June 1992

*In-Service Failures, From the Marine Surveyor's Point of View*, The Fourth International Marine Applications of Composite Materials Conference, Florida Institute of Technology, Melbourne, Florida, March 1992

Interpreting Marine Surveys - Who, What, When, Where, Why and How, American Marine Underwriting Managers, Conference on Marine Underwriting, Milwaukee, Wisconsin, February 1992

Small Boats and Their Power Systems, An Overview, Milwaukee Insurance Company, Milwaukee, Wisconsin, September 1991

*The Small Craft Condition and Value Survey*, Small Craft Underwriting Seminar, Kemper Insurance Company, Miami, Florida, February 1990

*Marine Surveying, What is it About?*, The United States Power Squadron, District 20 annual conference, Schaumburg, Illinois, January 1990

*Coal-Ocean/Inland Waterways Transit Problems*, The Chicago Ocean Marine Underwriters Association, Chicago, Illinois, April 1982

A Look into the Handling of Inland Transportation Claims, Western Loss Association, Chicago, Illinois, March 1982

Basic Considerations in the Adjustment of Damage Losses on Fiberglass Reinforced Plastic Boats, State Farm Insurance Companies, Adjusters Seminar, Chicago, Illinois, June 1978

