

## **Eric John Rosencrantz (1945-2016) by Paul Mann and the Manchester Journal.**

Eric Rosencrantz passed away on April 16, 2016, at his home in Chester, Vermont. Eric was born April 17, 1945 in Leonia, New Jersey, son of John Rosencrantz and Barbara Hoth Rosencrantz. He grew up in South Dorset, attended the local Dorset Elementary School and graduated from Burr and Burton Seminary, Class of 1963. He served in the [US Navy](#) during the late 60's as Quartermaster on a destroyer escort in the Atlantic fleet. He graduated from University of Vermont with a BS in Geology in 1975 and began and PhD dissertation in geology at the State University of New York at Albany in 1980, where he worked on detailed mapping of the Bay of Islands ophiolite and other areas of Newfoundland with fellow SUNY PhD students Jack Casey, Doug Nelson, and Jeff Karson. His dissertation was supervised by Drs. John F. Dewey and William Kidd.

After graduation from SUNY in 1980, Eric transitioned from a rock hammer-carrying, field geologist to a ship-based marine geophysicist on the research staff of the [University of Texas](#) Marine Science Institute located in Galveston until 1982 and later reorganized as the University of Texas Institute for Geophysics (UTIG) in Austin. During the early to mid-1980's at UTIG, he carried out detailed and extensive studies of the marine geology and geophysics of the Cayman trough and of the Yucatan basin in the northern Caribbean Sea using a grid of seismic reflection data which he helped collect in the Caribbean region during oil-industry-funded research cruises in the 1980's. In all, Eric participated in eight research cruises as a graduate student at SUNY and researcher at UTIG including one aboard the drill ship, Glomar Challenger.

His geophysical studies carried out in collaboration with John Sclater who joined UTIG in 1985 in the Cayman trough and Yucatan basin resulted in comprehensive and highly cited publications on both basins whose geologic and tectonic evolution had previously had been controversial. During the 1980s he also worked with then UT MS student Chris Bowland on two seminal papers on the marine geology and geophysics of the Caribbean oceanic plateau beneath the Colombian basin. During 1988, Eric conducted an extensive survey with Paul Mann of active, submarine faults along the northern Caribbean plate margin that led to the recognition of the Gonave microplate in the areas of Jamaica and Hispaniola.

During mid-1980s to the time when Eric left UTIG in 1994, he worked on an extensive study of maps and other materials from Cuba that were donated to UTIG by Gulf Oil Corporation. During this period, Eric supported used his extensive knowledge of Caribbean marine geology and geophysics to support the research efforts of surveys of carbonate rocks on the Nicaraguan Rise by Al Hine (University of South Florida) and Andre Droxler (Rice University) along with advising Alan Hildebrand on his early studies of the Chicxulub impact crater on the Yucatan Peninsula.

His efforts in compiling and re-interpreting these Cuban materials from pre-revolutionary Cuba (1959) resulted in an extensive, internal UTIG atlas report submitted to the industry sponsors of this study. Parts of his Cuban atlas were used in the 2009 AAPG Studies in Geology volume on Cuba by Georges Pardo who had facilitated the donation and transfer of the Cuban materials from Gulf Oil to UTIG in the early 1980s.

Eric was an expert map maker with an artistic vision as reflected in the high quality and detail of his many geologic maps and illustrations. His Newfoundland field maps used in his SUNY dissertation were drawn on mylar with drawing pens, rulers, and brushes of the pre-computer era. At UTIG he progressed to maps drawn using various models of Apple computers and his preferred drawing software, Canvas. His computer map making skills culminated in the construction of the oversized Cuba atlas in 1993.

On his return to Vermont Eric moved to Dorset and then to Chester in 2011. Eric was an avid kayaker exploring southern Vermont's rivers and lakes whenever possible. He had a deep attachment to Vermont and especially the area around Dorset. He also loved every cat he owned most recently Ella Mae and Rose. He followed politics avidly always ready for a good political argument and was widely read. He is survived by his sisters Christine Pratt of Bradford, Vermont; Anita Rosencrantz of South Berwick, Maine, and Antonia Harkins of Arlington, Vermont; nieces and nephews Michael and Andrea Rosencrantz; Susy and Fletcher Pratt and Kate Combs and Natt Harkins; great nephew Calvin Ferrell and great nieces Isla and Blair Combs. He was predeceased by his brother Stephen Rosencrantz. Contributions in his memory

may be made to the Bernie Sanders Campaign for President. A private memorial service is planned for later in the spring of 2016.

***Modified from an obituary in The Manchester Journal from Apr. 22 to May 13, 2016***

### **Scientific legacy of Eric J. Rosencrantz (1975-1989)**

#### ***PhD research at SUNY from 1975-1980 on exposed ophiolites in Newfoundland:***

1) Formation of uppermost oceanic crust

E **Rosencrantz** - Tectonics, 1982 - Wiley Online Library

2) Reconstruction of the geometry of accretion during formation of the Bay of Islands ophiolite complex

JF Casey, JA Karson, D Elthon, E **Rosencrantz**... - ..., 1983 - Wiley Online Library

3) The structure of sheeted dikes and associated rocks in North Arm massif, Bay of Islands ophiolite complex, and the intrusive process at oceanic spreading centers

E **Rosencrantz** - Canadian Journal of Earth Sciences, 1983 - NRC Research Press

#### ***Research at UTIG from 1980-1994 on marine geology and geophysics of the Caribbean Sea and the Cuban orogeny:***

4) Depth and age in the Cayman Trough

E **Rosencrantz**, JG Sclater - Earth and Planetary Science Letters, 1986 - Elsevier

5) Upper crustal structure of the western Colombian Basin, Caribbean Sea

CL Bowland, E **Rosencrantz** - Geological Society of ..., 1988 - [gsabulletin.gsapubs.org](http://gsabulletin.gsapubs.org)

6) Age and spreading history of the Cayman Trough as determined from depth, heat flow, and magnetic anomalies

E **Rosencrantz**, MI Ross... - Journal of Geophysical ..., 1988 - Wiley Online Library

7) Structure and tectonics of the Yucatan Basin, Caribbean Sea, as determined from seismic reflection studies

E **Rosencrantz** - Tectonics, 1990 - Wiley Online Library

8) SeaMARC II mapping of transform faults in the Cayman Trough, Caribbean Sea

E **Rosencrantz**, P Mann - Geology, 1991 - [geology.gsapubs.org](http://geology.gsapubs.org)

9) Neogene development of the Swan Islands restraining-bend complex, Caribbean Sea

P Mann, SA Tyburski, E **Rosencrantz** - Geology, 1991 - [geology.gsapubs.org](http://geology.gsapubs.org)

10) Basement depths and heat flow in the Yucatan Basin and Cayman Trough, northwestern **Caribbean**: implications for basin ages

E **Rosencrantz**, JG Sclater, ST Boerner - Handbook of Seafloor Heat Flow. CRC Press, 1989

11) Rosencrantz, Eric with contributions from Georges Pardo, 1993, Investigations Into the Geology of Cuba, University of Texas at Austin Institute for Geophysics Technical Report No. 130, unpublished atlas, 47 pages.

1976 photo kindly provided by Jack Casey of Eric Rosencrantz as a SUNY Albany PhD student working with the SUNY ophiolite team in Newfoundland.

**Left to right:** Eric Rosencrantz, Dr. Bill Kidd, Jack Casey, Suzanne O'Connell, Doug Nelson

**Front:** Jeff Karson

Photo provided by Jack Casey



Photo of Eric Rosencrantz likely taken in his later UTIG years in the early 1990's. This photo appeared as part of a short biography at the end of an article entitled "Simplifying Cuba" published in the April, 1995, Houston Geological Society Bulletin.



Photo of Eric Rosencrantz taken for the 1990 UTIG brochure and kindly provided by Patty Ganey-Curry. Eric is in a characteristic pose surrounded by rolling racks of rolled mylar maps and drafting implements in the work area of the "Cuba room" at the UTIG office in Austin, Texas.

