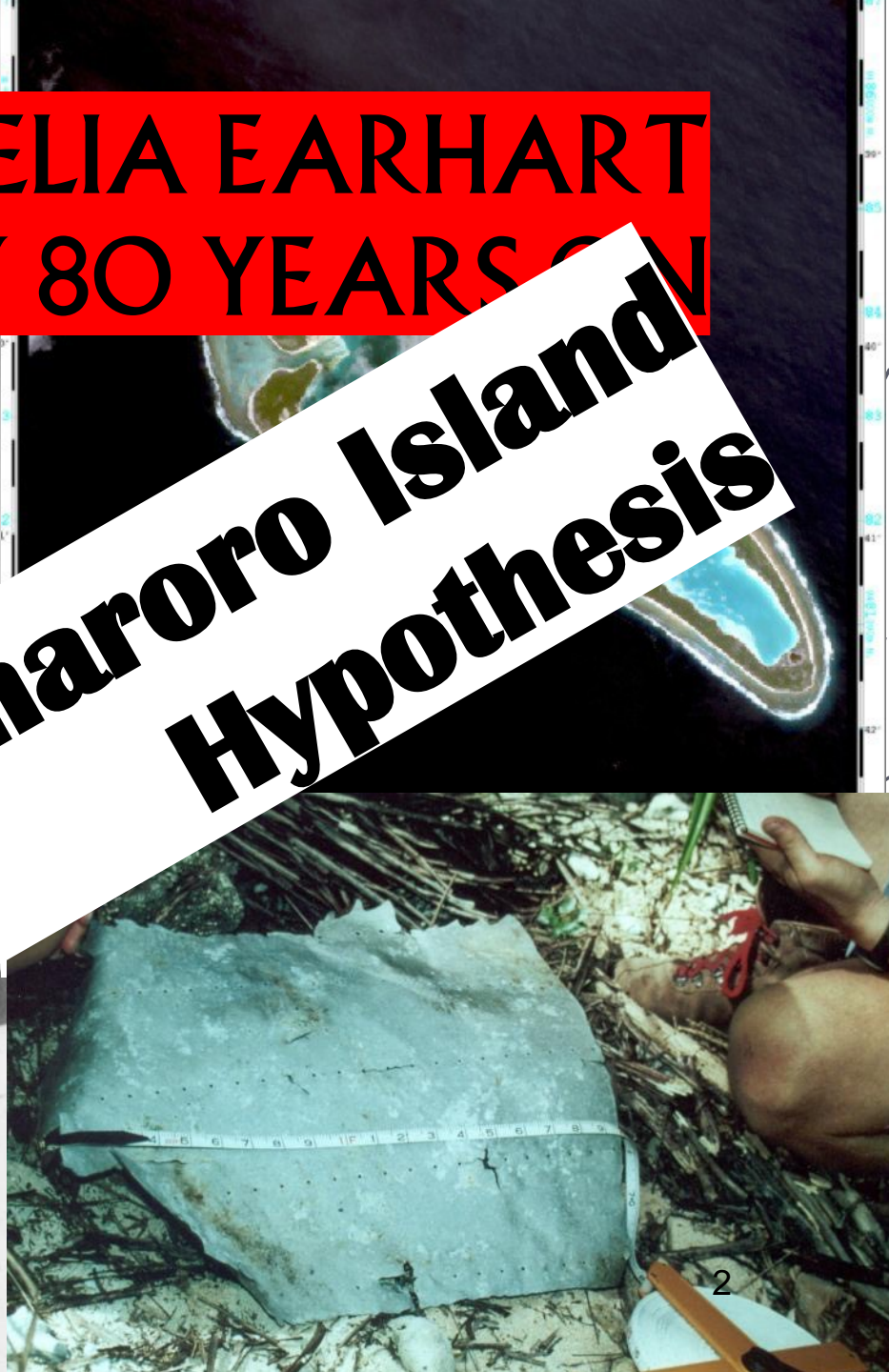




Curtis Hart Bliss
Amelia
Capt.
Geva

THE AMELIA EARHART MYSTERY 80 YEARS ON

The Nikumaroro Island Hypothesis



CREDITS

🕒 **The International Group for
Historic Aircraft Recover (TIGHAR),
USA**

🕒 **Lew Toulmin, PhD, Fellow, Royal
Geographic Society, Silver Spring,
Maryland, USA**

🕒 **Thomas F. King PhD, Archaeologist,
Silver Spring Maryland, USA³**



Amelia Earhart
Fred Noonan

Lockheed Electra 10E

Disappeared July 2, 1937
over the Pacific Ocean.

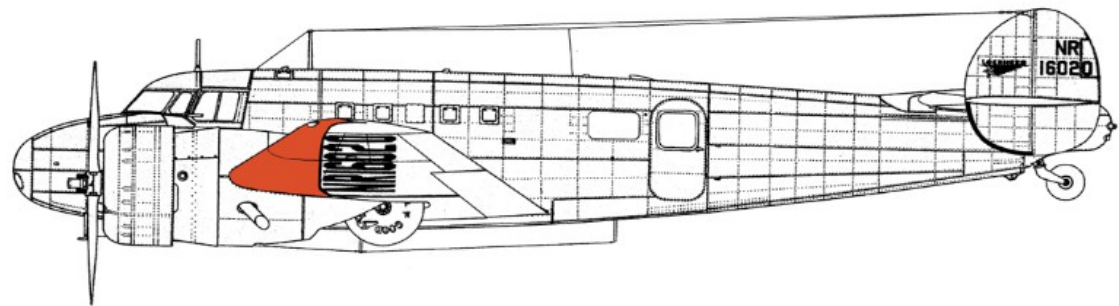


Photo Credit : Associated Press

Subjects:

1. Who were Amelia and Fred?
2. The World Flight, 1937.
3. Nikumaroro [Niku] Hypothesis
4. Other theories.
5. Expedition to Niku Island.
6. Evidence: Niku Hypothesis
7. Earhart books and movies



Nikumaroro island, Rep. of Kiribati



Flag of the Republic of Kiribati

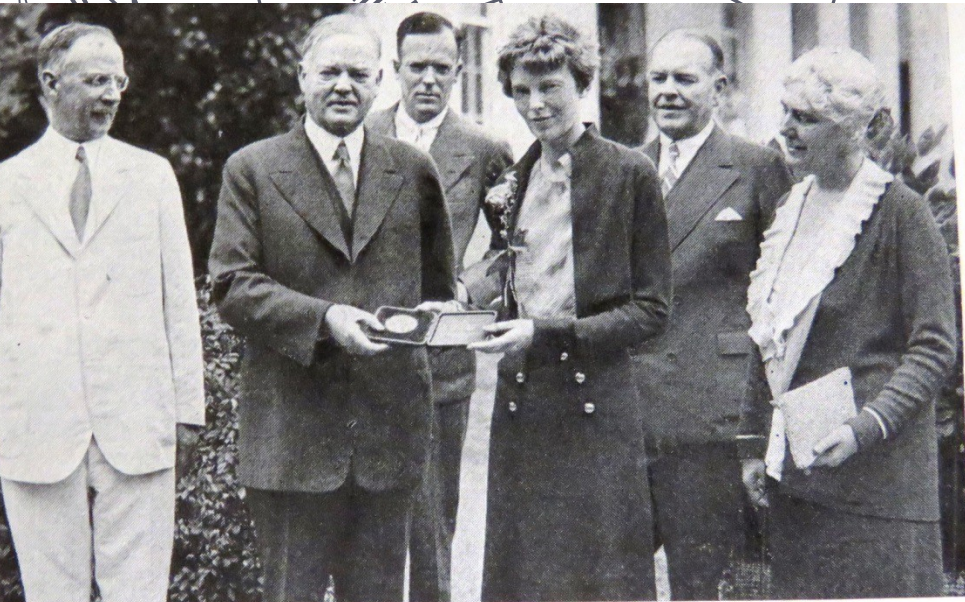
Tomboy "Milly" born 1897, Atchison, KS...



...schooled in Chicago & P

• 1928: Publisher George Putnam recruits Amelia as 1st woman to ride across the Atlantic (lecture & book deals)

1932: 1st woman to fly solo across the Atlantic Ocean
First woman to



1931 Putnam divorces, marries Amelia Earhart



Amelia Earhart and George Putnam ⁸



Lockheed Electra Model 10E
NR16020 2-550 HP PW Wasps



- **1937: The World Flight:** Attempted to be the first **PERSON(S)** to circle the globe at the equator, Lost and never found
- **Fred Noonan:** Left his Chief Navigator job at Pan-American

The Purdue Exponent

Published Daily by Students of Purdue University

VOLUME XLVIII

LAFAYETTE, INDIANA, THURSDAY, MARCH 18, 1937

NUMBER 118

EARHART STARTS ON WORLD FLIGHT



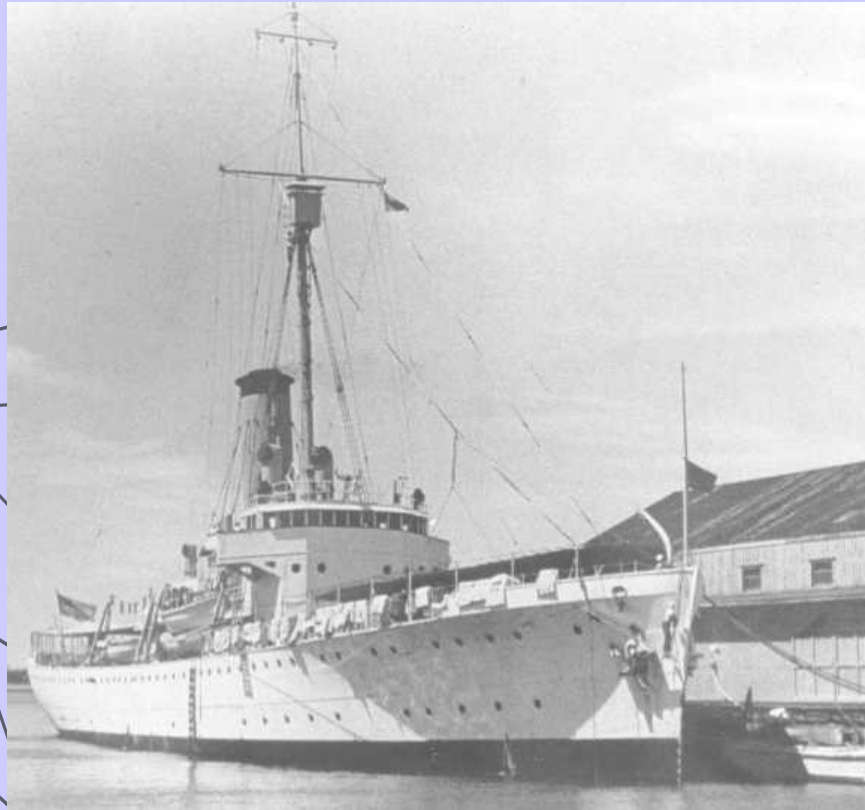
EARHART'S FLIGHT PATH

With departure dates from select cities



THE WORLD FLIGHT: CIRCLE THE GLOBE AT ITS WIDEST POINT.

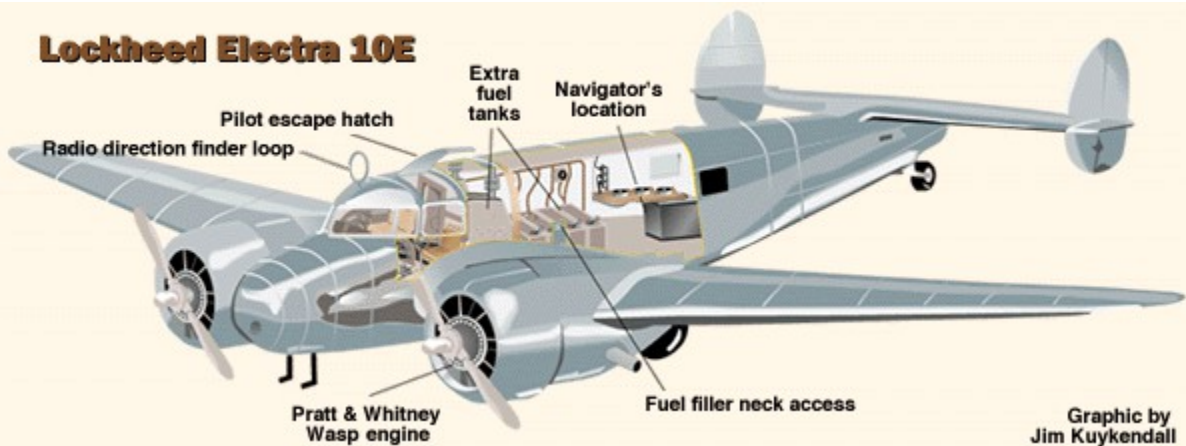
The Flight's Last 20 Hours



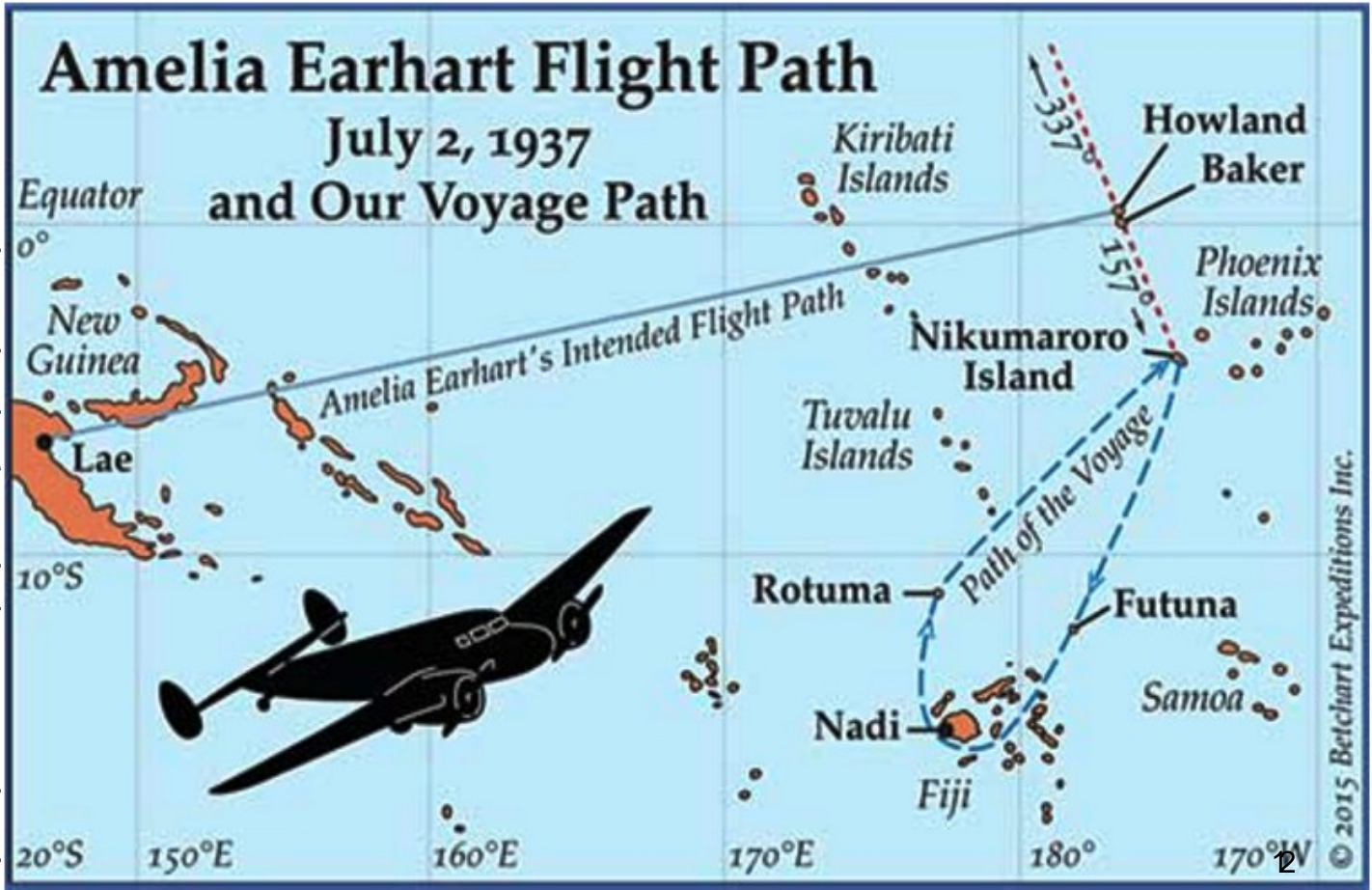
US Coast Guard Cutter Itasca was at Howland Island to provide a direct line of finding and refueling.



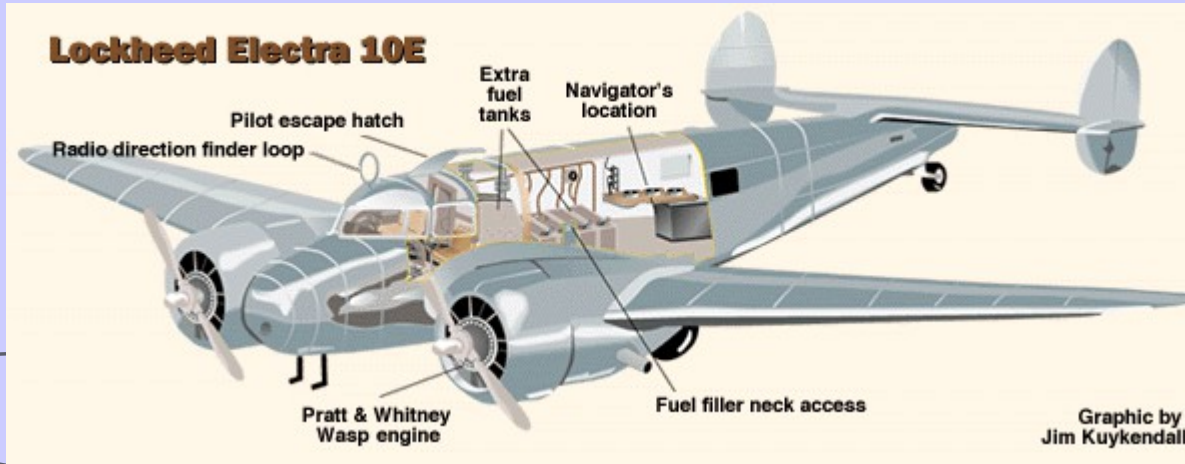
Lockheed Electra 10E



Graphic by Jim Kuykendall



The Flight's Last 20 Hours



July 1, 12:30 PM: Earhart leaves Lae, New Guinea

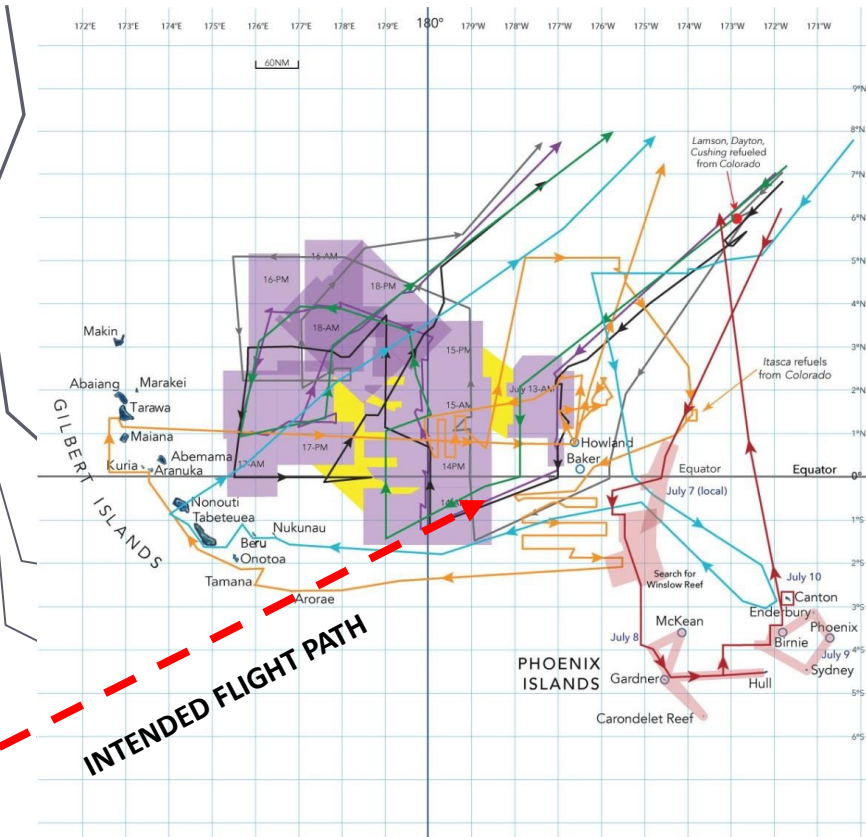
July 2, 8:43 AM: Calling Itasca, We are on the line 157/337. Will repeat. We are running on [the] line (last message)

The USS Colorado Searched the Phoenix Islands

Photo # NH 55275 USS Colorado, photographed during the 1930s



USS Colorado



VOUGHT O3U-3 CORSAIR

... offered a \$2,000 reward

Why the Phoenix Islands?



- Capt. Friedell from the *U.S.S. Colorado* stated:
“Report received from Mr. Putnam stressing the Phoenix Island Group and stating...that the radio could not operate unless the plane was on land” (Post-Loss Signals)
- *The Phoenix Group includes the islands of Nikumaroro, Canton, McKean and others.*
- Last message: We are on the (navigation) line 157/337 (Thru the Phoenix Gr).
- Post-Loss Radio messages and radio bearings taken from Wake,



- **Captured by the Japanese**
- **Ran out of fuel, Crashed/Sank**
 - **Alive in New Jersey, USA**
 - **Captured by aliens**
- **Taken to another dimension**
 - **Alive in the Philippines**



Captured by the Japanese

SAN MATEAN SAYS JAPANESE EXECUTED AMELIA EARHART

EXCLUSIVE

Street Edition

AMELIA EARHART KILLED ON SAIPAN

San Mateo Times DEVOTED TO THE INTEREST OF SAN MATEO COUNTY

WITNESSES, PLANE PARTS Mystery of 23 Years Is Solved

Vol. 63—No. 157, 2 Sections 24 PAGES SAN MATEO, CALIFORNIA, FRIDAY, MAY 1, 1942 15c PER COPY—\$3.00 PER MONTH

So Pr On We had 23 by over the was members The about 200 to 2000 of the of the 1942. Bro Mon By l

Ex-Serviceman Claims He Saw Earhart Grave

A former U.S. Army sergeant who served in Saipan says he was shown the unmarked island grave of two white people "who came from the sky," while he was serving there in 1944. He believes it to be the grave of Amelia Earhart and Fred Noonan and says he can find it again.

The Times has forwarded information given it by Thomas E. Devine of New Haven, Conn. to Saipan for further checking.

Devine told of visiting the grave site along with his buddy, Pfc. John R. Boggs of Denver, Colo.

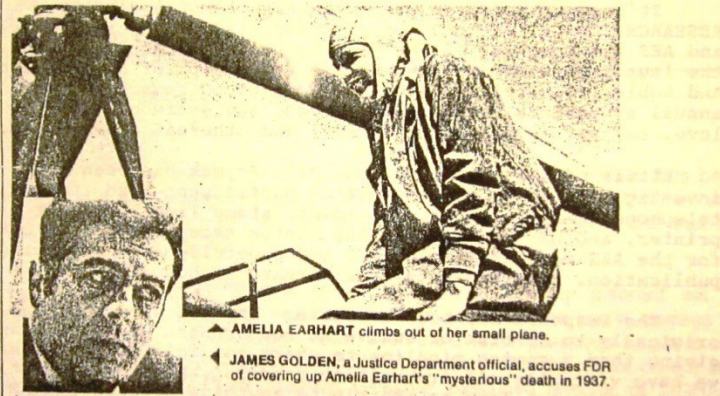
Boggs told the Times today he remembers the visit to the cemetery with Devine and said that while he cannot recall the exact developments that took place there that he does know that Devine is "a very intelligent and dependable man."

Devine told the New Haven Evening Register that he had never connected the information given him by a Chamorro native in 1944 with the Amelia Earhart

of Amelia Earhart was school teacher with her navigator over the 12000 miles of the island of Saipan and a cooperative witness rippled the real lives of the "First Lady of the Air" and Maximo the mystery is a mystery in Saipan, as said by the... Castro Grid 2 More Oil Refineries... James Golden... AMELIA EARHART climbs out of her small plane...

San Mateo Times DEVOTED TO THE INTEREST OF SAN MATEO COUNTY

A Top Justice Department Official Exposes The Long-Buried Scandal



FDR's Amelia Earhart 'Watergate'

Betrayed by FDR?

WOMAN'S STORY: Aviatrix Died Before Saipan Firing Squad

Copyright 1940 by the Amphlett Printing Company) A San Mateo woman who may have been one of the last to see Amelia Earhart alive, says that the famed aviatrix was executed by a Japanese firing squad even while the U. S. Navy was spending \$4,000,000 in a futile search for the missing flier and her navigator, Fredrick Noonan. Mrs. Josephine Blanco Alkama of 15 South Idaho tree, has identified pictures of Amelia as the "American lady pilot" she saw taken into custody on the correct island of Saipan in July, 1937. The woman flier was accompanied by a man, she said, an American also dressed in aviator's garb. While Mrs. Alkama's story... AMELIA EARHART was 39 at the time when she spent in early July in a... JOSEPHINE BLANCO ALKAMA

Record Price Paid for S.M. Polo Property

An all-time record price of \$87,500 an acre, the highest ever paid for professional-administrative office property on the Peninsula was paid yesterday in the sale of some two acres, for a total

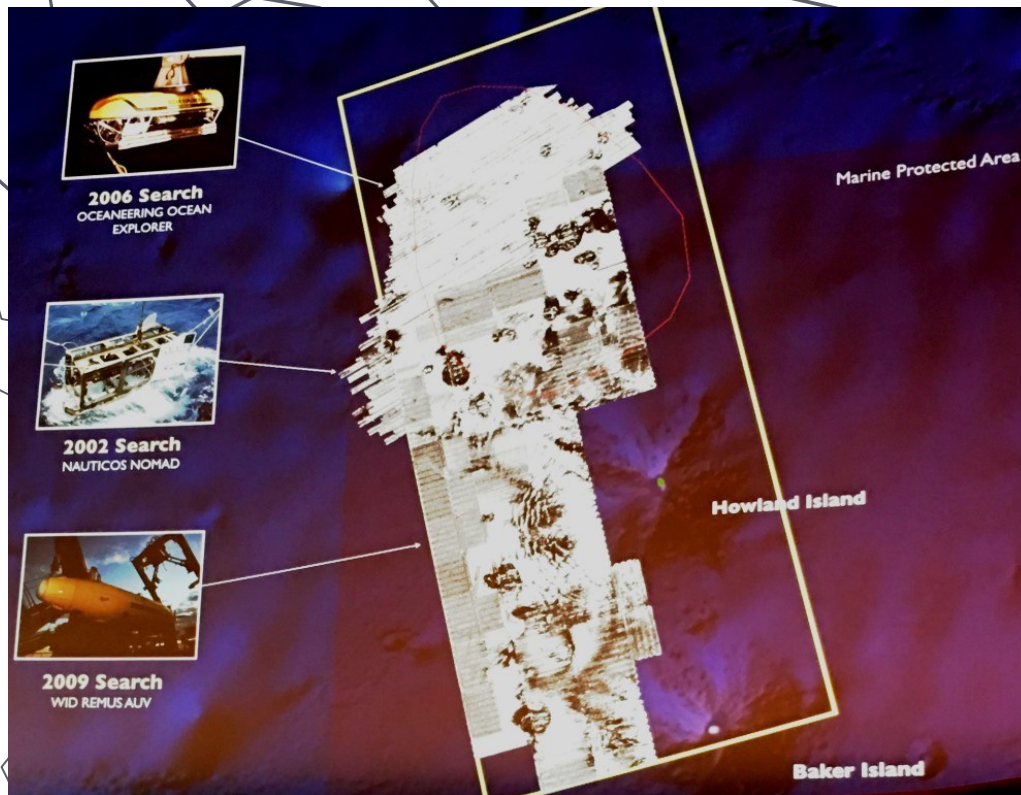
Crashed at Sea? \$40 Million

Spent

- 1989: mapping search by Longs N+W of Howland
- 1994: Timmer/Williamson attempt
- 1999: search by Timmer 45 days w/ side scan NW of Howland
- 2002: Kammerer attempt; Elgin Long 27 day search
- 2006: Nauticos/Waite search 687 sq. mi. NW of Howland
- 2009: Nauticos/Waite search 2000 sq. mi W of Howland
- 2017: Nauticos/Eustace search 960 sq. mi. N/S of Howland



**Mermaid Vigilance + AUV
used by Nauticos in early 2017**



**CT = 14,000 sq. KM, 5500 sq. mi.,
total area searched & mapped via sonar**

1988: The Nikumaroro Hypothesis

Hypothesis: An Educated guess that can be tested

Nikumaroro hypothesis: Earhart and Noonan landed and died on Nikumaroro Island

Nikumaroro: Uninhabited island SE of Howland Island

Team's research program: test the hypothesis



Formerly:
Gardner Island

Phoenix
Islands

Republic of
Kiribati

Formerly
part of Crown
Colony of the
Gilbert and
Ellice Islands

What is Nikumaroro?

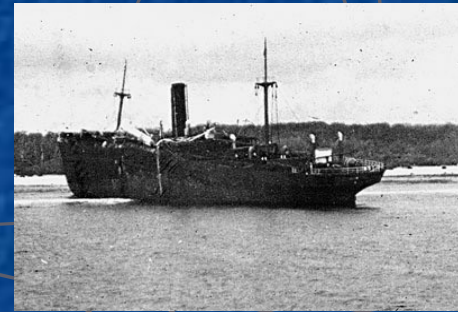
Nikumaroro (Gardner) 16 Apr 2001 IKONOS true-color image

Image processing by NOAA/NOS Imagery: www.spaceimaging.com



History of Nikumaroro

- SS Norwich City Shipwrecked in 1929
- 1938-63: The British formed the Phoenix Islands Settlement Scheme: "PISS"
 - Dec. 1938: working party landed on Nikumaroro
 - 1940: British Officer Gerald Gallager assigned as PISS Administrator. A skeleton is found

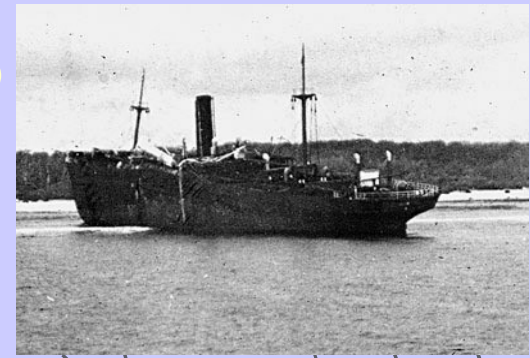


- 1944-46: USCG Loran Station
- 1970s: USAF ICBM tests



So, TIGHAR Headed For Nikumaroro

Expeditions So Far:



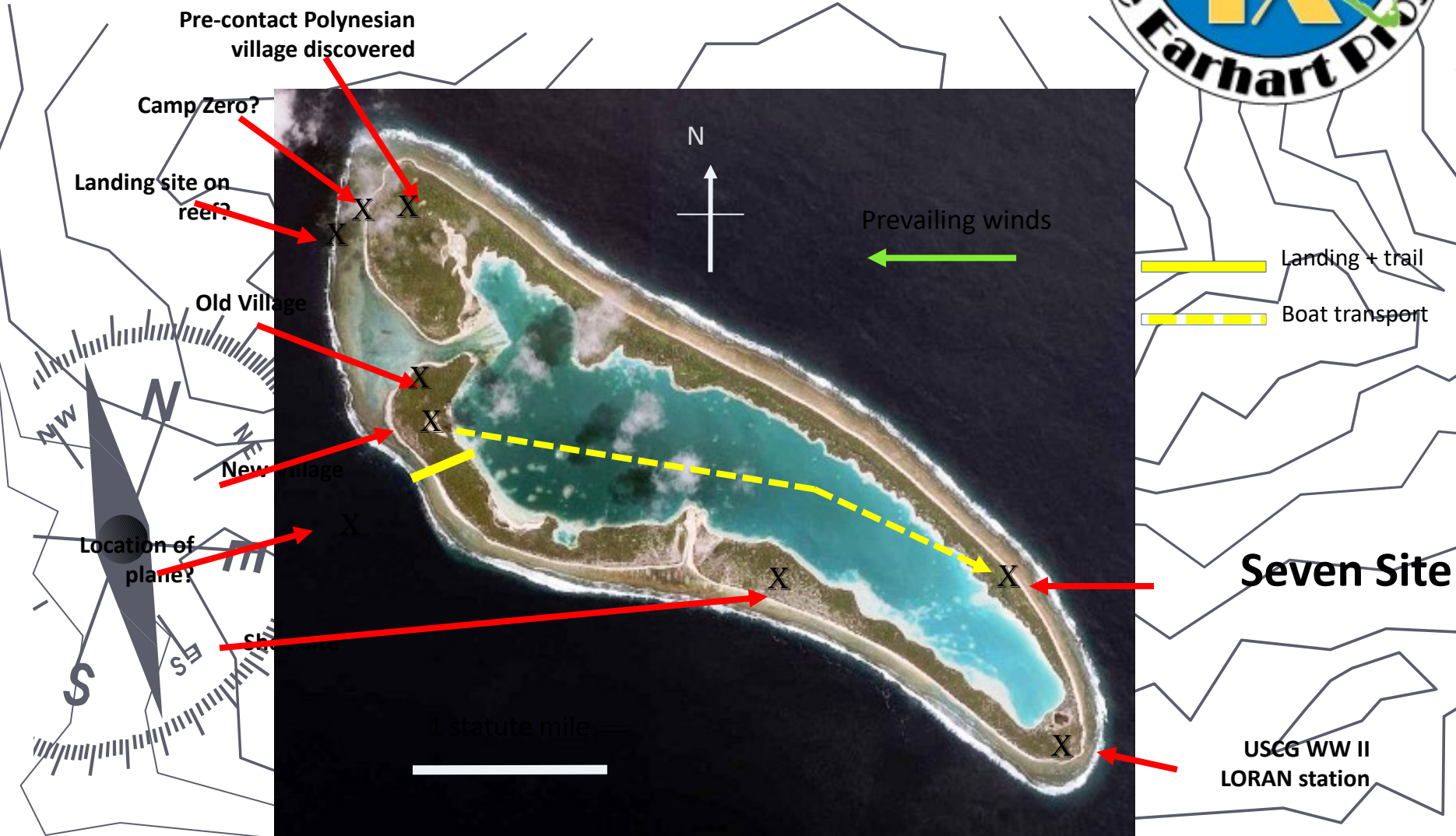
- **1989** Land Search
- **1991** Land and Underwater Search
- **1996** Land Search
- **1997** Land and Underwater Search
- **1998** Research: In England and on Kanton Is.
- **1999** Land Search
- **2001** Land (7-Site)/Underwater Search
- **2003** Underwater Search
- **2007** Village and 7 Site Search

2017: BETCHART EXPEDITION

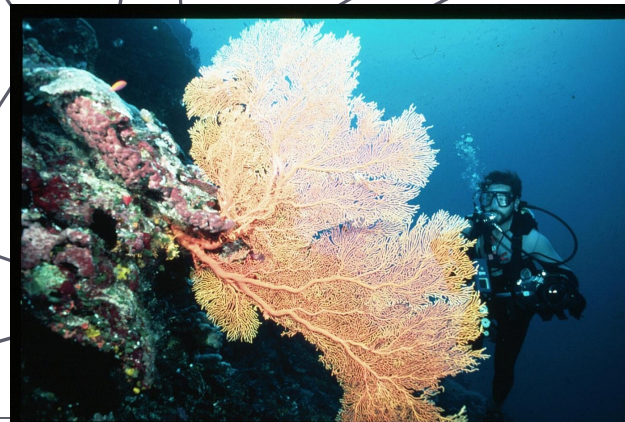


MV Reef Endeavour
5-DAY SAIL ONE-WAY FROM FIJI

A small island, with many sites



Getting ashore and around





1929, Wreck of the Norwich City

8 Sailors Lost



Humans worked hard in 2017

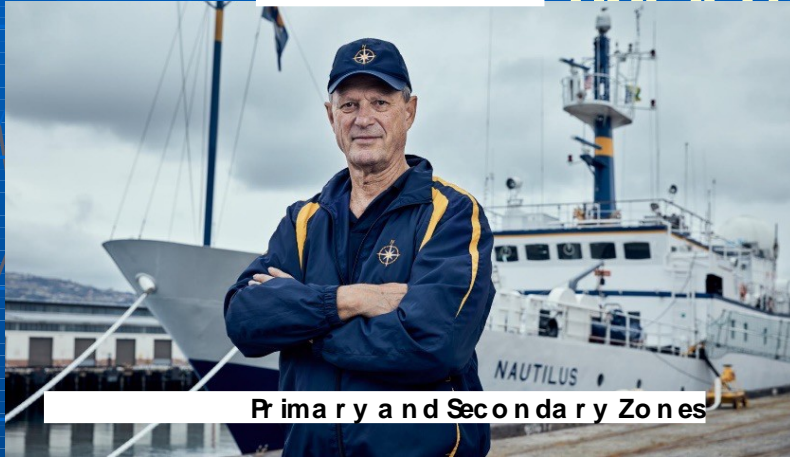


2017: Last Group off the Island



AUGUST 2019: NATIONAL GEOGRAPHIC SOCIETY

Bob Ballard and *Nautilus*



Primary and Secondary Zones

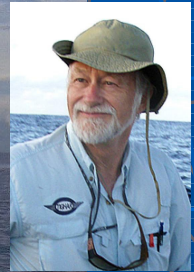
Plus: Trip Niku and Tarawa Island



MV Taka



Fredrik Heibert, PhD
Archaeologist, National
Geographic Soc. Fellow



Tom King, PhD
Archaeologist



Julie Brewer & Ruby



Lynn Angeloro and Berkeley

Historical Human Remains Detection Dogs

AUGUST 2017. NATIONAL GEOGRAPHIC SOCIETY NIKUMARORO EXPEDITION, NIKUMARORO & TARAWA ISLAND



2. The 2019 Nautilus team

- A. Bob Ballard's crew aboard the Nautilus
- B. Land archaeology
- C. Te Umwanibong Museum



1. Island geology.

3. The 2019 team visually examined

- a) 100 percent of the island down to 750 meters
- b) 100 percent of the primary zone visually down to 900 meters
- c) Metal objects collected, A
- d) The island rises thru 5,000 meters [3 mi, 16

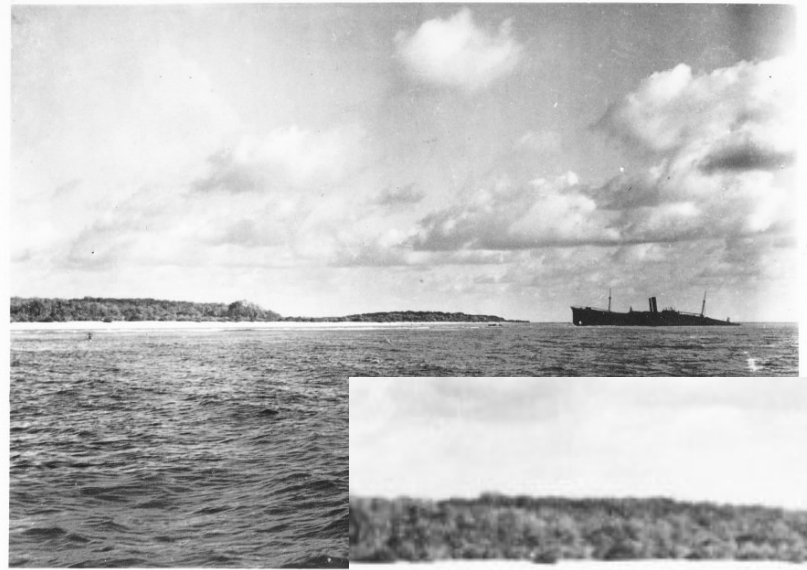


4. Niku 2019 Island Archaeology: Dogs deployed, Additional soil collected, Report pending.

5. Tarawa Island Research: Before Niku, Fredrik Hiebert and team visited Tarawa. They examined fragments of a human skull in the Te Umwanibong Museum and Cultural Centre.



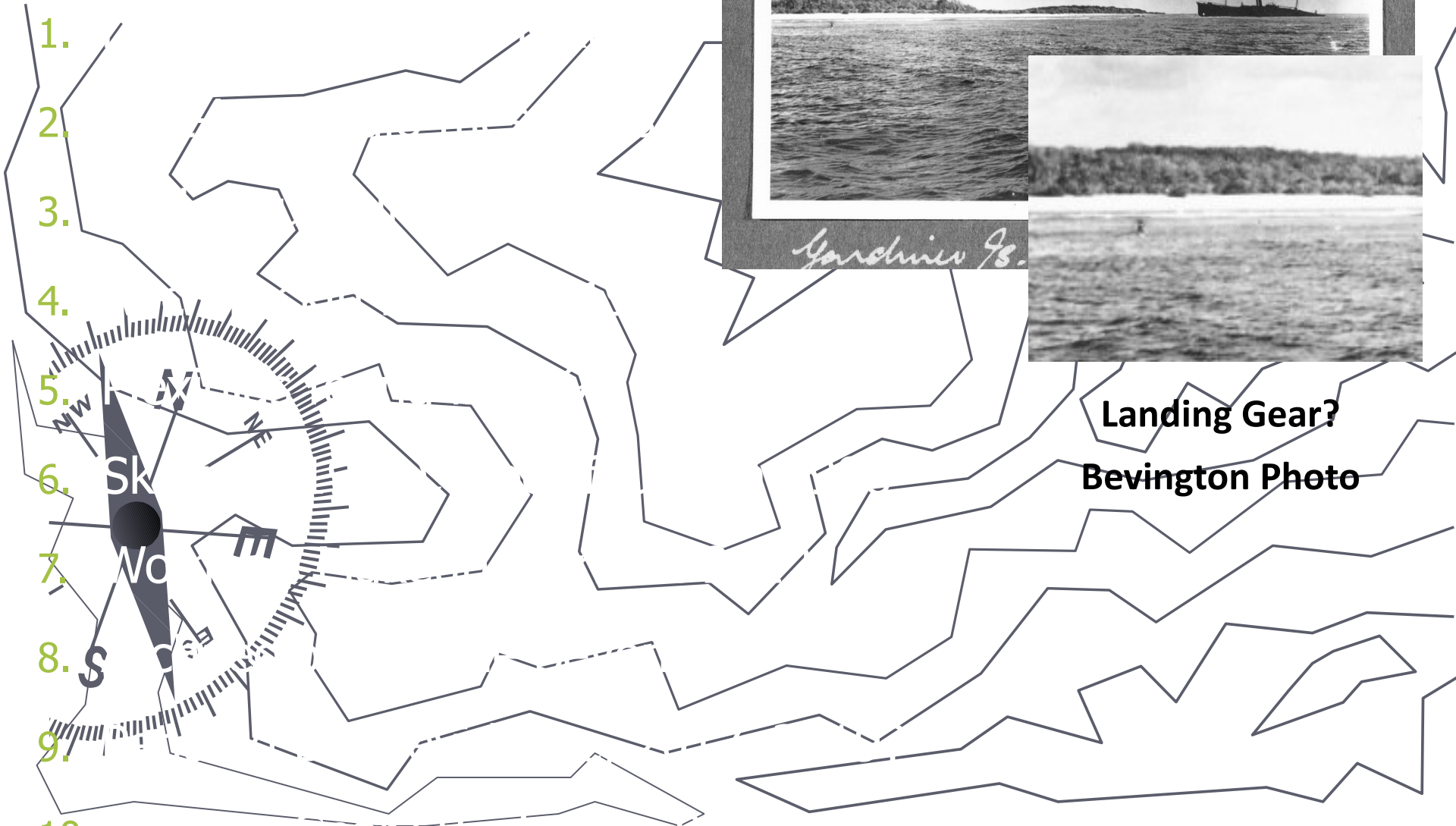
Wrap Up.
Selected key
evidence:



Gardiner Is.



**Landing Gear?
Bevington Photo**



Line of Position

Line of Position
157-337 degrees

7:40 a m: 'Must be on you'

8:48 a m: 'We at see the line you" 157 337"

Howland Is.

Baker
Equator

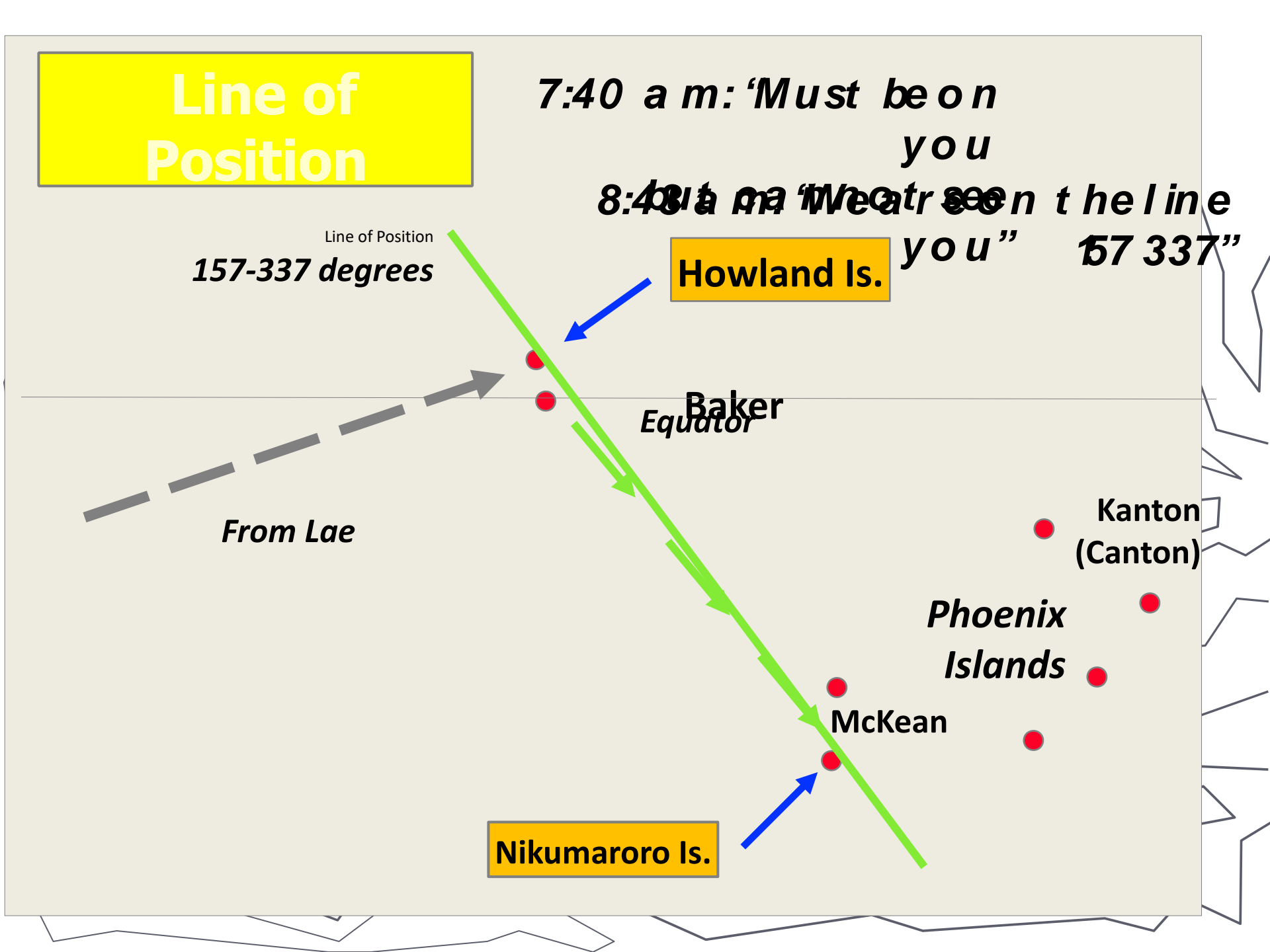
From Lae

Kanton
(Canton)

Phoenix
Islands

McKean

Nikumaroro Is.



Wake-Midway-Oahu & Post-Loss

JULY GM TIME SIGNAL RECEIVED AT

JULY GM TIME	SIGNAL	RECEIVED AT
3 0200	Weak signals, "L-A-T"...	L.A
3 0400	Weak signs, "erratic, undeciph."	L.A.
3 0517	Carrier wave	Honolulu
3 0530	"Hear her now, weak..."	Itasca
3 0600	(Itasca requests dashes)	
3 0600	Itasca request, responding dashes	Achilles
3 0604-06	"Something like generator start"	Itasca
3 0607	Unreadable, "Earhart" mentioned	Itasca
3 0700	Weak, unreadable	L.A.
3 0800-45	Earhart voice, SOS loud & clear	Amarillo
3 0831-54	Unintel. voice, "like last night"	Nauru

Others: FL, WY, Australia

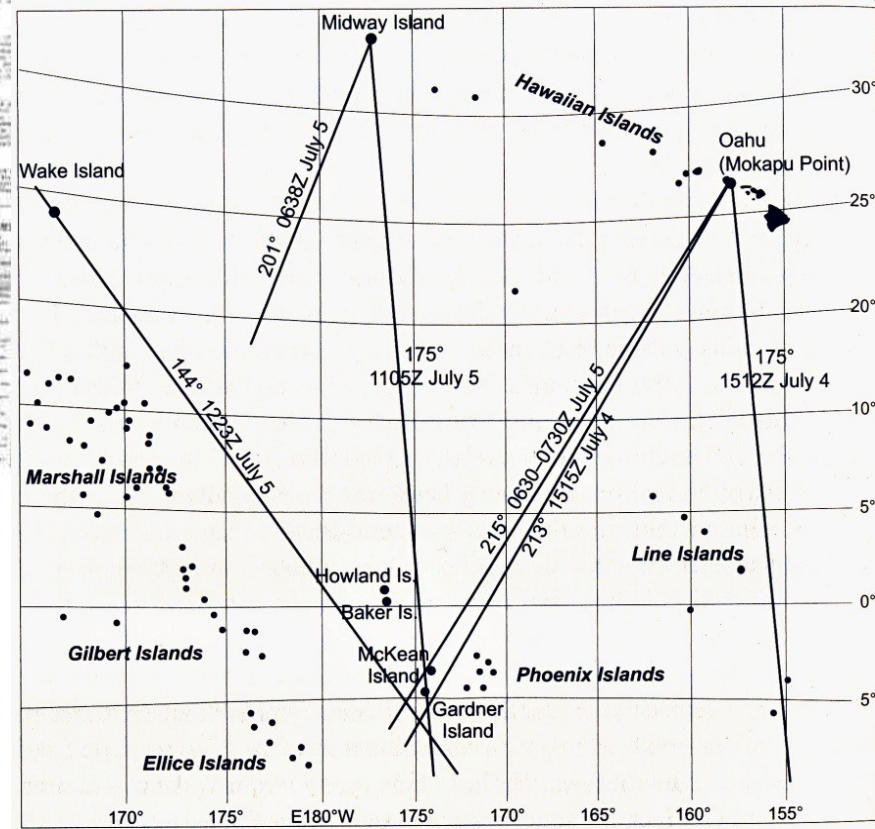
Quincy Patriot Ledger

The Daily Evening Paper for Quincy and South Shore Towns

QUINCY, MASSACHUSETTS SATURDAY EVENING JULY 4 1931

The Weather
Forecast for Quincy and South Shore Towns
July 4-5-6
July 4-5-6
July 4-5-6

FAINT SIGNALS HEARD FROM AMELIA'S PLANE



Amelia Earhart: The Lost Evidence

NPG 1304

NAVAL MESSAGE

ACTION COPY

RECEIVED AT NAVY DEPARTMENT
F5L MUSK V NPM Z NRUI V QUAX P GR 44.

FROM: COMDR HAWAIIAN SECTION CG
ACTION: ITASCA C G
KXKX

PRIORITY
037 JUL 5 12 40

PASSED TO OPNAV & CINCUS RMR BY RDO HONOLULU FOR APPROPRIATE ACTION

U.S. GOVERNMENT PRINTING OFFICE 4-7143

PRIORITY /KD

8005 FOLLOWING COPIED NAVY RADIO WAILUPE 1130 TO 1230 GCT
QUOTE 281 NORTH HOWLAND CALL KHAQQ BEYOND NORTH DONT HOLD
WITH US MUCH LONGER ABOVE WATER SHUT OFF UNQUOTE KEVED
TRANSMISSION EXTREMELY POOR KEYING BEHIND CARRIER FRAGMENTARY
PHRASES BUT COPIED BY THREE OPERATORS 0242

1989: Found The Dado

Dado, Aluminum

15 inches

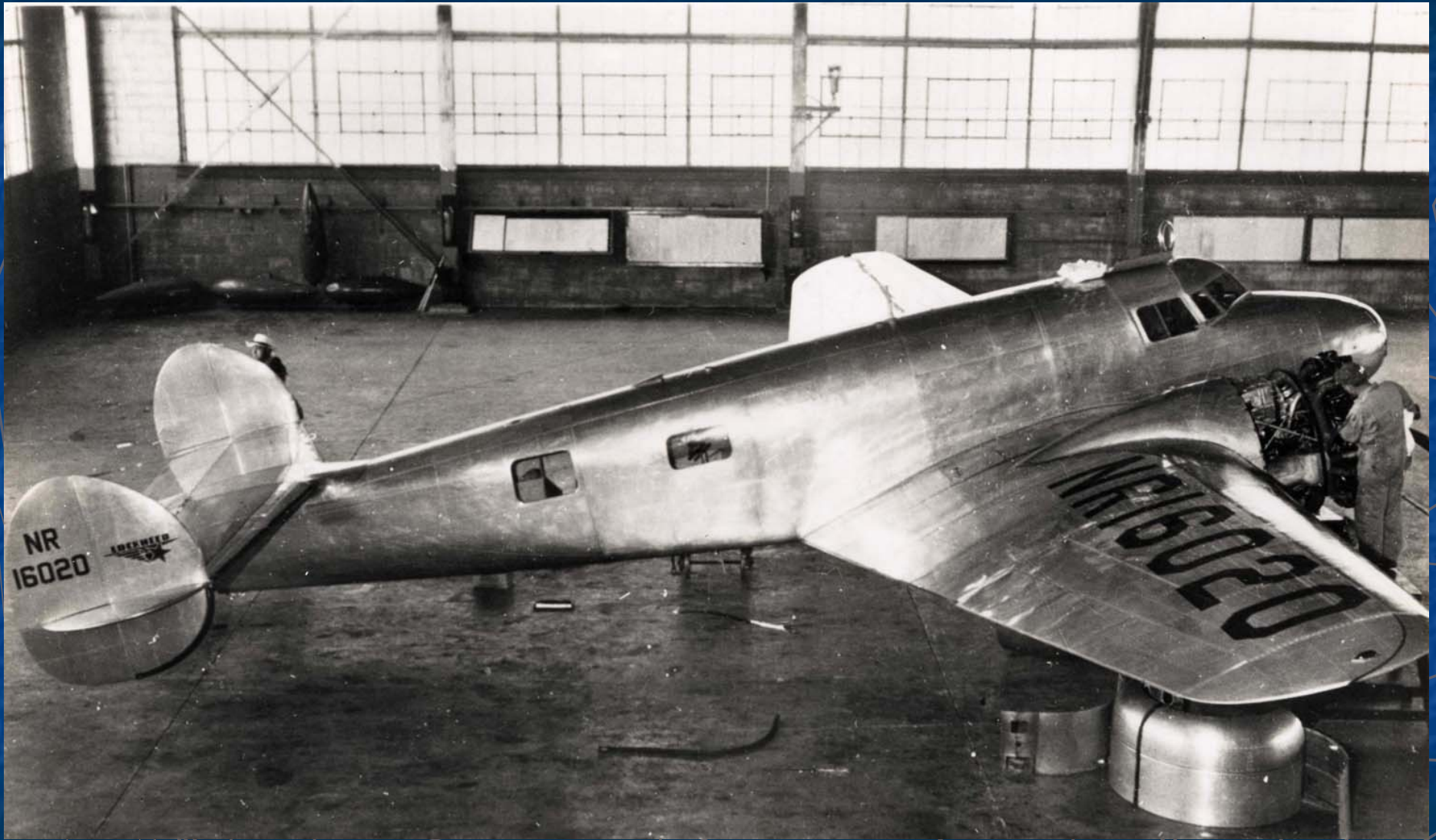


1991: The Aircraft Skin

Skin, Aircraft Aluminum



- The skin is aircraft aluminum.
- A hand-stamped label on the skin and the font type indicates a pre-1938 manufacture date.
- An attached rivet is a pre-1940 style and it is not a flush riveted head as used on World War II aircraft.





SEPT. 2014-2019 FORENSIC IMAGE ANALYSIS:

**RIVET LINES APPEAR CONSISTENT
EVIDENCE OF NON-CONNECTED UPRIGHT
EVIDENCE THE PATCH WAS DEFORMED DUE TO WEAKENING OF THE FUSELAGE
ANALYSIS IS CONTINUING**

1996: The Plexiglas

Plexiglass



- Matches Lockheed Window Specs as in:
- *Correct material, Polymethyl methacrylate*
- *Correct curvature*
- *Correct thickness, 1/8 inch*
- It does not match any window on a World War II airplane

Lo c k h e e d Win d s h i e

l d



Skeleton Documents
1997-1998

M.P. /

(Serial No)

TELEGRAM.

From The Officer-in-Charge, Phoenix Scheme, Gardner Is.,

To The Resident Commissioner, Ocean Island.

No. 71

2

(Date) 23rd September, 1940.

Working party found human skull



Some months ago working party on Gardner discovered human skull - this was buried and I only recently heard about it. Thorough search has now produced more bones (including lower jaw) part of a shoe a bottle and a sextant box. It would appear that

- (a) Skeleton is possibly that of a woman,
- (b) Shoe was a woman's and probably size 10,
- (c) Sextant box has two numbers on it 3500 (stencilled) and 1542 - sextant being old fashioned and probably painted over with black enamel.

Bones look more than four years old to me but there seems to be very slight chance that this may be remains of Amelia Earhardt. If United States authorities find that above evidence fits into general description, perhaps they could supply some dental information as many teeth are intact. An holding list of finds for present but have not exhumed skull.

There is no local indication that this

More bones found

Woman's shoe

Sextant box

"Slight chance" may be Earhart

Skeleton (Since Lost)

TELEGRAM.

From The Officer-in-Charge P.I.S.S., Gardner Island . . .

To The Secretary for the W.P.H.C., Suva.

No. . . 1, . . . (Date) 17th October, . . . 1940

Confidential.

Complete skeleton not found only skull,
lower jaw, one thoracic vertebra, half pelvis, part
scapula, humerus, radius, two femurs, tibia and fibula.
Skull discovered by working party six months ago - report
reached me early September. Working party buried skull
but made no further search.

Bones were found on South East corner of
island about 100 feet above ordinary high water springs.
Body had obviously been lying under a "ren" tree and
remains of fire, turtle and dead birds appear to indicate
life. All small bones have been removed by giant coconut
crabs which have also damaged larger ones. Difficult to
estimate age bones owing to activities of crabs but am quite
certain they are not less than four years old and probably
much older.



Bones found
SE corner under
"Ren" tree

Fire, bird, turtle remains

Bones damaged by crab



5.5 ft.-8 in.

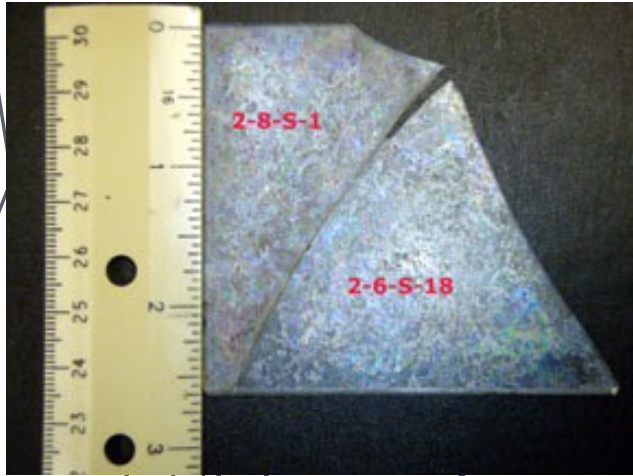


5 ft. 7 in.

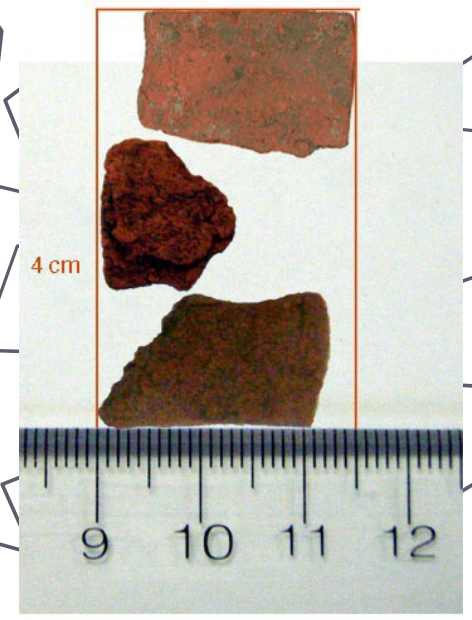
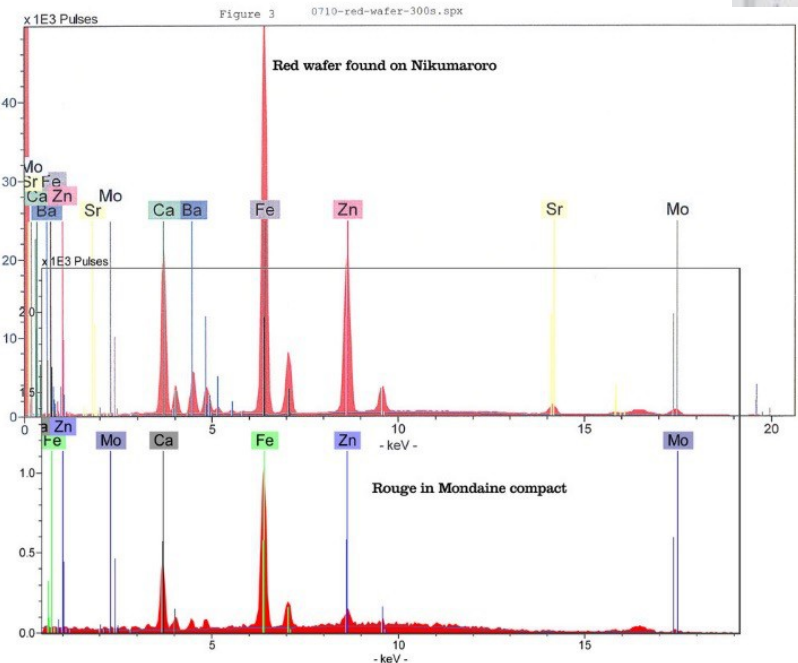
Dr. Hoodless' 1941 Report: 13 bones found

Dr. Jantz's 2018 Report: "if the bones do not belong to Amelia Earhart, then they are from someone very similar to her." (99%)

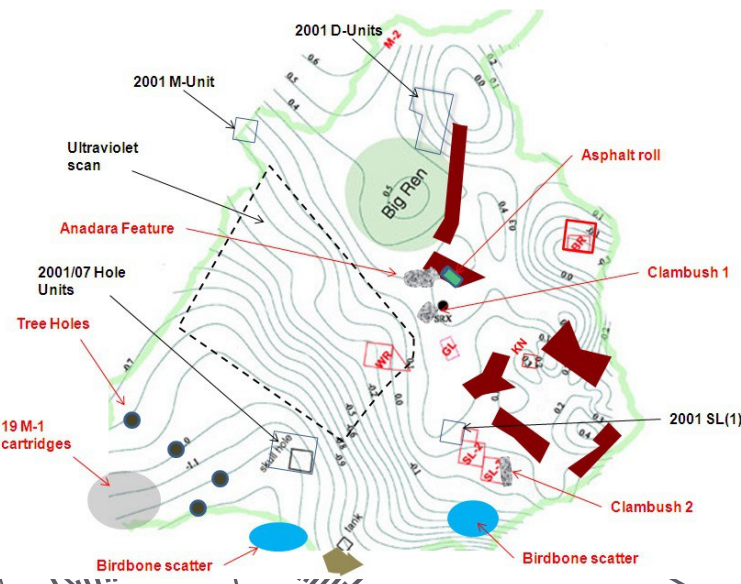
Probable Lady's Compact: 7-Site



Earhart with compact



Archaeology at the 7- Site, Ren Tree

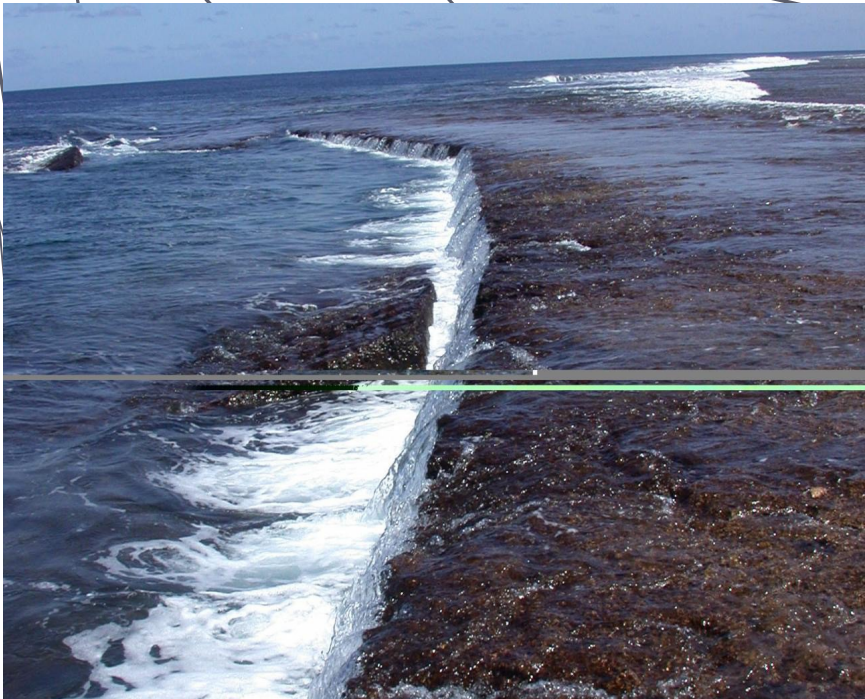


Forensic Dogs alerted here and NW of the Shoe Site Soil was collected, A partial DNR sequence was obtained.

Also Found: Bird, Turtle Bones, Bottles and more

If the airplane is underwater, how did it land @ Niku?





Dry Reef Flat: Proposed Landing Area



WE THINK WHAT HAPPENED IS...



Complicating Factors (Noise)

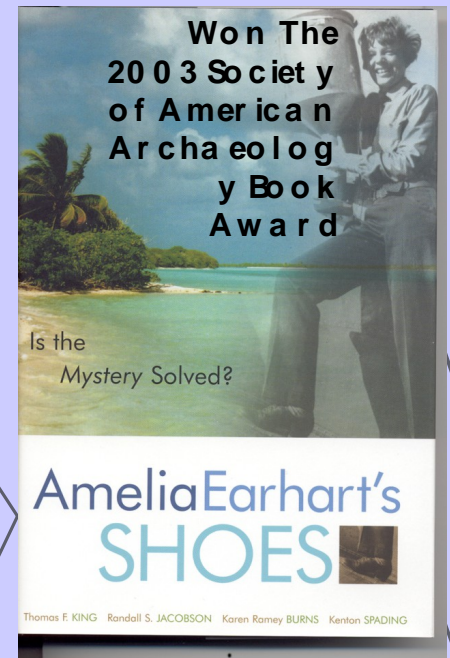
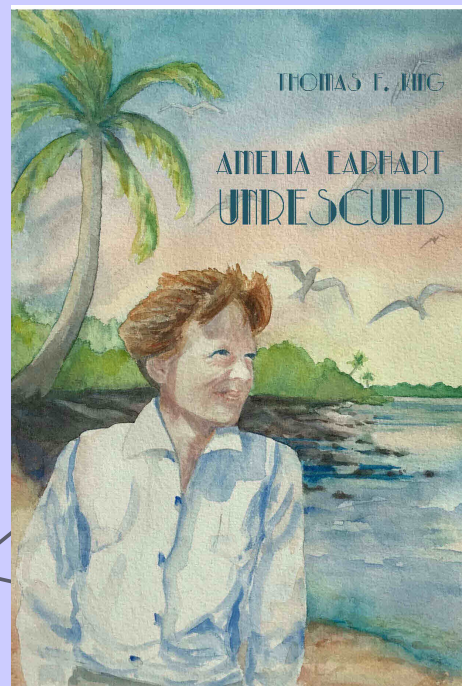
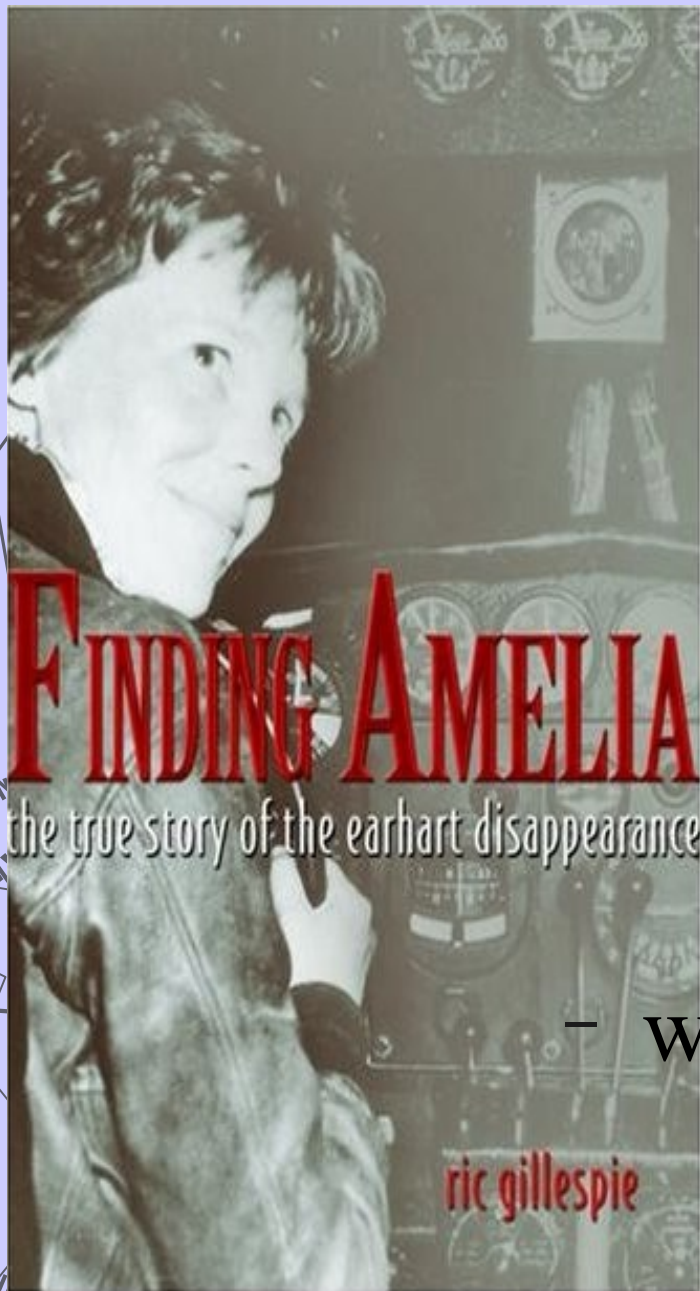
- *S.S. Norwich City*: Wrecked on island's NW reef in a storm in 1929
 - 8 sailors lost, bodies not recovered, Perhaps Gallagher found the bones of one of them?
 - **Research Paper: Lost Norwich City Crewmen: Potential Sources of the Human Remains Discovered on Gardner Island.** Saleh Ragee: 5 ft. 6 in.
- **World War II B-24 airplane parts have been found on the island.** Brought there by natives from other islands some of them were used as air force bases on them.
- **USS Bushnell**: In 1939 the US Navy surveyed Niku. In 1940 a sextant box numbered **1542/3500** was collected with the bones. In 2018 research revealed the Bushnell carried a sextant with Navy Observatory⁴⁹ No. 1542.



10 x 10 x 5"
Typical Brandis

Summary:

- LOP and Post-loss signals point to Nikumaroro
- Airplane wreckage reported on reef by colonists
- Airplane parts found in the village by TIGHAR team
- Skeleton found in 1940 at SE end of the island
- Forensic dogs alerted at the 7- Site, possible DNA
- Also found at the 7-Site (similar to Gallagher)
 - Fish/bird/turtle bones, campfires
 - Possible attempt at water purification
 - Apparent female-associated artifacts (makeup, skin cream....)
- But there are lost Norwich City Seaman



- www.amazon.com

- www.amazon.com

Plans for Future Expeditions

- 7-8 days on the island
- Research Team & Paid Passengers
 - Continue searching the 7-Site, Big Ren
 - Search the Shoe-Site Area
 - More work in the village and other sites
 - Forensic dogs Again
 - Archive Research
 - Later, pending additional archaeology on Land, Potential for additional underwater exploration

Opportunities

- Join TIGHAR
 - Professionally Published Journal
 - <http://www.tighar.org>, Info and Artifact Research
 - <http://www.betchartexpeditions.com/>
 - Help fund the research
 - Archaeology
 - Biology
 - Archival research in the US and Europe
 - Archival research in Fiji
 - Participate on a future expedition team!



YOU COULD JOIN AN EXPEDITION



2017: MV Reef Endeavour
BERTHS: \$10,000, 20+ DAYS

- *Kenton Spading, P.E., 651-272-7970 (USA)*

KSpading@Comcast.net

- *Co-Author, Amelia Earhart's Shoes: Is the Mystery Solved? Altamira Press*

- www.amazon.com

- www.altamirapress.com

- *The International Group for Historic Aircraft Recovery (TIGHAR)*

- www.tighar.org On the website....

Q U E S T I O N S ?



- *Kenton Spading, P.E., 651-272-7970 (USA)*

KSpading@Comcast.net

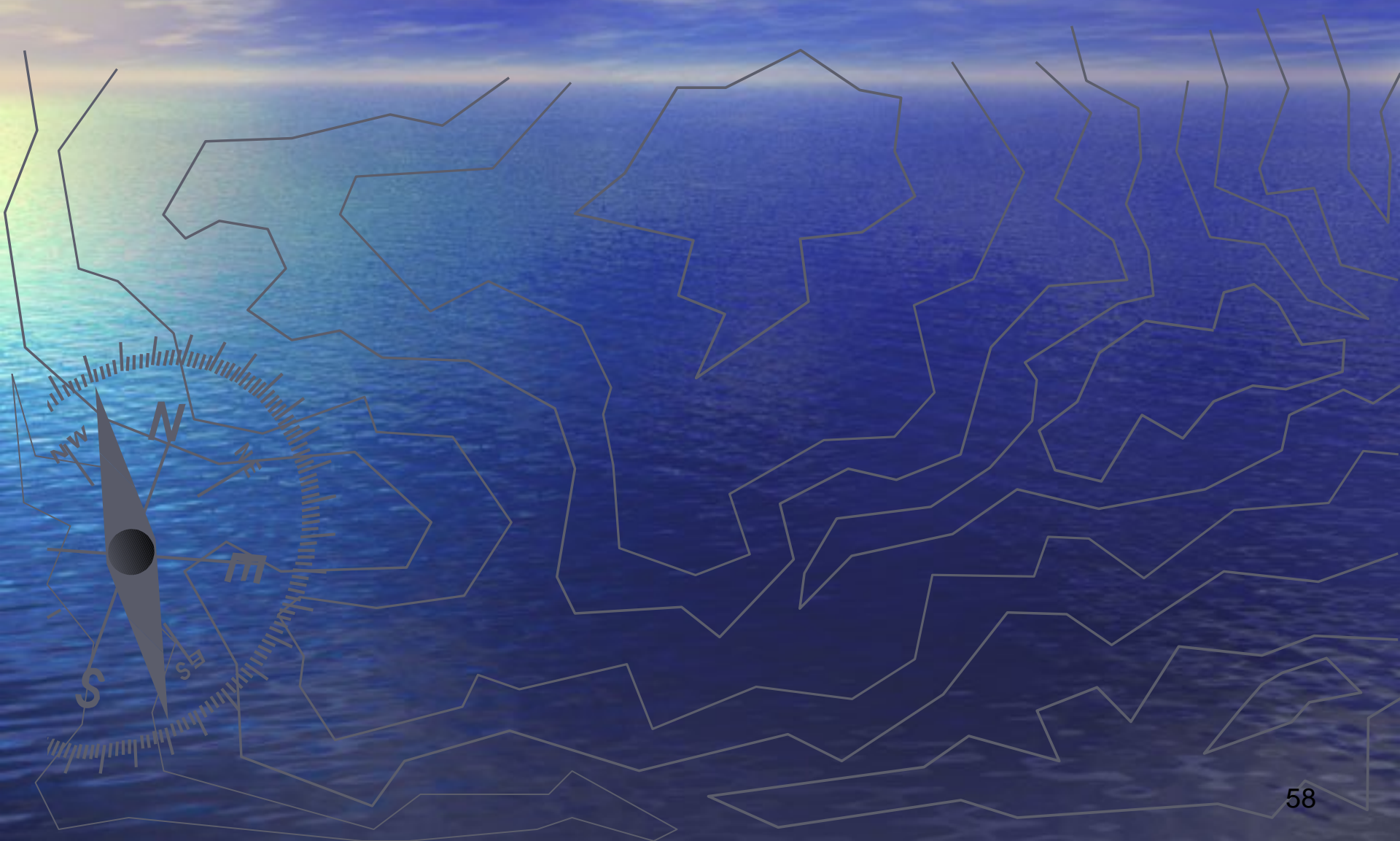
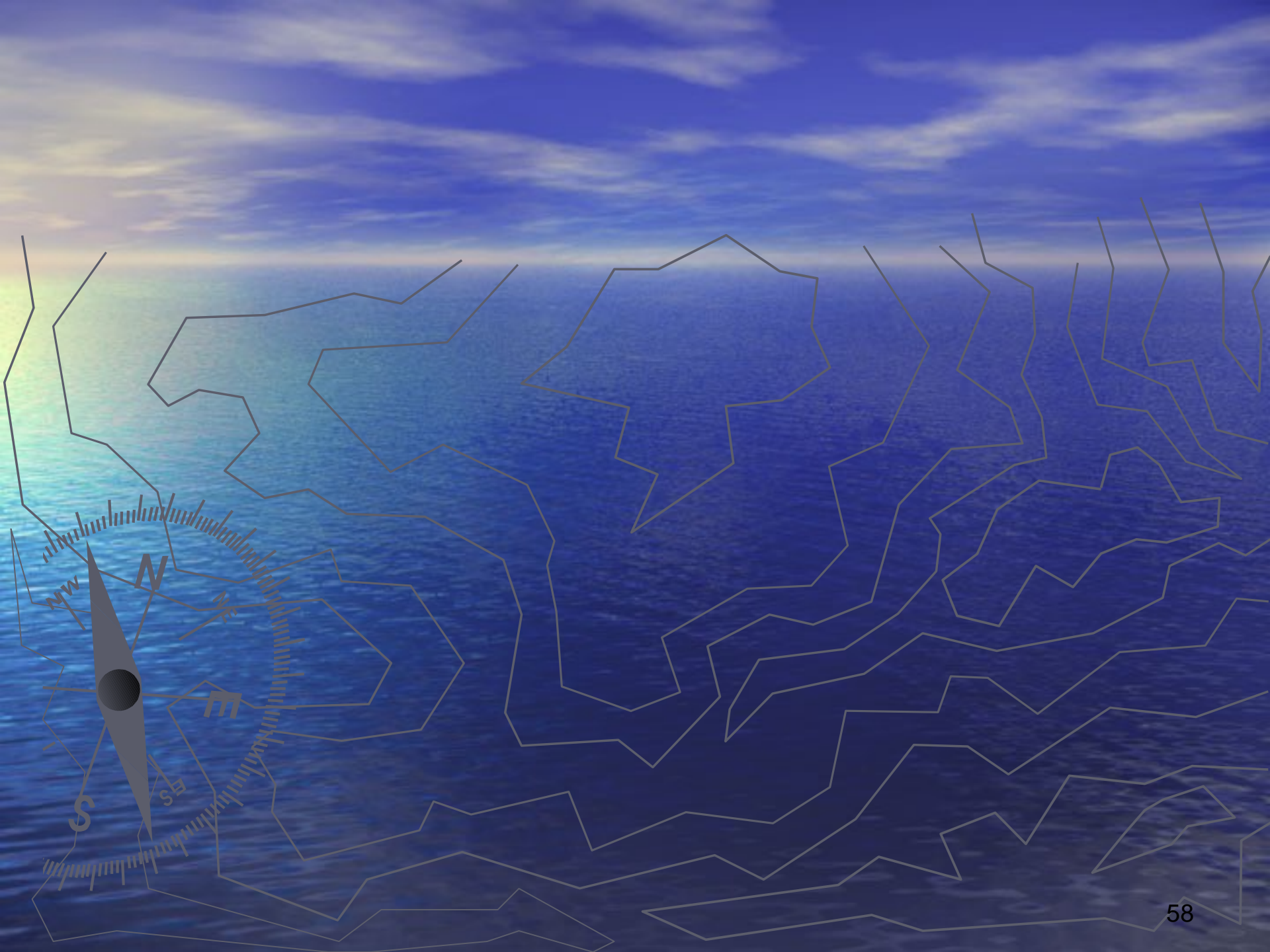
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- www.tighar.org On the website....



Niku 2017 Expedition

