

SMITHSONIAN INSTITUTION  
UNITED STATES NATIONAL MUSEUM  
WASHINGTON 25, D. C.

March 8, 1963

Memorandum

To: Mr. M.W. Goding,  
High Commissioner  
Trust Territory of the Pacific Islands

From: Dr. Saul H. Riesenbergs, Curator, Div. of Ethnology, U.S. National Museum  
Dr. Clifford Evans, Curator, Div. of Archeology, U.S. National Museum  
Dr. Betty J. Meggers, Research Associate, Div. of Archeology, U.S. National Museum

Subject: Preliminary Report of Anthropological Research conducted on Ponape Island, Caroline Islands, from January 28 to March 8, 1963, under sponsorship of the Smithsonian Institution with support from the National Science Foundation

PROCEDURE:

Upon arrival on Ponape the three members of the scientific party established field Headquarters at the Catholic Mission in Tamaroi, Metalanim District, at the invitation of Father Hugh Costigan. A contractual arrangement with the Metalanim Housing Cooperative provided the party with housekeeping services, transportation, laborers, meals, instruments, etc.

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Through the cooperation of Mr. Maynard Neas, District Administrator, arrangements were made to facilitate the detailed gross mapping of some of the sites of Nan Matol by use of the services of the District Surveyor, Frank Castro, and his staff. Pensile Lawrence, Assistant District Anthropologist, was assigned by the District Administration to the project for its duration in order for him to acquire additional professional competence. He also acted as interpreter and translator for Dr. Riesenbergs when informants were interviewed.

The ruins of Nan Matol were only one-half hour by outrigger canoe from Father Costigan's mission, so a minimum of time was spent in going to and from the sites. The 25 laborers, foreman and cook hired by the Metalanim Housing Cooperative met Archeologists Evans and Meggers at the sites daily, Monday through Saturday; breakfast and lunch were eaten by all at the sites and thus a full eight hour work day was available.

Part of the time Ethnologist Riesenbergs with his principal informant, Kesner Hadley, and interpreter, Pensile Lawrence, went to the various sites under study by Archeologists Evans and Meggers to verify details pertaining to these sites obtained in the oral traditions or to examine details uncovered by the archeologists that

might be amenable to explanation through such traditions. When not at the site, interviews were conducted in a private room at the Catholic mission by Riesenbergs with informants. Archeologists Evans and Meggers worked eight hours a day, six days a week at eight different sites in the Nan Matol complex, returning nightly to base headquarters at the mission. Each evening was spent in comparative discussions between the day's archeological finds and the ethnologist's data, often with additional information received from Father Hugh Costigan based on his fifteen years of residence on Ponape and his excellent knowledge of the Ponapean language.

## RESULTS OF RESEARCH:

### 1. Ethnological

The interpretation of Nan Matol, the cluster of artificial islets and their structures, was the principal objective of the ethnologist's interviews. The required information was obtained by two principal methods: (1) question and answer concerning specific features of the sites and the objects found; and, (2) the recording of legends which had to do with the sites, followed by detailed analysis of their content. Similar traditional materials recorded by Riesenbergs during field-work in 1947-48 and additional materials recorded and published by earlier ethnologists were subjected to the same kind of analysis and variant versions were discussed.

As part of the same work, a long handwritten document written by a Ponapean named Luelen some time before World War II, which contains a great deal of information of a similar nature and which had been partially translated during earlier field work, was studied with the aid of interpreter and informant and the translation was completed.

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In addition, ethnological information of a broader nature was obtained in order to relate the ruins to their general ethnographic background of Micronesia and in order to obtain requisite details for the completion of a diorama of the site of Pan Kedira, for permanent exhibition in the newly opened Hall of Peoples of the Pacific in the Museum of Natural History, U.S. National Museum, Smithsonian Institution, Washington, D.C.

## 2. Archeological

The archeological work was based on the following sites in the Nan Matol complex:

- a. Pan Kedira - complete and thorough clearing of site, even to removal of large hibiscus trees and all ground cover, but without removal of coconut and breadfruit trees. Detailed maps were made of all features of the complex of compounds. Excavations were made in all of the hearths to obtain charcoal for Carbon-14 dating and to obtain a cross section of food habits of people. These materials from the hearths consisted of bones of turtle, fish, and dog, and a variety of shells. A detailed study and classifica-

tion of the types of food will be made and a percentage analysis made of each 10 cm. level of hearth refuse to see if there was a change in food habits. European trade goods in some hearths suggest re-use of the site in recent times over the last 100-150 years. These materials do not appear to be related to the initial construction of the site. Tests were made in the fill to determine the depth of artificial construction of the site, depths of the soil in the agricultural areas of certain compounds and to understand the details of construction of site and the use of columnar basalt, coral, and waterworn basalt cobbles and boulders. Minute details of architectural construction were recorded in notes and hundreds of black-and-white and color photographs in order to present plans to the Exhibits Division of the U.S. National Museum to reconstruct a diorama of this site for the Hall of Peoples of the Pacific.

- b. Kalapwel - small site on southwest side of Pan Kedira figuring in all the ethnological data about Pan Kedira. Completely cleared, mapped and studied. Excavations were made, where possible, as in Pan Kedira.
- c. Idehd - small site southeast of Pan Kedira of importance in all the ethnological information about Pan Kedira. Site completely cleared except for removal of two large trees that are not damaging the site at the moment. Detailed archeological map made and excavation of mound consisting of burnt coral and ash, in search of charcoal for dating of the site. Mound trenched on back side to base. All excavations backfilled and mound restored to original contours.
- d. Peikapw - large site northeast of Pan Kedira mentioned in the ethnological information about Pan Kedira, especially with reference to a reflecting pool. This feature was found, cleared, mapped and photographed. The site had never been cleared in recent years, so the growth was tremendous, with some trees measuring several feet in diameter, and many

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- d. Peikapw - large site northeast of Pan Kedira mentioned in the ethnological information about Pan Kedira, especially with reference to a reflecting pool. This feature was found, cleared, mapped and photographed. The site had never been cleared in recent years, so the growth was tremendous, with some trees measuring several feet in diameter, and many walls and features had been badly disturbed by tree growth. All major walls and structures were cleared completely; all features were examined; low areas were inspected before trash was deposited in the site. This site was not completely cleaned; however, it was the last one worked and the previous four weeks of fieldwork made it possible to recognize features with a minimum of effort and clearing. Detailed maps were made of the entire site and photographic coverage made of all major features. Many structures were uncovered and revealed that had not been previously mentioned in the ethnographic lore about the site.
- e. Pein Mueik - small site between Pan Kedira and Kalapwel that was completely cleared and then mapped and photographed. This site, like both Wasau and Reitik, fit a consistent pattern of house platform structure inside a small islet with entrances in the wall.

- f. Wasau - large site on northwest side of Pan Kedira that was cleared and studied in detail in conjunction with the adjoining islet site to the West, called Reitik. This site revealed additional information on the settlement pattern of the habitation sites and has much in common with Pein Mueik and Reitik. Detailed maps and photographic record made of the site.
- g. Reitik - small site on the northwest side of Pan Kedira west of Wasau completely cleared, mapped and photographed. This site, like Pein Mueik and Wasau, falls into the distinct pattern of habitation sites with house platforms inside an inclosure that has entrances in several of the walls.
- h. Nan Dauas - This major site was cleared extensively in a manner similar to Pan Kedira and Kalapwal. An accurate archeological map was made of the site and a study made of the various features. Excavation of the central, inner burial chamber was made with fine screens to recover fragments left behind by the hundreds of people who have dug and looted this burial chamber beginning with the first Europeans on Ponape to the present-day tourists visiting the site. An effort was made to recover completely all these fragments in order that these few remaining artifacts could be preserved in museum collections. As at all sites, extensive photographs were made in both black and white and color of all features. Notes were made on those features of the sites that had been changed during Japanese occupation, such as pathways and steps. Considerable time was spent in removal of several hibiscus trees that were growing out of the walls and threatening severe damage to the walls.  
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#### RECOMMENDATIONS:

These ruins of Nan Matol are unique in the Pacific. When a thorough study is made of the data gathered, and comparative materials are examined from other areas of the Pacific and Southeast Asia it is hoped that definite answers can be given to the two important questions: (1) Who built the ruins; (2) How old are the ruins? In the meantime, and in the interest of protection of these unique structures, the following recommendations are made:

1. The entire complex of ruins of Nan Matol and all other ruins on Ponape should be declared by the Trust Territory "historical sites" that should be protected by law.
2. The Trust Territory Code should be amended to designate these structures and others of a similar type as "historical sites" that are to be protected under penalty of fine and/or imprisonment and prohibiting the molestation, defacement, removal or excavation of these structures. In the interim, Ponape District laws might be enacted to give protection to the structures in Ponape District. These laws should apply to all persons who live in the Trust Territory or visit it.



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3. The Ponape District Government should mimeograph a brief statement about the protection of the ruins of Nan Matol and others and distribute them to every person (especially non-Micronesian tourists) coming to Ponape so they are aware of the scientific and historical significance of the sites and therefore will not excavate, deface, disturb, or litter the sites, or remove objects, artifacts, stones, shells or coral when they visit the sites. (Note: with the increased tourist traffic to Nan Matol from Kolonia and the discovery in our work of the quantity of beer and soft drink cans and flash bulbs and other litter at Nan Dauas, this point needs immediate attention.)
4. The ruins are in serious need of stabilization and protection against nature. This point is most serious at Nan Dauas, Pan Kedira, Idehd and Kalapwel of the sites cleared and studied by the Smithsonian Institution group. At Nan Dauas the Northeast corner is in danger of total collapse if the major boulder at the base is shifted out of place from root action. This can be protected by a cement footing with reinforced steel and it was estimated by Public Works Officer George Hartung that if the District Government provided the cement the additional costs of labor, forms, steel and installation of the concrete would cost about \$400.00. The Metalanin Housing Cooperative was also consulted and would be able to conduct the work. It is recommended that this matter be given serious consideration for immediate attention.

The main destroyer of the ruins is hibiscus. On Nan Dauas, Pan Kedira, Idehd and Kalapwel these trees were cut down and as many of the major roots as possible cut off in areas where they were damaging walls. However, it is recommended that the District government allocate some funds for chemical destruction of these trees growing on or out of walls at the four mentioned ruins. It is also recommended that these four sites be kept clean of major growth (exclusive of the bananas, coconuts and breadfruit trees that do no damage to the ruins) annually. Although the rate of growth is not exactly known, it is estimated that if the District Government could budget annually

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5. The Trust Territory Government should request the U.S. National Park Service of the Department of Interior to take an active interest (at least on an advisory and consultive basis to begin) in the preservation and stabilization and study of the archeological and historical sites of Ponape and other localities in the Trust Territory. Due to the similar environmental conditions and cultural remains perhaps this program might be connected with the National Park Service Branch in Hawaii.

6. Pensile Lawrence, the Ponapean who is the Assistant Anthropologist, should serve as liaison on all matters of an archeological nature on Ponape.
7. Efforts should be made to obtain a travel scholarship for Pensile Lawrence in order that he might visit the United States for approximately a ninety day period to visit various museums, archeological sites, and the Smithsonian Institution in order that he might familiarize himself with the problems of small museums and the stabilization and preservation of archeological sites. With the concurrence of the High Commissioner, the Smithsonian Institution field party will be glad to cooperate in helping secure such a grant for a time convenient to the Trust Territory and the Smithsonian Institution and other museums and organizations.
8. As part of a future archeological program for Ponape efforts should be made to conduct a scientific survey of all the types of archeological sites in the various districts, with a brief statement of the nature of the site, its relationship to other sites, location, etc. Such a reconnaissance would be most useful in planning future archeological research and in extending the comparative data derived from this study of eight sites in the Nan Matol complex.

On behalf of the Smithsonian Institution we wish to thank you and all your staff on Ponape for the interest, enthusiasm and cooperation that they showed us throughout our fieldwork. It is hoped that this research project may stimulate other such programs and bring official attention to the importance of the archeological and ethnological data still available on Ponape and other Pacific Islands. The work which we have carried out at Nan Matol is to be regarded as preliminary to a larger study which, it is hoped, will be undertaken in the future by other scientists, which would include in its scope not only the remainder of the Nan Matol structures, but also the many sites on the mainland which remain unexplored. The apparently related structures of Kusale should also be similarly investigated.

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A complete report of the work will be prepared in the future for publication in one of the various series of the Smithsonian Institution. When available we shall notify you in order that you and Trust Territory personnel may obtain copies. In the meantime we shall keep you informed of progress of the study and would be delighted to cooperate in any way that we can to aid you in carrying out the various recommendations.

*S. H. Rosenberg*

Saul H. Rosenberg

*Clifford Evans*

Clifford Evans

*Betty J. Meggers*

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