Louisiana

Archaeological

Survey and

Antiquities

Commission

September 10, 2019 Meeting

The Louisiana Archaeological Survey and Antiquities Commission met on Tuesday, March 10, 2020, at 1:30 p.m. in the 4th floor conference room, 1051 N. 3rd Street, Baton Rouge, Louisiana.

# Members Present:

Dr. Chip McGimsey

Dr. George Riser

Dr. Mark Rees

Mr. Mark Hogan

Ms. Kimberly Walden

Mr, Thurston Hahn

Mr. Ray Berthelot

Dr. Heather McKillop

# Members Absent:

Ms. Kathe Hambrick

Ms. Pat Arnould

# Others Present:

Ms. Aline van den Bold

Dr. Valerie Feathers

Ms. Emily Dale

Dr. Rebecca Saunders

Ms. Abbie Bleichner

Dr. Brooks Ellwood

Mrs. Suzanne Ellwood

Ms. Karla Oesch

Mr. Conner Flynt

Mr. Ken Tremblay

Ms. Dee Scallon

Dr. Rachel Watson

# Welcome & Introductions

The Chair, Dr. Heather McKillop, called the meeting to order at 1:35 PM. Dr. McGimsey took the notes for meeting.

Dr. McKillop noted in her welcome that the 4th International Congress of Salt conference will be held at Louisiana State University on Oct 7-11, 2020. Dr. Rachel Watson, Dr. Ashley Dumas, and Dr. McKillop are the conference organizers. The conference will include a field trip to Avery Island. Dr. McKillop also reported that the new PhD degree in Anthropology will officially begin in the fall 2020 semester. A number of doctoral assistantships will be available as well.

Everyone at the meeting introduced themselves.

**Approval of Minutes**

**MOTION:** *A motion was made by Ms. Kim Walden and seconded by Mr. Ray Berthelot, to accept the minutes of the September 10, 2019, Antiquities Commission Meeting. The motion carried unanimously.*

The regularly scheduled December 10, 2019 meeting of the Commission had been cancelled due to lack of business before the Commission.

# Old Business

There was no old business.

# New Business

Division Update

Dr. McGimsey introduced Abigail Bleichner who joined the Division in early March as the Section 106 reviewer. In time, she will also assume the responsibility of liaising with individuals who contact the Division with information about sites and cemeteries. He also noted that at this time the information is that the Division’s budget for FY 20/21 will remains about the same as the current year. There was discussion of the online Section 106 submission system that the Division is developing in consultation with South Central Planning.

LSU Campus Mounds permit update

In December 2017, the Commission permitted a proposal by Dr. Brooks Ellwood and Dr. Becky Saunders of Louisiana State Museum to excavate a 1x2 m unit into Mound B, LSU Campus Mounds (16EBR6). Subsequent to this work, Dr. Ellwood has undertaken intensive investigations of both mounds using available data and samples. His analysis and interpretations have been presented in a variety of contexts and resulted in considerable coverage in public media. As a result of this public interest, Dr. Saunders and Dr. Brooks were asked to present their results to the Commission.

Dr. Brooks presented the results of his interpretations first. His presentation began with an overview of his work in archaeology. His current interpretation of the history of the two LSU campus mounds is that construction began around 11,000 BP and continued episodically until approximately 8,200 BP. Construction ceased then and was not resumed until approximately 6,000 BP. This second stage of construction continued until approximately 4,500 BP, at which time the mounds were complete. This interpretation is built upon an extensive dataset of 29 radiocarbon dates. He noted that for the initial mound stage all of the out-of-sequence dates are actually earlier than the interpreted age for that strata, and that none post-date 8,200 BP.

Dr. Brooks discussed the stratigraphy and what he has identified as “ash beds” within the deposits. Many of the radiometric samples came from these ash beds. His collaborators have examined the phytoliths within the ash beds and identified them as primarily from reeds. The density of phytoliths is extremely high, with most samples having at least 100,000 per gram of sediment. Some samples have up to 3 million phytoliths per gram.

Dr. Brooks concluded by noting the then Governor Huey P. Long was responsible for preserving the campus mounds when he helped prepare the original concept map for the LSU campus in 1927. The mounds are set aside as the ‘indian reservation’ on the 1927 campus map.

Dr. Saunders disced the results of the excavation of the test unit in the top of Mound B undertaken in the summer of 2017. They were only able to get down about 1 m in the time available due to the very hard and dry sediment. No artifacts were found, but one posthole was found that produced a date of approximately 900 AD. The excavation confirmed that the sediments composing Mound B are very different from those on Mound A.

Following the presentations, the floor was opened for questions. Dr. Ellwood provided further information on the phytolith sampling, noting that 95-98% of the materials in each sample are reed or cane. He also noted that many of the individual phytoliths appear burnt. Cane does produce a very hot fire, which is necessary since phytoliths require a temperature of 1800 degrees F in order to burn. He argued that the deposits originally interpreted as E horizon sediments were actually ash beds as they contained the highest densities of phytoliths as well as fragments of burnt bone.

Dr. Ellwod noted that remote sensing did not identify any large anomalies in Mound B. It did identify one large anomaly in Mound A, which was explored in an excavation in 2012. Dr. Ellwood argues that that anomaly had to be been the result of a very hot fire. However, the archaeologists who excavated the test unit into the area of the anomaly did not identify any fired sediments that would reflect a fire of that temperature.

Dr. McKillop asked about the ‘osteons’ that Dr. Ellwood reported in the samples. Dr. Ellwood replies that these are elements of all mammalian bone structures. Dr. McKillop clarified that they appear generally in the long bones of larger mammals. Dr. Riser noted that when cane burns, it can burn explosively and distribute fragments over a wide area. Dr. Ellwood noted that the high cane phytolith counts occur in those strata that he interprets as ash beds.

Dr. Rees noted that the Middle Archaic mounds, and specifically the LSU Campus Mounds, are important, and that is their age is older than currently believed that would have national significance. There was discussion of the dates from the mounds, with Dr. Ellwood explaining that some of the dates were obtained from phytoliths. All the dates are AMS samples and were run by Beta Analytic. Many of the dated samples were taken from the ash beds. It was noted that a date from the 2012 excavation into Mound A came back at 5,900 BP. Dr. Saunders noted also that the original dates from the site were obtained from submound and redeposited A horizon mound fill contexts. Dr. Ellwood noted that all of his dates came from two cores, one through each mound.

Dr. Rees asked if it would be possible to read a copy of Dr. Ellwood’s paper on the mounds. Dr. Ellwood stated he is not willing to distribute it while it is undergoing peer review for print.

Mr. Berthelot asked whether there was evidence for other older mounds in the southeastern US. Dr. Ellwood replied that he suspects there are additional older mounds around.

Ms. Dale asked if any artifacts were found during the excavations into each mound. Dr. Saunders replied that no diagnostic artifacts have been recovered, only a handful of chert items from Mound A, and none from Mound B. This includes the 1980s testing around the mounds. She noted that over the years, Dr. Bill Haag and Mr. Neuman examined many excavations across the campus and never observed any artifacts.

Dr. McKillop asked if there were alternative explanations for the density of phytoliths in the mound samples. Dr. Ellwood replied that they did sample loess from an off-site exposure near Government Street; the phytolith density was about 100 per gram. Dr. McKillop and Dr. Saunders noted that there is a natural phytolith “rain” all the time, and that this line of research is common in meso-america. Dr. Ellwood noted that he is not aware of any studies that have produced the densities of phytoliths that he is seeing in the mound samples.

Dr. Rees asked about the ‘Clovis comet’ that occurred around 12,900 BP and a major burning event that accompanied that impact; the issue is whether older carbon is being included in a younger mound. Dr. Ellwood replied that the curve of the dates suggest nearly all fall in line for both hypothesized mound construction stages. He suggested that the mound builders were probably living in the floodplain at a time of major environmental and climatic change as sea level rose and northern glaciers retreated.

Dr. McKillop noted that mound construction would have begun around 11,000 BP in Dr. Ellwood’s model. She indicated there was still uncertainty around the presence of osteons and whether these represented human cremations, and asked if there were alternative explanations for their presence. Dr. Ellwood’s response was not recorded in the notes. Dr. Rees asked how it is possible to distinguish between ash and a naturally formed E horizon. Dr. Saunders noted that she had talked with Dr. TR Kidder about this question. They had noted the original identification of an ‘ash bed’ underneath Mound B at Poverty Point and more recent interpretations that it was more likely an E horizon. This would need to be reexamined at that site, along with testing for the presence of phytoliths. Dr. Ellwood stated that for him, the primary datum is the abundance of cane/reed phytoliths, and he discussed how the numbers presented were obtained. He also noted that radiometric dates from both charcoal and phytoliths from the same ash bed came back with similar ages.

Mr. Hahn asked if the pre-mound surface at the site is more-or-less the same elevation as the surrounding area. There was general discussion about this issue noting the general level topography of the LSU campus area. This led to some discussion about the efforts LSU is undertaking to develop a new master plan for the LSU Campus Mounds.

Dr. McKillop noted that the Louisiana Archaeological Survey and Antiquities Commission supports research at the LSU Campus Mounds. She thanked Drs Ellwood and Saunders for their presentations before the Commission.

# Other Business

There was no Other Business before the Commission.

***Motion:*** *Dr. George Riser moved that the Commission meeting be adjourned. It was seconded by Mr. Thurston Hahn. The motion passed unanimously.*

The meeting adjourned at 3:35 PM.

