1983 MIDDLE ATLANTIC ARCHAEOLOGICAL CONFERENCE

PROGRAM AND ABSTRACTS

REHOBOTH BEACH, DELAWARE
APRIL 8-10
1983 Middle Atlantic Conference
April 8 - 10, 1983
Rehoboth Beach, Delaware

PROGRAM

Friday Afternoon (April 8)

1:30 Opening Remarks

Contract Archaeology in the Middle Atlantic

1:45 Introduction (June Evans, Chair)

1:50 Roads to Knowledge or Highway Survey: An Examination of Techniques and Methods for the Retrieval of Cultural Data - Maureen Kavanagh and Silas Hurry, Maryland Geological Survey

2:10 Archaeological Contracting Within the National Forest System of Virginia: A Report on Adequacy - Michael B. Barber and George Tolley, USDA Forest Service


2:50 Break (15 minutes)


3:25 Sermons in Stones - Louis Brennan, Pace University

3:45 The Gold in (the) Marshalltown - June Evans, The American University

4:05-5:00 Discussion: Cara Wise and Joe Dent, Discussants

Friday Evening

7:30 Fluted Points in the Middle Atlantic Region (William Gardner, Chair)

Saturday Morning (April 9)

General Session: Research in the Middle Atlantic

9:00 Introduction (Dennis Curry, Chair)

9:05 The Effects of Mid Post-Glacial Changes at Conowingo: A Stratified Late Archaic Through Late Woodland Site in the Piedmont Floodplain of the Lower Susquehanna River Valley - Joseph McNamara, Maryland Geological Survey


10:05 Experimental Archaeology in the Middle Atlantic - William Andrefsky, Jr., SUNY Binghamton

10:25 Break (15 minutes)


11:00 The Archaeology of Lums Pond State Park: An Evaluation of Settlement Models for the High Coastal Plain of Delaware - Cara Wise, Delaware Division of Parks and Recreation

11:20 Prehistoric Settlement Patterns in the Patuxent River Drainage, Maryland - Laurie Cameron Steponaitis, SUNY Binghamton

11:40 Archaeological Investigations at Patuxent River Naval Air Station, St. Mary's County, Maryland: Results of a Cultural Resource Survey - Dennis J. Pogue, Patuxent River Naval Air Station, Department of Navy

Saturday Afternoon (April 9)

Late Woodland Socio-Cultural Evolution in the Middle Atlantic: A Search for Variety and Its Explanation

1:15 Introduction (Jay Custer, Chair)

1:25 Late Woodland in the Shenandoah Valley of Virginia: A View from the Stockade - William P. Boyer, James Madison University

1:45 Monongahela Late Woodland: A Current View from the Appalachian Plateau - James Herbstritt, William Penn Memorial Museum

2:05 Problems in the Archaeological Identification of Chiefdoms: An Example from the Virginia Coastal Plain - E. Randolph Turner, Virginia Research Center for Archaeology

2:25 Late Woodland Cultures of the Lower and Middle Susquehanna River Valley - Jay Custer, University of Delaware

2:45 Break (20 minutes)

3:05 Late Woodland in Southern Delaware: A Case Study - Daniel Griffith, Delaware Bureau of Archaeology and Historic Preservation
Late Woodland Cultures of the Middle and Lower Delaware River Valley and the Upper Delmarva Peninsula - Michael R. Stewart (Louis Berger, Int.), Chris C. Hummer (Temple University), and Jay F. Custer (University of Delaware)

An Overview of Cultural Diversity in the Lower Delaware River Valley: An Ethnohistorical Perspective - Marshall Becker, West Chester State College

Discussion: Fred Kinsey and William Gardner, Discussants

Saturday Evening (April 9)

7:30 Business Meeting

Sunday Morning (April 10)

Historic Archeology Research in the Middle Atlantic

Introduction (Sydne Marshall, Chair)

Pier Review: Cultural Resources in the New York Harbor - Sydne Marshall, Envirosphere Company

The Potowmack Canal at Great Falls, Virginia: Excavations at Lock One - Richard J. Dent, University of Maryland

Around the Powder Magazine at Fort Ontario, Oswego, New York: Military Maps and a Message from Moses - Douglas L. Bailey, SUNY Binghamton

Break (15 minutes)

Military Installations as Cultural Artifacts: Fort Delaware in the 19th Century - Ellis Coleman and Wade Catts, University of Delaware

Spatial Patterning of Seventeenth Century Plantations in the Chesapeake - Michael A. Smolek and Wayne E. Clark, Maryland Historical Trust

Investigating a Seventeenth-Century Village: Archaeology in St. Mary's City, Maryland - Alexander H. Morrison, II, St. Mary's City Commission
ABSTRACTS

CONTRACT ARCHEOLOGY IN THE MIDDLE ATLANTIC

Kavanagh, Maureen, and Silas Hurry (Maryland Geological Survey)

ROADS TO KNOWLEDGE OR HIGHWAY SURVEY ARCHEOLOGY: AN EXAMINATION OF TECHNIQUES AND METHODS FOR THE RETRIEVAL OF CULTURAL DATA

In this paper various systematic sampling techniques for preliminary site testing are discussed and compared. Examples include using post-hole diggers for interval testing and soil sampling, shovel test pits dug on 2.5 meter, 3 meter, 5 meter and 10 meter intervals, and controlled surface collections. Methods are compared in terms of the quality of information retrieved, inferences which can be drawn, and practical aspects such as time and cost considerations.

Barber, Michael B., and George Tolley (USDA Forest Service)

ARCHAEOLOGICAL CONTRACTING WITHIN THE NATIONAL FOREST SYSTEM OF VIRGINIA: A REPORT ON ADEQUACY

The Jefferson and George Washington National Forests have engaged in over a decade of archaeological contracting. General procedures for this work are discussed with particular problem areas such as adherence to specs, inspections, report review and timeliness of reports presented. Finally, an evaluation of the success rate of out-of-service contracting is discussed.

McCarthy, John P. (Temple University)

DIGGING THE CITY: URBAN ARCHAEOLOGY IN THE ERA OF CULTURAL RESOURCE MANAGEMENT

Urban archaeology has come of age over the last decade, both as archaeology in the city and as archaeology of the city. Archaeology's assumption that nothing of value survived the processes of urban change has given way to the realization that the city contains deposits of value to both historic and prehistoric archaeology. This realization has been fueled by archaeological research carried out in compliance with cultural resources legislation. This paper reviews how these research opportunities have shaped our understanding of the archaeological record in the city. How these resources can be used to advance our understanding of sociocultural variation and social change is discussed. Finally, the implications of these findings for the future management of urban archaeological resources are developed and suggestions for the direction of contract archaeology in the cities of the Mid-Atlantic are offered.

Cheek, Charles D., and Charles H. Leedecker (Soil Systems, Inc.)

REGIONAL RESEARCH PROBLEMS: CAN ARCHAEOLOGISTS AGREE

In conjunction with a survey of Fort Belvoir, Virginia, SSI conducted a telephone survey of a number of archaeologists working in Maryland and Virginia. These professionals were questioned about major archaeological
research problems and preservation strategies. In spite of the diversity in the problems of interest to the people polled, a fair amount of uniformity was revealed. After presenting the results a discussion of their meaning and usefulness is considered.

Brennan, Louis A. (Pace University)

SERMONS IN STONES

There are not two mutually exclusive directions within archaeology, culture history and problem-oriented archaeology. There is only a continuum of culture history out of which develops the concern with the problems that fall within the modes of culture change. During the past decade culture history, the tasks of which are the basic scientific ones of data collection (by discovery and observation), chronology, description, classification, quantification and synthesis, has been largely neglected. But how is it possible to understand culture change through time without a detailed knowledge of culture history? Cultural resource survey is only preliminary archaeology and adds very little to culture history; cultural resource management usually in effect strives to put off or abridge data collection. They do not promote the archaeological continuum.

Evans, June L. (The American University)

THE GOLD IN (THE) MARSHALLTOWN

It is certainly true that some good research has resulted from contract-related archeology in the Mid-Atlantic region. However, it is equally true that contract archeology has brought with it some problems. This paper identifies four problem areas in Mid-Atlantic contract archeology which need some attention. These concern dissemination of information, standardization of typologies, maintenance of professional standards, and interrelationship of historic and prehistoric archeology. Suggestions are made for dealing with these problem areas, with the ultimate goal of improving the quality of contract archeology in the Middle Atlantic.

GENEAL SESSION: RESEARCH IN THE MIDDLE ATLANTIC

McNamara, Joseph M. (Maryland Geological Survey)

THE EFFECTS OF MID POST-GLACIAL CHANGES AT CONOWINGO: A STRATIFIED LATE ARCHAIC THROUGH LATE WOODLAND SITE IN THE PIEDMONT FLOODPLAIN OF THE LOWER SUSQUEHANNA RIVER VALLEY

Excavations in the Lower Susquehanna River Valley were conducted in 1981 and 1982 at the Conowingo site (18CE14) in conjunction with the Archeological Society of Maryland’s Eleventh and Twelfth Annual Field Sessions in Maryland Archeology. The Conowingo site is an area historically rich in archeological remains located on one of the few remnant sections of Piedmont Holocene river terrace. Due largely to occasionally heavy discharge from the Conowingo Reservoir, what remains of the terrace is being lost through accelerated river bank erosion. Diagnostic artifacts from collections and excavation indicate a cultural chronology from Late Archaic through the Late Woodland. Analysis of one area near Octoraro Creek indicates that aboriginal settlement of the terrace edge first occurred during the warm/dry Sub-Boreal climatic period, which followed a period of rapid terrace growth attributed to the transition from the Atlantic period.
McDowell-Loudan, Ellis E., and Gary L. Loudan (SUNY Cortland)

THE GLEN HAVEN SITE: 1983 INTERIM REPORT

Glen Haven Site in the Eastern Panhandle of West Virginia, five miles upstream on the Potomac River from Harpers Ferry, was excavated as part of the Potomac River Archeology Survey, through The American University, in 1972. Thousands of artifacts were found in situ in this knoll top settlement, while many more were scattered through the plowed overburden. Current directions of analysis, especially of the faunal and lithic components, will be discussed. Newly acquired artifact collection photographs showing site materials found by others at the site will supplement studies of provenienced materials.

Cavallo, John A. (Louis Berger and Associates, Inc.)

FISH, FIRES, AND FORESIGHT: MIDDLE WOODLAND ECONOMIC ADAPTATIONS IN THE ABBOTT FARM NATIONAL LANDMARK, TRENTON, NEW JERSEY

The "Abbott Farm site", now the Abbott Farm National Landmark, has long been recognized as the location of the most extensive and intensively occupied Middle Woodland complex in eastern North America (circa AD 300 to AD 900). Based primarily on the enormous quantities of argillite raw material, argillite and chert blades and blade caches, several researchers have contended that during the Middle Woodland sub-period, the "Abbott Farm" functioned as a major regional center for the redistribution of argillite raw material and trianguloid preforms or blanks. In 1981, a Phase II cultural resource survey within the Abbott Farm National Landmark was initiated by Louis Berger and Associates, Inc. in advance of proposed construction of Interstate Highways 195 and 295 and New Jersey Routes 29 and 129. This project was funded by the Federal Highway Administration and the New Jersey Department of Transportation. As a result of this investigation, it appears that the Landmark's role as a redistribution center was more localized than had been previously thought and that the inordinate amounts of argillite, blades and blade caches, and other associated artifacts and features from presumed Middle Woodland contexts can be better explained as by-products of an intensification of the mode of production. That is, a specialized economic adaptation focused on the intensive procurement, processing, and storage of sturgeon and other anadromous fish resources. This adaptation resulted in the generation of food surpluses and attendant changes in resident Native American populations.

Andrefsky, William, Jr. (SUNY Binghamton)

EXPERIMENTAL ARCHAEOLOGY IN THE MIDDLE ATLANTIC

The analysis and interpretation of lithic debitage has been largely by-passed in the archaeological research of the Middle Atlantic area. This study outlines a model which can be used for interpreting site activities based on lithic debitage. Results of a bifacial replication experiment are used to develop a model which reveals tool manufacturing practices on prehistoric sites. The experiment provides data relating to size, shape, and class of lithic debitage. This information is modeled using an analytical program of concentration curves. The model is then applied to a sample of material from the Canfield site, a prehistoric occupation in the Upper Delaware Valley. Results of the study indicate that this method of analysis can aid in determining kinds of technological activities performed at sites and ultimately in determining site functions.
Ranere, Anthony J., and Patricia Hansell (Temple University)

AN APPROACH TO DETERMINING SITE DISTRIBUTIONS IN THE PINE BARRENS:
POWERLINE SURVEYING

Identifying archaeological sites in the New Jersey Pine Barrens in any statistically reliable way is made difficult by a nearly continuous ground cover and the subsurface location of most prehistoric remains. Previous interpretations of site placement have had to rely on purposive surveys and haphazard discoveries which have biased the record in favor of sites situated in zones adjacent to major stream courses and other perceived favored locales (e.g., thermokarst basins). Powerlines cut across the range of topographic zones in the Pine Barrens in a manner which may be considered random, at least in reference to the placement of archaeological sites. A powerline right-of-way provides a 30 meter wide transect with ground visibility decidedly greater than that normally encountered in the Pinelands. Moreover, construction and right-of-way clearance activities have disturbed the upper 20 cm of the soil profile, bringing to the surface evidence of human occupation which would otherwise be hidden.

A test of this powerline survey approach was conducted during the summer of 1982 by a Temple University field school team. A powerline transect 16 km long was surveyed in the drainage basin of the Great Egg Harbor River. Eight sites were located and evaluated using shovel tests and 1 x 2 meter test pits. The results of this pilot survey and testing program provide a basis for assessing the utility of the approach. They also indicate the intensity of survey effort needed to locate different types of archaeological sites.

Wise, Cara L. (Delaware Division of Parks and Recreation)

THE ARCHAEOLOGY OF LUMS POND STATE PARK: AN EVALUATION OF SETTLEMENT MODELS FOR THE HIGH COASTAL PLAIN OF DELAWARE

The recently completed archaeological study of Lums Pond State Park in New Castle County, Delaware, has provided an opportunity to evaluate the models for prehistoric settlement in the upper drainage areas of the High Coastal Plain developed by Custer for the Delaware State Plan for the Management of Prehistoric Resources. The data reliability for this area is consistently poor for all time periods so that there is a high probability that new data will result in alterations in existing models. A reanalysis was made of existing collections from previously identified sites. Survey within the park identified two previously unreported sites and eight potential site locations (based on the presence of fire-cracked rock or debitage or on topographic features). Three sites were tested. An analysis of the data from the eleven known sites indicates that while Custer's settlement models for the Late Archaic/Woodland I and Woodland II Periods appear to be reasonably accurate, minor adjustments may be needed in the model for the Paleo-Indian/Early Archaic Period, and more major changes may be needed in the settlement model for the Middle Archaic Period, at least for specific environmental settings.
Steponaitis, Laurie Cameron (SUNY Binghamton)

PREHISTORIC SETTLEMENT PATTERNS IN THE PATUXENT RIVER DRAINAGE, MARYLAND

This paper summarizes the preliminary results of systematic regional survey in the Patuxent River drainage, Maryland. Spatial analysis of the prehistoric data has shed light on the differential distribution of archaeological remains across the various environmental zones (estuarine, riverine, and uplands) found within the study area. Spatial patterning in the distribution of archaeological remains, in terms of both function and overall density, will be described. Major diachronic shifts in site distribution will also be outlined.

Pogue, Dennis J. (Patuxent River Naval Air Station, Department of Navy)

ARCHAEOLOGICAL INVESTIGATIONS AT PATUXENT RIVER NAVAL AIR STATION, ST. MARY'S COUNTY, MARYLAND: RESULTS OF A CULTURAL RESOURCES SURVEY

During the summers of 1981 and 1982 archaeological investigations were undertaken at the Patuxent River Naval Air Station, St. Mary's County, Maryland as part of a cultural resources survey of the 6500-acre facility. More than 40 archaeological sites were discovered via a variety of survey techniques: both an aquatic and pedestrian shoreline survey, random and systematic shovel testing, and systematic surface collection of 240 acres of the facility's cultivated fields. The results of the systematic surface collection, which utilized a relatively recently devised rapid assessment technique (RACY), will be emphasized here, as an opportunity to share both the information thus derived, and also to add to the growing body of evidence pointing to the benefits to be gained through such a survey technique.

An analysis of the prehistoric materials recovered via the controlled surface collection of 33 acres of fields surrounding one salt-water creek will be presented. Eight prehistoric sites have been discovered in the creek area, of which five are Woodland or primarily Woodland with smaller Archaic components; three are Archaic. Two of the sites are large habitations that were occupied over a long span, Late Archaic to Late Woodland; the rest appear to be relatively short term camps. Utilization of the RACY technique, primarily used for site identification, allowed systematic collection over a short period—over 30 acres in just three days. The data thus retrieved is detailed enough, however, to be manipulated in order to detect intrasite patterns of lithic debitage, tool types and projectile types. This analysis has allowed for identification of different activity areas and oyster disposal areas and for a more sensitive temporal separation of artifact concentrations.

BOYER, WILLIAM P. (James Madison University)

LATE WOODLAND SOCIO-CULTURAL EVOLUTION IN THE MIDDLE ATLANTIC: A SEARCH FOR VARIETY AND ITS EXPLANATION

LATE WOODLAND IN THE SHENANDOAH VALLEY OF VIRGINIA: A VIEW FROM THE STOCKADE (no abstract provided)
Herbstritt, James (William Penn Memorial Museum)

MONONGAHELA LATE WOODLAND: A CURRENT VIEW FROM THE APPALACHIAN PLATEAU

This paper reviews the Late Woodland manifestation defined in 1939 by Mary Butler as the "Monongahela Woodland Culture". Cultural expression for this Late Woodland/proto-historic entity centers in the Monongahela-Youghiogheny heartland of southwestern Pennsylvania and northern West Virginia. Current research suggests that the Monongahela culture sphere of influence was pervasive, extending over much of the northern Appalachians from the Ohio River southward into the Blue Ridge region. In this review, emphasis is placed upon patterns of settlement/community, subsistence and mortuary practice.

Turner, E. Randolph (Virginia Research Center for Archaeology)

PROBLEMS IN THE ARCHAEOLOGICAL IDENTIFICATION OF CHIEFDOMS: AN EXAMPLE FROM THE VIRGINIA COASTAL PLAIN

A major goal in anthropological research is the identification and explanation of observed variations in levels of socio-cultural complexity. This paper is concerned with the archaeological identification in the Virginia Coastal Plain of an intermediate level known as the chiefdom society. A review of early historical accounts dating to the first years of contact in the region clearly documents the presence of a complex ranked society known as the Powhatan chiefdom. Serious problems exist, however, when using solely archaeological data to document the presence of a chiefdom level of socio-cultural complexity in the region during the Late Woodland and Contact Periods. An examination of these difficulties indicates that similar problems are likely to exist for other regions in eastern North America, thereby potentially distorting related explanatory studies.

Custer, Jay (University of Delaware)

LATE WOODLAND CULTURES OF THE LOWER AND MIDDLE SUSQUEHANNA RIVER VALLEY

Both simple and complex social organizations are seen in the lower and middle Susquehanna Valley during Late Woodland times and the processes of evolution of more complex organizations can be observed over the course of Late Woodland times. Early in the Late Woodland Period, Clemson Island and Shenks Ferry cultures show hunter-gatherer adaptations with the addition of small-scale agriculture. Some possible agricultural hamlets and semi-sedentary village sites are present in the major floodplains with some hints of more complex organizations, possibly at a tribal level. By ca AD 1350, a shift to agriculturally based villages and hamlets is seen. Tribal level social organizations based on nuclear families as the basic production and consumption units are present. Stockades and other fortifications indicative of inter-group hostilities appear by this time. By the early 16th century these indigenous groups are replaced by non-local (Iroquoian) Susquehannock societies which exhibit tribal organizations with segmented matrilineages as minimal units of production and consumption.
Griffith, Daniel (Delaware Bureau of Archaeology and Historic Preservation)

LATE WOODLAND IN SOUTHERN DELAWARE: A CASE STUDY

The early Late Woodland in southern Delaware exhibits continuity in adaptation with the preceding Middle Woodland period, while important changes which define the period in the region as a whole become increasingly apparent during the period. Agriculture does not seem to affect the general adaptation and community patterning until late in the period, as a basically Middle Woodland pattern is evident in the early Late Woodland. Towards the end of the period, however, major sites appear to have been occupied all year. The extensive exchange systems and materially elaborate mortuary ceremonialism of the preceding period essentially disappear. The status differences, as interpreted from mortuary data during the Middle Woodland period, are not in evidence in the Late Woodland ossuaries of lower Delaware. As the Late Woodland progresses, there is increasing evidence of regional social upheaval as evidenced by shifting cultural boundaries and the appearance of buffer zones between groups on the lower Delmarva Peninsula and those to the north. The Late Woodland in southern Delaware can be defined on the basis of general cultural similarities within the area and the period, and by comparison with previous periods and similar manifestations in other areas. Yet, it is also marked by considerable internal variability.

Stewart, R. Michael (Louis Berger, Int.), Chris C. Hummer (Temple University), and Jay F. Custer (University of Delaware)

LATE WOODLAND CULTURES OF THE MIDDLE AND LOWER DELAWARE RIVER VALLEY AND THE UPPER DELMARVA PENINSULA

Late Woodland cultures of the middle and lower Delaware River Valley show a wide variability of social complexity and settlement/subsistence systems through time even though the societies of the area may all be equated with the proto-historic Lenape. In the extreme lower Delaware River Valley and most of the upper Delmarva Peninsula, there is little cultural change between the Middle and Late Woodland Periods. Hunter-gatherer subsistence systems, band-level organization, and mobile lifestyles are present up through European Contact. In the Fall Line area near Abbott Farm more complex organizations are present. Settlement pattern changes indicative of a shift to agriculture are present along with more sedentary habitation sites and some use of storage features. Between the Fall Line and the Delaware Water Gap, scattered semi-sedentary hamlets are present. Use of storage is limited and adoption of agriculture is late. Social organization is inferred to be at the complex band or simple tribal level.

Becker, Marshall (West Chester State College)

AN OVERVIEW OF CULTURAL DIVERSITY IN THE LOWER DELAWARE RIVER VALLEY: AN ETHNOHISTORICAL PERSPECTIVE

Studies of archival materials relating to the Lenape occupying the lower Delaware Valley during the period from 1600 to 1740 provide evidence for a wide range of behaviors used by each "band" in their interaction with the colonists. Major differences have been documented in the post-1740 relocation patterns of the Jersey Indians (south of the Raritan) on one hand
and the Lenape of southeastern Pennsylvania and northern Delaware on the other. These separations suggest that the bands on either side of the Delaware River maintained independent kin networks and cognitively were two separate units. These two groupings may correlate with Goddard's two linguistic groups.

Within southeastern Pennsylvania different bands had different responses to colonial population pressure. The petition of the Okehocking for a secure (surveyed) tract of land differs from all other approaches used by individual Lenape bands to stabilize their positions on the fringe of the colonists' expanding society. In addition to differences in choices made by specific bands, each individual appears to have been free to choose a mode of response to the changing situation in their homeland. The five different response modes identified, plus all the other aspects of cultural diversity among the Lenape, suggests a modern application of foraging lifestyles in which independence and personal autonomy led to wide utilization of variations on the primary adaptive strategy. The success of the Lenape in maintaining cultural integrity into the 20th century reflects the value of this cultural system.

HISTORIC ARCHEOLOGY RESEARCH IN THE MIDDLE ATLANTIC

Marshall, Sydne B. (Envirosphere Company)

PIER REVIEW: CULTURAL RESOURCES IN THE NEW YORK HARBOR

Derelict piers, structures and hulls in the New York Harbor provide a rich record of cultural and technological change in one of America's chief ports of entry. Data generated from a reconnaissance inventory of the Hoboken to North Bergen, New Jersey reach of the harbor contribute a unique view of changing cultural attitudes toward the Hudson riverfront. While industrial interests in the waterfront have subsided, a renewed appreciation of the waterfront's potential as prime residential and commercial land promises to once again change the riverine landscape. Contemporary concepts of significance and historical preservation will contribute greatly to the near-future look of New York Harbor's built environment.

Dent, Richard J. (University of Maryland)

THE PATOWMACK CANAL AT GREAT FALLS, VIRGINIA: EXCAVATIONS AT LOCK ONE

The Patowmack Canal was the first infrastructure waterway development project conceived of and built to link the eastern seaboard of the United States with the western interior. Organized and supported by George Washington, the canal bypassed falls or rapids at five locations in the Potomac River between the Port of Georgetown (now part of the District of Columbia) and points west. Under construction by 1793 the entire canal was finally completed in 1802. It ceased operations by 1828. This paper gives a brief history of the undertaking and then focuses on the recent excavations of a canal lock (Lock One) in the Great Falls, Virginia portion of the canal. These excavations recovered the only surviving lock gates and have also allowed accurate interpretation of this particular lock feature.
Bailey, Douglas L. (SUNY Binghamton)

AROUND THE POWDER MAGAZINE AT FORT ONTARIO, OSWEGO, NEW YORK: MILITARY MAPS AND A MESSAGE FROM MOSES

Fort Ontario is a pentagonal earthen fortification, erected by the British in 1759, but extensively modified in 1839 and c. 1870. The fort is one of the very last built according to design principles for military defense elaborated since the Renaissance. The extreme regularity, precision, and accuracy of line, angle, and volume of this and similar forts met functional ends in military service: defense against weapon fire and siege, ease of layout and construction, and facilitation of internal movement and communication. At the same time, regularity seems also to have satisfied certain aesthetic, symbolic, or cognitive ends.

This paper speculatively interprets patterns among variations in military technical drawings of the area around the Powder Magazine; all these drawings incorrectly depict spatial relationships there. In this context, the history of construction and modification of the Magazine and Fort Ontario are reviewed. Fort Ontario is heir to extensive documentation, cartographic photographic, and textual. These archival materials were used intensively to derive alternative models of spatial relationships in six major areas excavated within the fort. Excavations provided basic data for reconstruction.

Coleman, Ellis, and Wade Catts (University of Delaware)

MILITARY INSTALLATIONS AS CULTURAL ARTIFACTS: FORT DELAWARE IN THE 19TH CENTURY

Because of the planning process involved in their creation and maintenance, military installations present a unique emic view of the societies that created them. The high cost of their development does not allow their casual abandonment, and adaptive reuse in the face of changing military technology and societal values is common. Fort Delaware, located on an island in the Delaware River, was utilized throughout the 19th and early 20th century for a variety of purposes including the primary defensive fortification for the Lower Delaware River (1815-1861), a prisoner-of-war camp (1862-1865), and a secondary defensive fortification in the Coastal Defense Network (1870-1945). Alterations to the fort itself and changes in distributions of associated structures show these changing uses. Artifacts show changing provisioning decisions by the military that reflect varied uses of the fort and the social identity of its garrison.

Smolek, Michael A., and Wayne E. Clark (Maryland Historical Trust)

SPATIAL PATTERNING OF 17TH-CENTURY PLANTATIONS IN THE CHESAPEAKE

Recent research in Maryland has revealed consistent patterning of 17th century domestic site locations and artifact assemblages. The salient physiographic characteristics of a number of Maryland sites are compared and contrasted with 17th century sites in Virginia. Locational criteria are defined. Suggestions are made to help explain assemblage variation between sites of this time period. Intrasite spatial patterning is discussed using controlled surface collection data.
Since the summer of 1981, excavation has been underway in the center of Maryland's first settlement and seventeenth-century capital -- St. Mary's City (1634-1695). This work, funded by a grant from the National Endowment for the Humanities and the State of Maryland, has revealed the remains of the colonial community and traces of the earlier Indian village purchased in 1634. Historical records tell little about the location or characteristics of these settlements.

In the first season, the three-acre study area was intensively sampled to provide data for artifact distribution studies. The second season's work expanded the study area, doubled the sample size in specific locations, and began feature excavation.

In this paper, the first detailed maps of the colonial and Indian settlements are presented, and the growth of the English village is traced through the study of temporally diagnostic artifacts. Feature and artifact distributions are analyzed to provide preliminary insights into spatial organization and use in one of the earliest communities in English America.