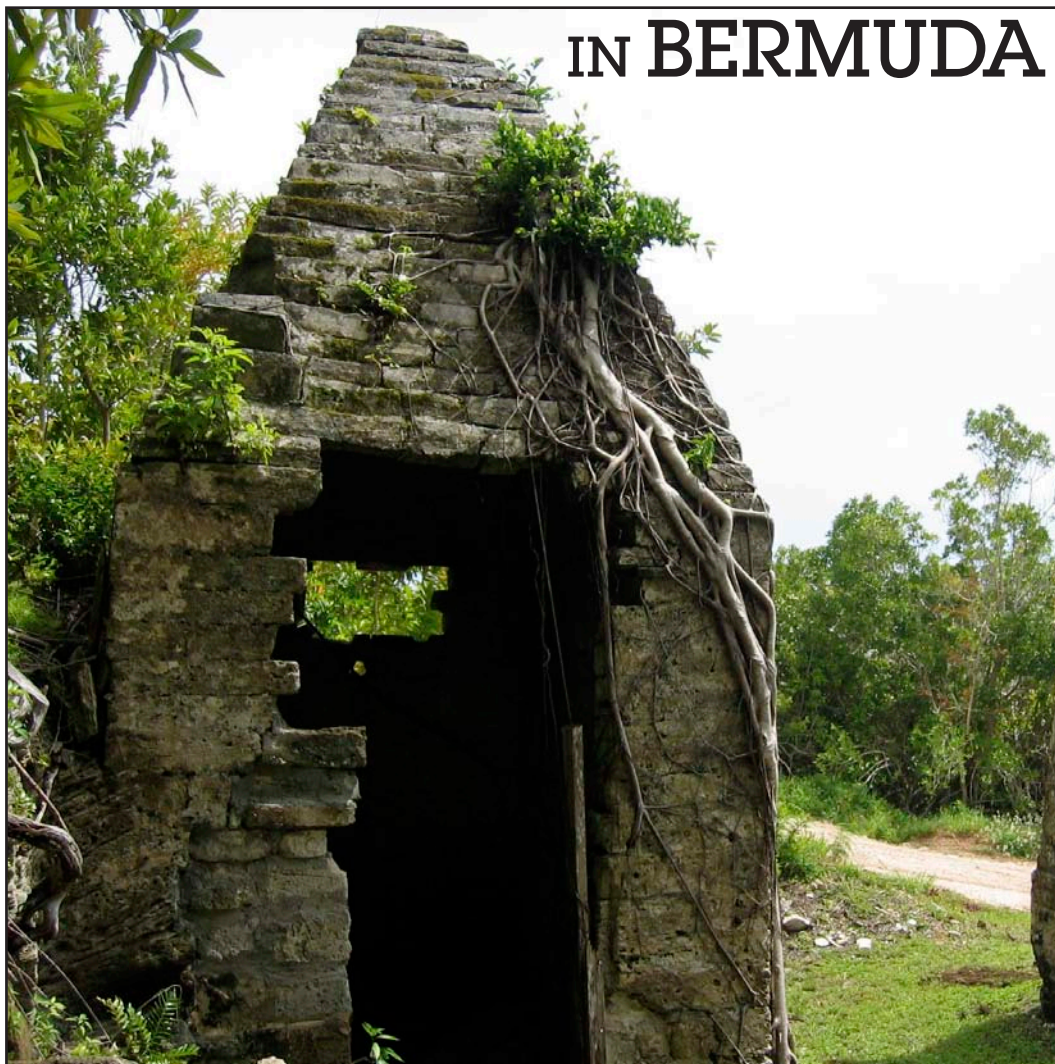


AN INTRODUCTION TO

Archaeology

IN BERMUDA



TEACHER RESOURCE GUIDE



ACKNOWLEDGEMENTS

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To protect Bermuda's unique natural & cultural heritage forever

Learning with the Bermuda National Trust AXIS Education Programme

The Bermuda National Trust's teacher resources focus on nature reserves and historic homes owned and maintained by the Trust, offering comprehensive resources and creative learning experiences for visitors, teachers and students. We provide first-hand experiences that cannot be re-created in the classroom. Guided tours can be scheduled with a member of our education staff for primary, middle and senior level classes. It is our hope that students will visit all Trust properties, beginning at primary 1 - 2, and experience repeated visits throughout later primary, middle and senior years. Repeat visits help students build on their prior learning and develop a deeper understanding of the concepts and terms associated with each site. Senior students are encouraged to visit each site to learn about the care and preservation of nature reserves and historical homes. Opportunities are available for senior students to participate in our AIM Programme, allowing them to volunteer their time caring for Trust properties, which can be applied to required community service hours.

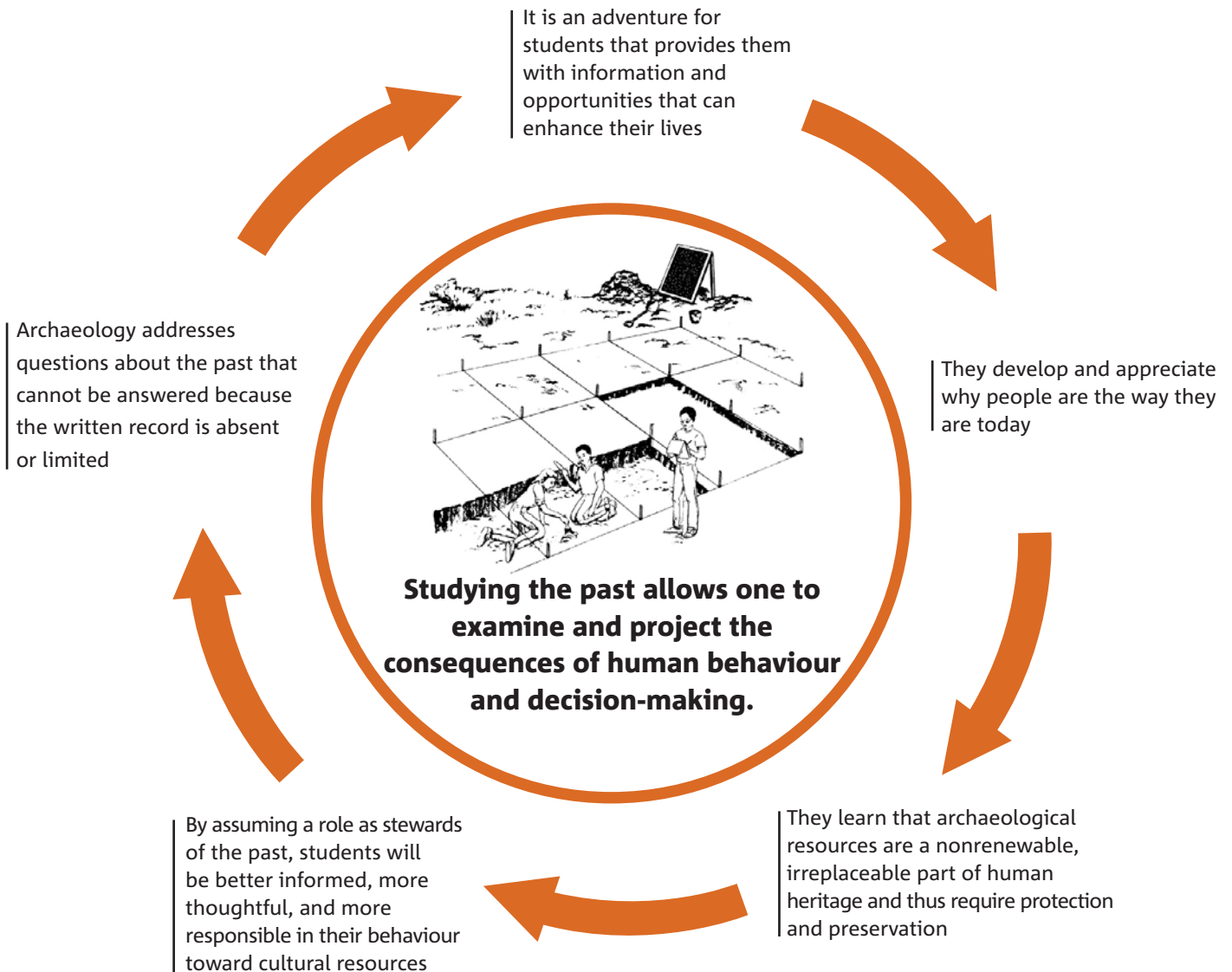


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Why should students learn about archaeology?

Archaeology addresses questions about the past that cannot be answered because the written record is absent or limited



Arranging a Class Trip/Teacher Resources

>Note to Teachers

Our goal is to make your students' field trip to the archaeology exhibit at the historic Tucker House in St. George's valuable and meaningful and to stimulate a life-long interest in history. While the activities suggested in this resource are noted for Primary 3-5 and Middle level 1, other grade levels may enjoy visiting the exhibit and learning about archaeology, experiencing a simulated 'dig box' and seeing the artefacts that were found in an excavation and on display. Primary sources have been used as a springboard for developing activities which we hope will engage young minds and bring history to life. Reading through the background information will assist you in answering the more probing questions from inquisitive students, and help create additional activities that extend the learning associated with the archaeology exhibit and activities.

There are a few options to support you before and after the field trip:

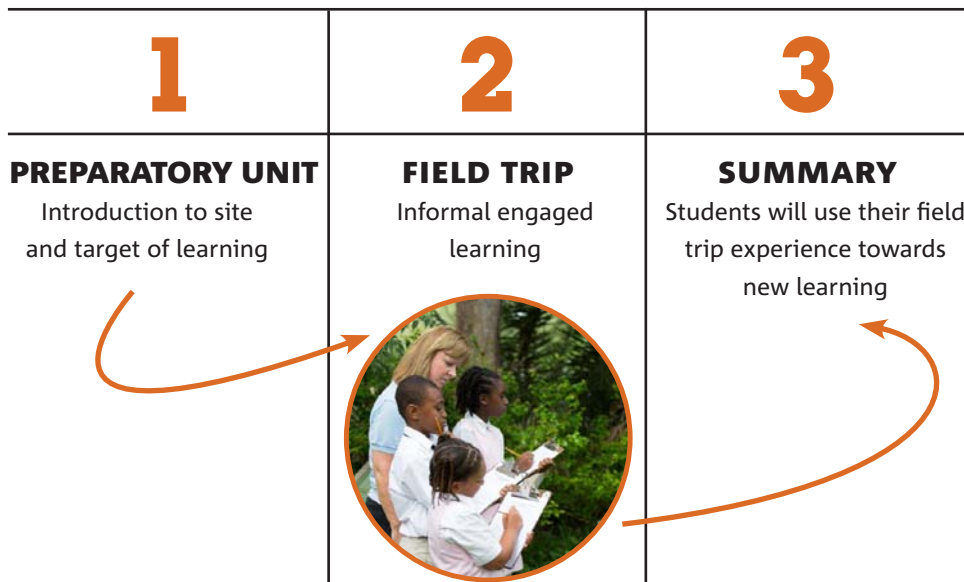
Teacher workshop

We can provide a 'group teacher workshop' in our AXIS Education Classroom prior to a field trip with your students. A minimum of 10 teachers is required, maximum group size is 15. The time allotted for the workshop is 1.5 to 2 hours.

Obtain a copy of 'An Introduction to Archaeology in Bermuda' Teacher Resource Guide and network with other teachers to brainstorm ideas for additional activities that can be offered to promote student learning before and after the class field trip. This resource guide is also available to download from our website.

Three-Part Learning Experience

We offer a three-part learning experience. After booking a field trip, a Bermuda National Trust educator can provide an introductory lesson for your students in your classroom, providing information about the site. This is an excellent preparation for the field trip which builds on students' prior knowledge and is helpful for engaged learning during the field trip. After the site visit a follow-up lesson can also be scheduled. Students will be guided in a review of their field trip and summarise their new knowledge.



The Significance of the Archaeology Exhibit at Tucker House and what students should know before their visit:

The artefacts at the archaeological exhibit allow you to picture how people lived there. They are evidence of what the families ate, what kind of household items they used and what style of clothing they had. The exhibit provides a window into the lives of the occupants of Tucker House.

Please prepare your students and adults for a visit to Tucker House:

- The items in the exhibit are from the past and most are irreplaceable. We ask visitors to look with their eyes and not with their hands.
- If your students would like to visit the upstairs floor of Tucker House please understand that light, including sunlight and flash light used in photography, fades the colours in the paintings. Cameras may only be used outside in the grounds.

PRE FIELD TRIP ACTIVITIES

These activities focus on introducing the students to the science and methods of archaeology. Select one of the activities for your class to complete during their visit. The activities can be modified to meet the needs of students.

FIELD TRIP ACTIVITIES

Students will begin their visit in the basement at Tucker House. They will learn the basics of an archaeological excavation, the simple tools that archaeologists use and examine artefacts that they will find in a simulated dig box.

POST FIELD TRIP ACTIVITIES

Activities listed in this section encourage students to learn further with the help of seven fun and engaging activities.

The activities provided focus on the Cambridge International Curriculum Key Stages 1 and 2, Primary Stages 3-5, Secondary 1 and Middle Stage 8. Curriculum links to activities are provided for integrating the Bermuda Ministry of Education's Science and Social Studies. While looking through the activities provided, teachers may also think of ways to integrate other subjects. The teacher's method of preparation and delivery will vary with students' needs and interests.

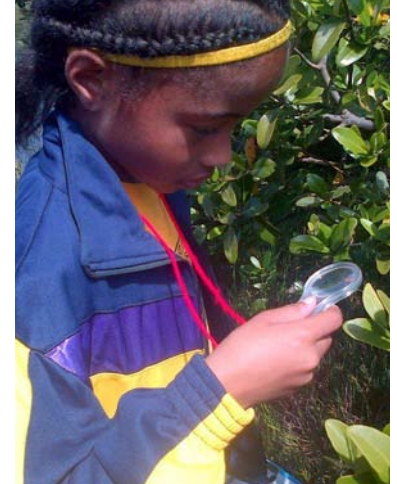
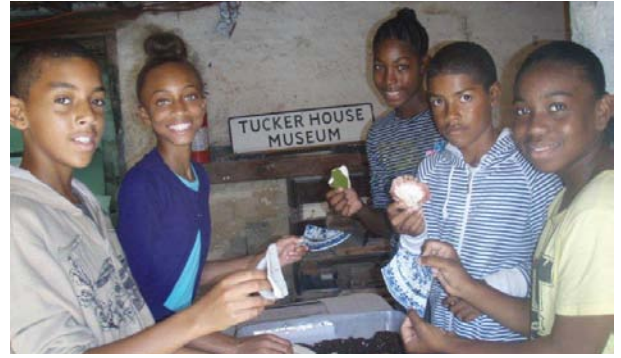
We continue to seek ways to improve our educational programmes and welcome suggestions for enhancing this resource and the experience for the children. Please contact us with any suggestions or comments.

The Education Team
Bermuda National Trust
education@bnt.bm • 236-6483

*** Scheduling a field trip to the Archaeology Exhibit at Tucker House**

To schedule a trip to the archaeology exhibit at Tucker House download and complete a school field trip booking form on our website, www.bnt.bm (found under the school tours heading) or copy the form in the back of this book. Return the form via email to: education@bnt.bm.

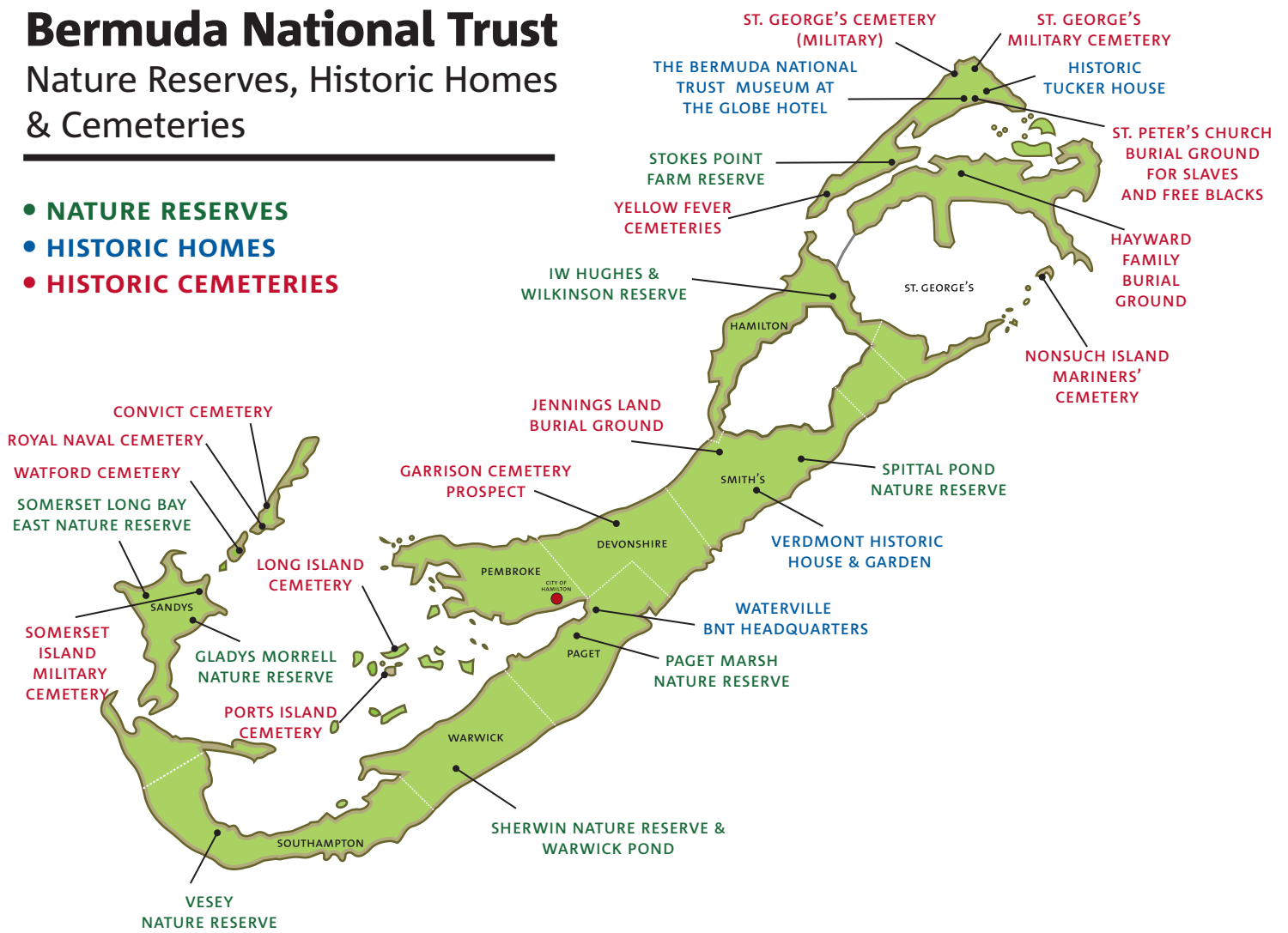
The ratio of guided tours is one adult for every ten children. Additional adults are welcome.



Bermuda National Trust

Nature Reserves, Historic Homes & Cemeteries

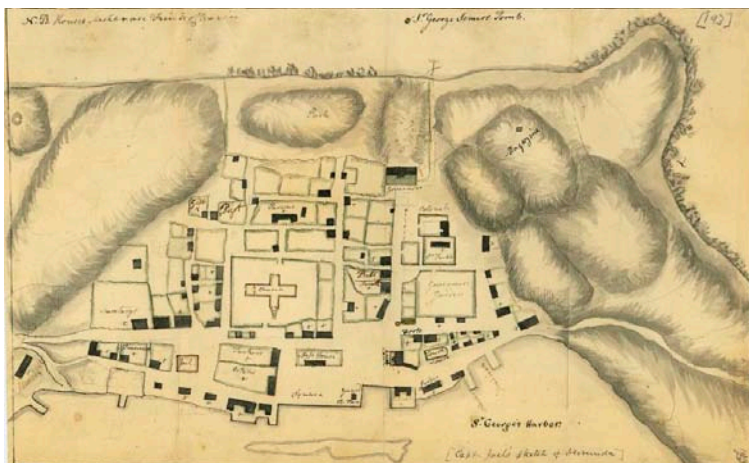
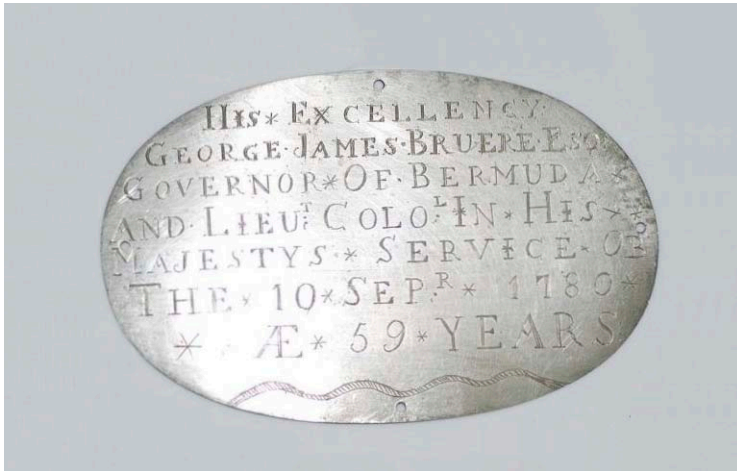
- NATURE RESERVES
- HISTORIC HOMES
- HISTORIC CEMETERIES



AN INTRODUCTION TO

Archaeology

IN BERMUDA



ARCHAEOLOGY IS THE STUDY OF THE HUMAN PAST THROUGH ITS material remains, its objects, buildings, and landscapes. It is a vital science that enables us to have a broader understanding of the human life from its origin to today. To do this, archaeologists draw on a diverse tool-kit of both scientific and humanistic approaches. This teacher resource guide is designed to help educators use the archaeological work being done in Bermuda to enrich the study of the past in social studies. This guide is divided into three parts: a basic introduction to archaeology, an overview of some important sites that have been excavated, an appendix with archaeology activities for your classroom and an artefact identification guide.

The literal translation of archaeology is from the Greek: *Arkhaios* “ancient” *Logia* “study of”. Thus archaeology encompasses the full breadth of the human past, from our origins as homo sapiens, to our complex 21st century society. One thing to stress to your students is that archaeology *is not the study of dinosaurs!* Archaeology is a discipline that falls between history and anthropology. Archaeologists are concerned both with the material conditions of important events in the past and the social and cultural relations among individuals, groups and societies as well as their relationship to the present. Archaeology then can be defined as:

The systematic study of our human past, based on the investigation of material culture and context, together forming the archaeological record. In other words, the study of human beings through their stuff.



Archaeology is a **systematic** science because it uses a variety of scientific techniques to understand the human past. The most important of these are the suite of excavation techniques discussed below to slowly and deliberately uncover the remains of the past. For instance, as a rule of digging, archaeologists excavate in regular squares arranged on a grid system, as illustrated through this working shot taken from an excavation completed at Whitehall in St. George's.



left:
Excavation on a regular grid system at Whitehall in St. George's

right:
A sampling of archaeological material culture encountered on Bermuda

below:
1952 Coca-Cola bottle found at Whitehall in St. George's

In other words archaeologists are concerned with the material culture of the past as it exists in the present and discovered through archaeological excavation. This includes a wide array of material including pottery, wine bottles, ceramic pipes and utensils.

Context is the position of an archaeological find in time and space as discovered through archaeological practice. It is defined by a number of factors and will be discussed later. One point to stress is that archaeological finds are practically **worthless** without their context. For instance, does a coca cola bottle tell you much about the past if you do not know where it came from?

Context consists of three primary pieces of information: matrix, provenance, and association:

- **Matrix** is the physical medium that surrounds the archaeological find, whether it is sand, clay, or limestone.
- **Provenance** is the 3-D location of an archaeological find.
- **Association** is the relationship between archaeological finds on a given site. Together these factors create the context for the archaeological record.

Goals of Archaeology • Archaeology has four primary goals:

1. TO DESCRIBE CULTURE HISTORY

Culture History is the events of the past as they relate to the physical materials. For instance on Bermuda archaeologists have successfully described the physical evolution of the dozens of forts that ring the island. This evolution has then been linked to the broader strategic position of the island in the Atlantic world.

2. TO RECONSTRUCT PAST LIFEWAYS

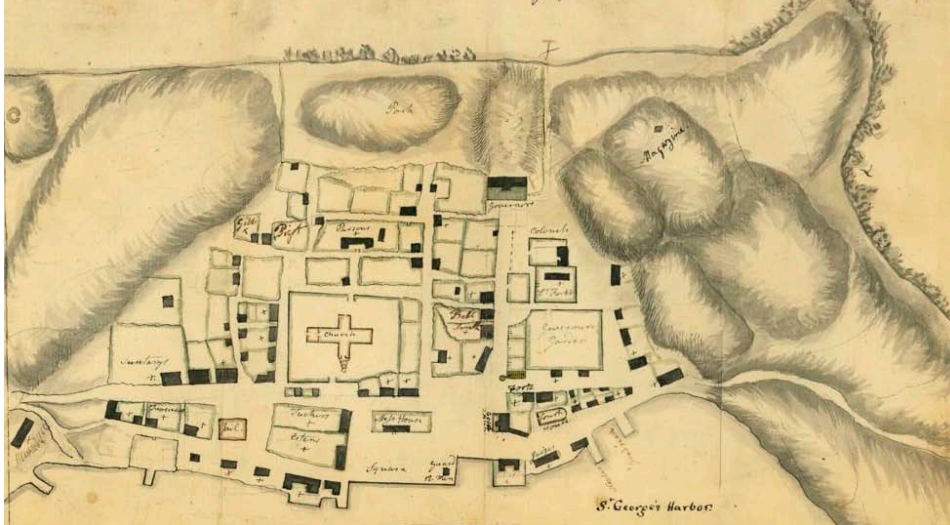
Archaeologists are also charged with the reconstruction of past lifeways, including the standing environment, foodways, and cultural practices. One great example of the reconstruction of past lifeways on Bermuda is the settler dwelling reconstruction at Carter House on St. David's. Here the architecture of the past is on display for visitors to experience the conditions of 17th century life on the island.



The Settler's Dwelling at Carter House

3. EXPLAIN CULTURAL PROCESSES

Archaeologists also explain changing cultural processes, specifically the reasons why culture changes. For example in St. George's, archaeologists have plotted how the town changed as a result of Bermuda's Maritime Revolution. They have demonstrated how the 17th century capital was merely a symbolic capital with little commerce but then was transformed into a patchwork of warehouses that were at the very centre of the English Atlantic World during the 18th century.



left:
18th century St. George's from the Joell spy map

below"
17th century St. George's from the John Smith engraving



4. PRESERVE AND INTERPRET THE PAST

Finally, archaeologists are tasked with preserving and interpreting the archaeological record. This entails the excavation and reporting of archaeological research in an ethical way and providing a means for long-term care and storage of artefacts. Archaeologists are also charged with providing a means through which the public can access, be enriched by and understand the archaeological past, whether it be through public lectures, reporting, publications, or museums. An excellent example of this is the partnership of archaeologists at the Jamestown living history museum.

The Archaeological Record

Archaeologists study the archaeological record – the distribution of materials associated with human activities distributed on and under the surface of the earth. The archaeological record comprises four categories of data: artefacts, ecofacts, feature and standing architecture.

below:
The reconstructed ships at the Jamestown Settlement living history museum



left:
A typical collection of archaeological data



Artefacts

Artefacts are objects made by humans. They are portable, and can be collected through archaeological recovery techniques and taken from archaeological sites. Examples: ceramics, wine bottles, or these stemware bases recovered from excavations at the State House in 2004.



left:
Two stemware bases from the State House privy in St. George's

right:
Fish bones recovered from Whitehall

Ecofacts

Ecofacts are materials from nature that are used or modified by humans through various activities. Examples include plants and animal remains such as these recovered from Whitehall.

Features

Features are permanent installations that have been constructed in the earth. Features cannot be removed from archaeological sites. Examples include hearths, middens (trash pits), and postholes, such as the example below of a posthole at Verdmont.

Standing Architecture

Standing architecture is above-ground buildings that intersect with archaeological landscapes. Examples: temples, pyramids, domestic houses. In Bermuda there is a wide array of standing architecture, such as this buttery from Honey Hill in Paget.



left:
Posthole at Verdmont

right:
Buttery at Honey Hill in Paget

This brief introduction has introduced you to the basics of archaeological research, and the components of the archaeological record. What follows is a brief outline of 6 sites that archaeologists have studied here in Bermuda.

Significant Excavation Sites in Bermuda

SMITH'S ISLAND ARCHAEOLOGY PROJECT

ST. GEORGE'S HARBOUR

This multi-year project was initiated and lead by Dr. Michael Jarvis of the University of Rochester in 2010. Taking the entire 60-acre island as a collection of sites reflecting 400 years of Bermudian history, Jarvis seeks to identify and study all sites of human occupation, starting with the farmstead of *Sea Venture* castaway Christopher Carter and his mates Edward Chard and Edward Waters, occupied from 1610 to 1612. To date 23 sites have been found, including an early 17th century house, the 18th century whale house, a maritime quarantine hut, Smallpox Bay cottage, an 18th century mansion, several slave quarters, water catchments, tanks, limekilns, and quarries, and a collapsed cave complex. Excavations at the Oven Site have revealed a substantial timber-frame multi-room house dating to the early 17th century, with evidence of occupation by enslaved Native Americans. Thought to be the Carter, Chard, and Water's farm, the Cotton Hole Bight site was, unfortunately, heavily quarried in the mid 18th century, destroying evidence of occupation. 2013 excavations at the Smallpox Bay quarantine site revealed post holes indicating that an earlier timber structure predated the currently standing late 18th century stone ruin. In future years the University of Rochester field school will investigate the whale house, Forbes mansion, cave site and West End slave quarters as it trains students in archaeological field methods and historic research techniques.



left:
Smallpox Bay Cottage

right:
Oven Site trench looking west
Note the three large central post holes in the lower left, centre and right below the semicircular cut in the back wall

THE STATE HOUSE /4 PRINCESS STREET, ST. GEORGE'S



Archaeological work at the State House took place in 2005, 2009 and 2010. Work focused on the development of the building and the archaeological materials associated with civic life in the building. After Hamilton became the capital of Bermuda in 1815 the building was leased to a Masonic lodge and is still used as such today.

The State House was commissioned by Governor Nathaniel Butler and was completed between

1619 and 1621. The buildings Baroque style and prominent placement on a small rise on the eastern edge of the town centre made it a symbol of the Somers Island Company's administrative role on the island. The building served as the Sessions House, Court House, Council Meeting Hall and an all-purpose civic space.

An architectural and archival survey showed that the building went through several major renovations. The building as it appeared on the John Smith engraving probably only lasted for a dozen years. Its flat roof began to leak almost immediately. As altered over the years the building more closely came to resemble a piece of Bermudian architecture with a pitched roof and prominent entry porch.



above:
The State House prior to rebuilding in 1969

left:
The reconstructed State House today



left:
Excavation in the State House yard

right:
Excavation in the State House privy



left:
Glass stemware finds from the State House

right:
Tea cup with peacock motif



left:
'Onion-shaped' wine bottle base

right:
Stoneware, Elers-type

STEWART HALL /5 QUEEN STREET, ST. GEORGE'S



This impressive two-storey mansion was built around 1700 by merchant Walter Mitchell and was later home to Colonial Secretary George Tucker and silversmith John Trott Cox. In 1990 and 1991, Colonial Williamsburg archaeologists excavated inside the house's northern addition and in the adjoining garden to learn more about 18th century Bermudian trading patterns. A large stone water trough (filled in the 1780s) discovered in the garden shed light on slaves' domestic activities, while the discovery

of several sherds of Colonoware (African-made coarse earthenware), imported from the Carolinas or Caribbean, revealed black circum-Atlantic trading connections. Numerous sherds of Spanish, French, and Dutch ceramics indicate that merchant Mitchell was not a strict observer of British Navigation laws.

Buttons, pins, and beads excavated in the early 1990s have recently been reexamined to understand the lives of enslaved Bermudians in the 18th century. Archaeologists have used artefacts related to clothing and personal adornment to explore enslaved peoples' religious, cultural and economic practices. Small finds like these allow researchers to challenge and add detail to the written historical records that frequently exclude the experience of enslaved people.

The most startling discovery of the 1991 season was an unmarked grave predating the construction of Stewart Hall. Archaeologists found the body of a woman between the ages of 25 and 40, buried in a shroud (rather than coffin) under the stone water trough. Ploughing after the burial erased the grave cut. The burial apparently dates to the mid-1600s. Her skeleton has since been re-interred in St. Peter's churchyard.



above:

**Stewart Hall in 1991
(from the north east)**

prior to the excavation, in the garden adjoining the wall bordering Queen Street

left:

**Stewart Hall, 2013
(from the south east)**



left top:

**Stone animal feeding trough
within yard adjoining the wall**

Artefacts found within the trough suggest it was abandoned and filled in around 1780, while the artefacts in the layer upon which the trough was built suggest a construction date of the early 1700s, when Stewart Hall was erected.

left bottom:

**17th century female skeleton
next to Stewart Hall**

right:

**Drawing the female skeleton
to scale**



PHOTOS: M. JARVIS

ST. PETER'S CHURCH /33 DUKE OF YORK STREET, ST. GEORGE'S



Established in 1612, St. Peter's Church is the oldest surviving Anglican church in the English colonial world. While the site was first used in the 17th century, the current building is a mixture of 18th and 19th century architecture. Archaeological work at the site has contributed to understanding the religious history of Bermuda. In all, archaeologists have conducted three seasons of excavations at St. Peter's and have contributed to the knowledge of the site in two areas: a churchyard survey and explorations under the current church building.

Churchyard Survey

In 2005 Hilary and Richard Tulloch completed a survey of the inscriptions within the churchyard. Three years later archaeologists from Boston University and local volunteers undertook six weeks of excavations at various sites within the core of St. George's and completed a survey of all the memorials in the churchyard. The team created a map of all the stones in the yard, including those with no visible inscription, and transferred the data into a 3-D model. This model is integrated into the St. Peter's Church website for visitors to view.



Subterranean Chambers

Archaeologists also investigated two subterranean areas: the first in the 19th century church extensions to the church and the second in an east west space under the northern portion of the church.

The southern space was filled with early limestone headstones. It was surmised that this area was originally an open churchyard. As the church expanded to the south it was at the cost of the existing graveyard and the headstones that were intruding on the building's expansion were placed in this crawl space with the bodies sealed underneath the existing church. The space is divided into three. The middle section contained what appear to be the entry steps to the 1714 church. These brick steps are worn and seem to align with the structure of that period. The eastern chamber has a series of 26 stones that have been plastered (in recent times) to the foundation walls. These are some of the oldest stones remaining at St. Peter's. As a part of the preparation of the church for the 1953 royal visit some of the oldest and best-preserved stones were put on display for the Queen in the eastern chamber.

left:
St. Peter's Church

below:
St. Peter's Churchyard



left:
3-D model of the Burial Ground for Slaves and Free Blacks

The northern space runs more or less underneath the aisle of the 1713-1714 church with the oldest portion to the east of the current structure. This space was created by the 1950s restoration during which support foundation walls were placed in an east-west fashion some five feet apart creating a 2.5 foot high space underneath the floorboards. The archaeologists thought that if the far eastern portion of the structure was indeed the location of the original parish church then perhaps some of the postholes would still remain cut into the bedrock. The goal was to explore this area in search of any architectural foundations from the two timber-framed structures. Excavations began towards the eastern part of the area, removing the 18 inches or so of deposits underneath the floorboards. The first 2 foot unit yielded little except an uneven line of bedrock and what was left of a builder's trench for the 1950s wall. As archaeologists moved to the east however they began to uncover human remains.

The deposit then produced a human cranium in the southern end of the chamber, which appeared to be in its original place of burial and intact. After excavating to the east archaeologists uncovered the remains of a partially intact human skeleton. Lodged in the torso was a nameplate indicating this was the body of Governor George James Bruere (d.1780). On the northern side of the chamber archaeologists uncovered the coffin plate of Sir Jacob Wheate Captain (d.1783) of the HMS *Cerebus*, with part of a skeleton adjoining a square cut in the bedrock, which was interpreted as the Captain's grave shaft. Unfortunately, a 1950s-era cement wall bisected the shaft and only part of Sir Jacob's remains were recovered.

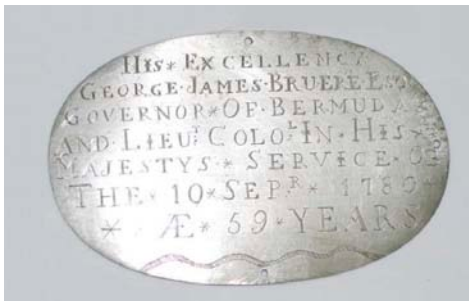


Articulated skeleton of Governor George James Bruere



left:
Excavations under St. Peter's Church

right:
Excavations under St. Peter's Church



left:
Governor Bruere's coffin plate

right:
Sir Jacob Wheate's coffin plate



left:
1714 steps of St. Peter's Church

right:
St. Peter's Church southern vault

WHITEHALL /12 CLARENCE STREET, ST. GEORGE'S



Whitehall is a Georgian-style mansion (implying a symmetrical façade) built by St. George's Mayor John Van Norden in 1815. The building symbolized Van Norden's powerful position in the town after the Government moved to Hamilton that year. Before Van Norden constructed his mansion, the Whitehall property consisted of four lots dating to the turn of the 18th century. Archaeological work at Whitehall took place in 2008 and 2010. The work was carried out by a partnership between the Bermuda National

Trust, the National Museum of Bermuda, Boston University, and the College of William and Mary. The excavations aimed to uncover the remains of St. Peter's Church original boundary wall, which today is on the south side of Church Lane. In the 17th century this boundary was probably somewhere on the Whitehall property. In 2008 excavations failed to uncover evidence for the church boundary wall; however, three important areas of 18th and 19th century occupation of the site were discovered.

In the southern lawn, archaeologists uncovered evidence of an early 18th century house dating to the time when Bermuda's Maritime Revolution was occurring. While only a corner of the foundation was uncovered, this is one of the earliest houses to be discovered through archaeological work in St. George's.

In the centre of the south lawn archaeologists found the remains of two cows buried two meters below the surface. Buried on top of each other in a small grave shaft these cows probably died of a disease called 'ticks' in the late 18th century. This disease ravaged Bermuda's livestock during this period. The cows were probably a part of dairying activities on the site, a small-scale industry that existed throughout Bermuda during the late 18th century.

left:
Whitehall

below:
Corner foundation of an early 18th century house



left:
Excavating a cow at Whitehall

On the northern edge of the lawn archaeologists uncovered the remains of a large building running east to west along the property line. This building probably dated to the middle part of the 19th century since part of a cast iron stove was found in its eastern edge. The building after it was destroyed was roughly filled in with Bermuda limestone. While we know little of its use, this structure was probably an outbuilding of Whitehall, one of the smaller structures that were used to support the main functions of the house; perhaps livestock lived within its walls.

In 2010 archaeologists began opening up a larger area to the north of the original excavation trench in the hopes of uncovering more of the building and any other associated occupation layers. It was determined that the building did continue to the north and it was defined archaeologically through several limestone columns and wall faces. Contained within the building were several occupation layers composed of sandy loam sediment yielding artefacts that date from the mid to late 17th century to the early 18th century. Sealing the building both in the 2008 test trench and in the 2010 open area trench was a thick destruction layer composed of Bermuda limestone blocks and roofing slates, as well as several large pockets of artefacts, most notably an abundance of fishbone. Based on the presence of Astbury Ceramics, produced between 1725 and 1775, in the destruction layer, the building was demolished sometime during this fifty-year period. This date range can provisionally be shrunk if we consider that the destruction layer did not contain any Wedgewood Ceramics that began mass-production in 1762.

Archaeological work at Whitehall is still in progress. In the future archaeologists hope to return to the site to understand the totality of the site's associated landscape during the 18th and 19th centuries.

top:
Rubble inside the 19th century outbuilding at Whitehall

Bottom:
19th century outbuilding at Whitehall, area in white



left:
Excavating the early building at Whitehall

PHOTOS: B. FORTENBERRY

VERDMONT /COLLECTOR'S HILL, SMITH'S PARISH



Standing proudly in Smith's Parish off Collectors Hill, Verdmont is one of Bermuda's most significant historic treasures. Built c. 1710, Verdmont is a unique example of early Georgian architecture. While the exact date of the building is a mystery, what is remarkable is that the footprint of the house has remained virtually the same over almost 300 years. Also remarkable is that it was lived in until 1951 without plumbing or electricity. It was subsequently purchased, restored and opened in 1957 as a museum that is maintained by the Bermuda National Trust.

Archaeological work at Verdmont began in 2006 with Ironbridge Gorge Museum's excavation behind the kitchen. The team was interested in finding activity areas of the enslaved Africans on the site. While the work did not discover any of these activity areas, it did begin a broader project of excavation work at Verdmont. The Ironbridge Gorge Archaeological Unit conducted a series of small test pits or trenches throughout the property. These revealed a posthole and rock cut along the eastern side of the property which warranted further scrutiny. It was decided that in 2007 an archaeology dig would focus on this area to search for a number of buildings that are recorded in archival documents but of which no above ground structures have survived. Furthermore archaeologists were looking for evidence to illuminate the social history of the site. Organized by the BNT Archaeology Research Committee and run by Brent Fortenberry with Travis Parno, both historic archaeology postgraduate students from the University of Bristol, the excavations were carried out by Bermudian archaeology students and local volunteers. Both 2006 trenches were re-opened and expanded while eight additional trenches were excavated.



A second posthole was discovered six yards from the first and the rock cut wall was revealed to be a significant rectangular chamber with clear evidence of 18th century occupation. The large quantity of animal bones recovered suggest that this feature was associated with animal husbandry and might have been an animal enclosure with the postholes supporting an associated fenced area.

In 2012, Brent Fortenberry resumed archaeological work at Verdmont to investigate the area below the kitchen cottage. It was determined that the area under the kitchen was a strong candidate for the housing of enslaved Africans, and a blocked up doorway revealed the possibility of a linking staircase between the current patio area and the cellar space. Additionally, archaeological work revealed a posthole on the current patio with a single piece of 18th century tin-glazed earthenware in the fill. In 2013, Brent Fortenberry continued his work at Verdmont with the excavation of the "Verdmont Ruin" in an area that has been known as the kitchen garden. Digging revealed the remains of the outbuilding from the earliest period of occupation of the site.

left:
Verdmont north facade



above:
Excavations behind Verdmont Cottage in 2006

left:
Animal enclosure found in 2007

below:
Blocked door from patio to the cottage cellar



Teacher Resources/Activities

Before your visit/ **Introducing Students to Archaeology**

- An archaeologist is a scientist who tries to figure out what life was like in the past by analyzing and interpreting archaeological remains
- An archaeologist must know the difference between an artefact and a fossil
- Fossils are the remains of living things (plants, animals, people), not of things that were made by people
- Artefacts are the remains of things that were made, not the remains of living things
- A 'site' is a place archaeologists wish to explore.
- At the site, archaeologists literally dig, looking for the remains of the past

OBJECTIVES

The teacher will review the section about what students should know before their visit (page 7), the glossary and choose one or more activities that are provided below.

***ACTIVITY 1** **Homes 'Old and 'Modern'**

The teacher will introduce the terms 'long ago', 'old' and 'modern' and have students create models of old and modern Bermuda homes, allowing them to gain an understanding of what happened in to rubbish in earlier times before trash collection.

***ACTIVITY 2** **Read a Landscape**

The teacher will have students study and draw a landscape area as archaeologists do before surveying possible places to dig. They will develop an understanding that studying the past helps us to shape our knowledge of ourselves and the world.

***ACTIVITY 3** **Common Tools that Archaeologists Use**

In preparation for the field trip to the Tucker House archaeology exhibit, the teacher will show students the pictures of common tools that archaeologists use.

*ACTIVITY 1/ ARCHAEOLOGY

Homes - Old & Modern

To prepare children for studying archaeology it is helpful for them to understand what happened in the past and what happens to buildings, other structures and rubbish over time. A great topic to begin with is to focus on homes that were built long ago by Bermuda's first settlers, how the building materials used evolved due to our high winds and hurricane weather.

LEARNING OBJECTIVES

- To introduce the term 'long ago' as representing historical eras
- To introduce the terms 'old' and 'modern' to represent things in the past and present
- To let pupils discover the similarity and differences in home and life settings between 'now' and in 'the past'
- To understand the role of an archaeologist before visiting the archaeology exhibit at Tucker House.

MATERIALS

- Palm leaves, thin pieces of tree branches (to build an early Bermuda home)
- Lego blocks or sugar cubes (to build a modern Bermuda home)
- Card board – can use boxes from cereal, clothing, etc. to use as a base
- Glue
- Hairdryer
- Pieces of pottery, glass, metal
- Shoe box

Step 1 - Have the students build a small replica 'old' Bermuda home and one that is 'modern'. Discuss the differences between the materials used. Have students use glue to make a base of the old home (with twigs or branches), and lay the palm leaves on top (without glue). Students can then construct a modern home with either Lego blocks or glue sugar cubes to form a 'Bermuda limestone home'.

Step 2 - Using a hairdryer, blow against the old and modern home, see which home withstands the 'wind' from the hairdryer. Talk about weather conditions on our island home and why there was a need for people to use stronger building materials.

Step 3 - Discuss what items early settlers would have used, storing them in their houses or leaving them on the ground outside. Place pieces of pottery, glass and metal in a shoe box filled with dirt. Explain to students that there was no trash collection long ago and rubbish was buried underground or dumped into pits and quarries.

Extension: Students can draw before and after pictures of their model homes and write a summary of their findings. Use a camera to take images of their work and post them in your classroom and or email them to parents.

*ACTIVITY 2/ ARCHAEOLOGY

Read a Landscape

By studying the world, students can learn more about themselves and their culture as well as learning about other cultures. Archaeology helps us to shape our knowledge of our past. It is through this study that students can discern similarities and differences between other people.

LEARNING OBJECTIVES

- To understand how archaeologists begin their work
- To understand that archaeology isn't just about digging and working in the lab; it's also a way of analyzing and interpreting the world around us in a different way.
- To establish prior knowledge before visiting the archaeology exhibit at Tucker House

MATERIALS

- Drawing paper and pencil

Reading a landscape helps archaeologists imagine the lives of past peoples.

Step 1 - Choose a place, such as a park, the surrounding areas of your school or a townscape to observe. Make a map of the area. Note its features, such as water sources or roads, low places (called depressions), hills and valleys. Show where the sun rises and sets. Draw the vegetation - is it shrubby, grassy, are there trees? Describe the soil: Dark or light? Sandy? Limestone?

Step 2 - Tens or hundreds or thousands of years ago, someone standing where you are probably saw a very different landscape. Where would they go for food and water? Where could a house get good light and heat from the sun? Where are the safe places for kids to play?

Step 3 - Like an archaeologist, you have just started a survey for possible places to dig to find hidden artefacts and put together how people may have used a landscape.

Extension: Have students use a camera and take images of the areas they have observed and drawn. They can load their images on a computer, scan their map and create a poster of both images side by side. Students can also include what could be buried underground in their landscape drawing. Ask them to write a story about the people that lived in the area long ago.

Source: Archaeology for Kids: "Read a Landscape" - National Park Service, US Department of the Interior

*ACTIVITY 3/ ARCHAEOLOGY

Common Tools that Archaeologists Use

Before bringing students to the archaeology exhibit at Tucker House show them the following images of tools that archaeologists use.



Shovels

Shovels, either rounded or squared, are used as the primary excavating tool, most especially in units where very few or no features or artefacts are discovered. They are used because they allow for more soil to be moved in a shorter time, as opposed to only ever excavating with trowels. Soil is shoveled either into buckets (usually 5 gallon size) and then carried to the screen, or is shoveled directly into the screen itself.



Trowels

For archaeology, the trowel is probably the most iconic and most-often used tool. It is the same tool that masons use to apply mortar to brick walls, though in archaeology it is used to excavate in a unit when the space no longer allows for the use of a shovel



Brushes

Brushes of different varieties such as paintbrushes and toothbrushes are used to sweep away dirt from delicate artefacts. Toothbrushes and small brushes are also used to wash/scrub away soil.



Screens

Screens are used to sift the soil that comes from each unit in order to search for and better spot artefacts. The most common screen varieties are the tripod and box (or personal) screen. Soil is poured into the screen from either a bucket or a shovel, and then shaken back and forth to allow the soil to fall through the screen mesh while bigger artefacts will stay inside the screen box.



Hand Brooms/Dustpans

Hand brooms and dustpans are used while excavating a unit in order to more efficiently move the soil out and help to keep the "floor" of a unit clean, especially before a photograph is taken of it. Dustpans help to move soil out of the unit at a faster pace when archaeologists have begun only using their trowels. Soil can be scraped into the dustpan then dumped into a bucket, instead of moving soil one trowel full at a time.



Tape Measures

Tape measures are used to make sure that the size of the unit and the depth of each level are as exact as possible according to field manual's regulations. They are also used when creating maps of units, as knowing the distance between artefacts or layers of soil will make the map much more accurate. Archaeologists also measure artefacts when they are documenting their size.



Line Levels/Plumb Bobs

Line levels and plumb bobs are primarily used in mapping features and excavation units. Line levels are attached to the strings that are used to outline the units and the diagonal string in order to be able to better measure the depth of each level and any artefacts that may be found. Plumb bobs are used in conjunction with the measuring tape while mapping in order to provide a precise location for any feature boundary or artefact that may be in the wall or floor of a unit.

During your visit/**Class Field Trip Activities**

Teacher and students are presented with a selection of activities for investigating archaeology

***ACTIVITY 1** **Digging for Artefacts**

Archaeology helps us to learn about people by digging into their past. Students are introduced to the stages and techniques that archaeologists use when preparing and excavating a site. By looking at different artefacts buried in soil, much can be learned about how people lived. Using archaeological tools, students will dig from a large container filled with soil and artefacts. After excavating artefacts students will discuss what the items are, what they were used for and what they reveal about the people who would have used them. This activity will take place in the lower level of Tucker House and will be geared for the grade level and ability of each group.

***ACTIVITY 2** **Exploring the Tucker House Archaeology Exhibit**

Students will then visit the archaeology exhibit and will be asked to look for items like those that were uncovered in the dig box activity. Older students will be given a worksheet to record their findings.



After your visit/Additional Information & Activities

Activities listed in this section encourage students to learn further with the help of seven fun and engaging activities.

OBJECTIVES

- To get insight into the techniques used by archeologists
- To make connections between the different archaeological excavation sites in Bermuda
- To encourage further interest in archaeology

*ACTIVITY 1 Create an Excavation

Students will learn archaeological skills by recreating an excavation in the classroom.

*ACTIVITY 2 The Art of Cross-Mending

Students will sort pieces of pottery or china and assemble objects from the fragments.

*ACTIVITY 3 Categorizing Artefacts

Students will collect different types of materials and place them on trays in order to categorize artefacts.

*ACTIVITY 4 Trash Can Archaeology Dig

With parent/adult permission ask students to head to their trash cans at home for an excavation.

*ACTIVITY 5 Stratigraphy and Dating Artefacts

Stratigraphy is the oldest method that archaeologists use to date artefacts. Students will learn about this method.

*ACTIVITY 6 Making Connections with Archaeological Excavations

Review the information provided about the excavations completed at the historic properties.

*ACTIVITY 7 Find Artefacts in Your Room

If archaeologists found the contents from your room two hundred years from now, what could they learn about you?

*ACTIVITY 1/ARCHAEOLOGY

Create an Excavation/

TIME REQUIRED: SCHOOL TERM

Archaeologists find out about the past by discovering artefacts left behind by our ancestors, examining what they have found and then recording their discoveries for the future.

Let your class try out these skills by recreating an archaeological excavation in the classroom. These instructions will help the class to bury a selection of organic and non-organic items and excavate them at a later date like a real archaeologist. To make the most of your dig, it should be left for eight weeks to ensure decomposition, (you may want to prepare your pit at the beginning of a school term) to allow time to complete the further steps at the end of term. To run this activity you can create one large dig as a class and ask smaller groups to choose and add an artefact each. Alternatively divide the class into small groups of four to create their own digs. Print out enough copies of the 'Archaeological Artefact Interpretation Sheet' to ensure that each group can record all their items. Also included is a section 'Rot or Not' with further information which will be useful for the class when they dig up their artefacts.

>STEP 1 • PREPARE YOUR DIG

MATERIALS

- Medium to large size plastic container such as a plastic storage box/small dustbin
- Enough soil to fill the container

Select four artefacts from the list below. Choose two organic (things that were once living) and two inorganic (things that were never living) materials:

Organic

- Apple core
- Leaves
- Empty shell such as garden snail or sea shell
- Piece of paper with writing on such as item of packaging or letter

Inorganic

- Piece of metal such as a coin
- Stone/flint
- Piece of pottery such as an old mug or a fragment from a broken garden pot
- Piece of plastic (if you choose plastic remember to put it in the top layer of your dig as this is the most modern material on the list)
- Four Artefact Interpretation Sheets (Worksheet 4)
- Pencil and ruler (or cut out the ruler from Worksheet 3)

Burying your Artefacts

Carefully examine all your artefacts and complete the Pre-Burial section of the Artefact Recording Sheets, including drawing a small sketch of each artefact. This is important for comparing the artefacts when you excavate them later. Place about 10cm of soil into the plastic container and bury two artefacts in the layer. Add another 10cm of soil and bury one more artefact in that layer. Add a final layer of soil and bury your remaining artefact ensuring it is fully covered. To make it more realistic you could use different soil types for each layer (soil with pebbles, soil with sand and plain soil) just like a real excavation. Once all your artefacts are buried place the container outside and open to the elements, or leave indoors and water once a week. You will need to keep the soil moist but not waterlogged. For the best results, leave your container for eight weeks when the artefacts are sure to have changed.

>STEP 2 • GET DIGGING!

Complete this up to eight weeks later

MATERIALS

- Your prepared excavation pit
- 4 x Artefact Interpretation Sheets (partly completed when preparing the pit)
- Plastic sheeting/newspaper
- Finds Tray – to put the excavated artefacts in (a plastic seed tray works well)
- Container to put the excavated soil
- Small trowel or other digging tool
- Sieve with 1cm mesh to sieve the soil for any small bits of artefact (optional)
- Old toothbrush to clean pottery or stones
- Pencil and ruler (or cut out the ruler from this pack)
- Apron and gloves (optional)

Digging up your Artefacts

Place your pit on plastic sheeting or newspaper. Set out your 'Finds Tray' on another piece of plastic sheeting or newspaper. Excavate your container by removing 5cm deep layers of soil at a time working horizontally across the pit. You should excavate in layers rather than dig holes as this is how a real archaeologist works, carefully removing the soil layer by layer. If you have a sieve, use it to filter all the soil you remove in case there are finds that you have missed. When you discover an artefact, cautiously clear the soil from around the edges and avoid damaging the surface of the artefact itself. Lift it out and place it in the finds tray. Pottery, shells and stones can be carefully cleaned using a toothbrush and water but artefacts made from wood, metal and food remains should not be washed or cleaned in water. Record your discovery using the 'Artefact Interpretation Sheet'. Keep excavating in layers and recording each artefact you find until you reach the bottom of your container. Once you have completed your dig, take a look at your recording sheets and compare the details of each artefact before it was buried and now that you have excavated it. Interpret how the artefacts have changed.

>STEP 3 • DISPLAY YOUR FINDS

MATERIALS

- Your four artefacts
- Paper and pens
- Suitable dry and cool display area

Displaying your Artefacts

As an archaeologist you have now discovered your artefacts, examined them to see how they have changed and recorded what you have learnt about them. All important archaeological discoveries are carefully preserved for future study and will often be displayed in museums. You can create a display of your artefacts with labels next to each item to let people know the most important details about each one. Remember your organic remains may continue to rot so they will need to be displayed in a container. Draw your labels on paper using the headings below and put them next to your artefacts.

Archaeological Artefact Interpretation Sheet



Name: _____

Date: _____

Is your object an artefact or ecofact? _____

Pre-burial notes – complete the chart below: circle and include description

WHAT IS THE OBJECT MADE OF?		SHAPE	SIZE	TEXTURE	WEIGHT	COLOUR
Wood	Metal	Circle	Length	Porous	Heavy	
Stone	Plastic	Rectangle	Width	Solid	Light	
Ceramic	Paper	Square	Height	Smooth		
Porcelain	Other	Oval		Rough		
Glass		Other:				

Draw a picture of your object:

PRE-BURIAL	POST-BURIAL

Has your object changed while being underground?

NO	NOT SURE
IF YES, DESCRIBE:	

Can you tell the age of your object? Why or why not?

Rot or Not

Organic materials

You've probably found that your organic artefacts will have broken down and begun to rot. Organic items will rot if buried unless you take away all oxygen and bacteria and stop all chemical reactions. If an organic artefact was left in a very dry, cold or wet environment it will be found preserved the best. So if an organic artefact is found in a dry desert, in liquid, or encased in ice it will often be found preserved, for example the 'Lindow Man', whose body was preserved in a peat bog in Cheshire for over 2,000 years. The body is held at the British Museum. The artefacts in your dig box have been left for eight weeks.

>How have your organic materials survived?

Inorganic materials

Inorganic materials won't rot, but may suffer from issues such as rusting or cracking. These sorts of items can offer archaeologists a lot of information about the past as they survive well over time. For example ancient tools made out of flint stone have been found from over 5,000 years ago in many locations across the UK, helping people understand how their ancient ancestors hunted and cooked.

>How have your inorganic materials survived?

How long does it take for something to rot away completely?

ITEM	TIME
Banana peel	3 - 4 weeks
Paper bag	1 month
Newspaper	6 weeks
Apple core	2 months
Orange peel	6 months
Wool sock	1 - 5 years
Cigarette butt	10 - 12 years
Leather shoe	25 - 40 years
Tinned steel can	50 years
Foamed plastic cup	50 years
Aluminium can	200 - 500 years
Plastic bottle	450 years
Disposable nappy	550 years
Plastic bag	20 - 1,000 years
Glass bottle	2 million years

Source:
bbc.co.uk/history/handsonhistory

*ACTIVITY 2/ARCHAEOLOGY

The Art of Cross-Mending

Archaeologists often discover fragments of an object dispersed across a wide area of a site. Many factors can cause such dispersal: the collapse of a building, plowing, using soil to fill a hole (such as a cellar), even rodent action. After the location and depth of each fragment has been recorded, it is often useful to try to assemble objects from the fragments, particularly in the case of ceramics.

Allow students to work in small groups to sort pieces of pottery or china. This activity can be done using a simulated dig box (one created by filling small containers with dirt) or by placing pottery pieces on trays for students to sort. Students should arrange the pieces by their color, pattern and relative shape and begin to see where pieces might fit together. After extracting objects from the dig site or tray students can:

- Fit the pieces together and imagine what the reconstructed object may have looked like
- Guess what the object might have been used for, even if some pieces are still missing
- Describe in detail broad features of the pieces and order the pieces by size (bigger or smaller) and shapes (rectangular vs. triangular pieces, for example)
- Use a tape measure or ruler and measure their pottery pieces
- View their pieces through a magnifying lens
- A large dig box with string lines can be used to delineate sections allowing students to make maps showing on a grid paper the location of the artefacts that they have discovered.

MATERIALS

- Pottery and china pieces from old or discarded plates placed in a plastic or paper bag
- Rulers, measuring tapes
- Drawing paper
- Pencils



left:
Broken china plate

*ACTIVITY 3/ARCHAEOLOGY

Categorizing Artefacts

Collect different types of materials and place them on trays for students to view and handle. Items such as pottery, glass, stone or metal can be used. Explain to students that broken, chipped, but sometimes whole artefacts come in many forms. Excavators often find hard items such as these which last longer in the ground than food or leather. Durable materials tend to be a big part of an artefact collection because they are better preserved over time. Students can work in small groups analyzing the artefact's origin and what it is made of. They can measure and draw each item in a journal and write a description noting its characteristics and what it may have been used for. Additional items can be added, such as pieces of plastic utensils, plastic lids or bottle caps. Have students note the differences in the materials and the longevity of each. They can also report their findings on a chart. For example, a fish bone would signify food for people. Archaeologists label or code each piece as they categorize. Create a coding system of your own and allow students to use a fine tip marker to label each item with a roman numeral.



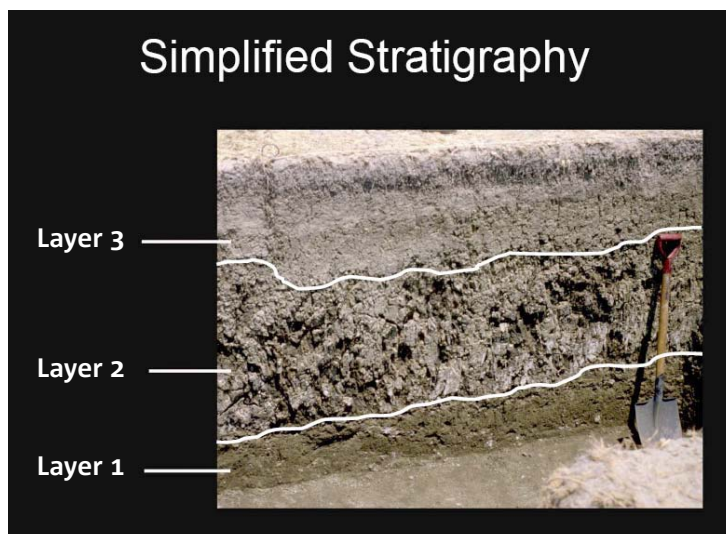
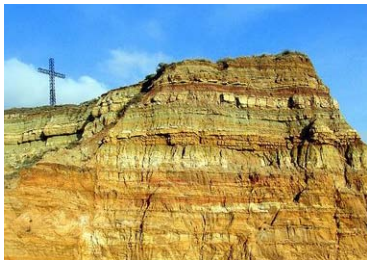
*ACTIVITY 5/ARCHAEOLOGY

Stratigraphy and Dating Artefacts

Stratigraphy is the oldest method that archaeologists use to date artefacts. It is based on the **Law of Superposition** which states that as long as layers of soil are undisturbed the oldest layer will be on the bottom and the most recent will be on the top. If a layer (or strata) contains finds which can be dated then that complete layer can be dated. By studying the different layers of material on a site archaeologists can work out the order in which things happened - even if a later feature has cut through earlier ones as, say, a new ditch would.

Use the following images and stratigraphy worksheet to show students how:

- rock, soil, traces of plants and animals settle on the earth's surface in layers
- the layer of earth on the bottom is the oldest and the layer on top is the youngest
- each layer differs in colour, texture and structure
- human materials and artefacts occur together in layers
- these layers form a record of past events
- archaeologists use this knowledge to date items they find during an excavation

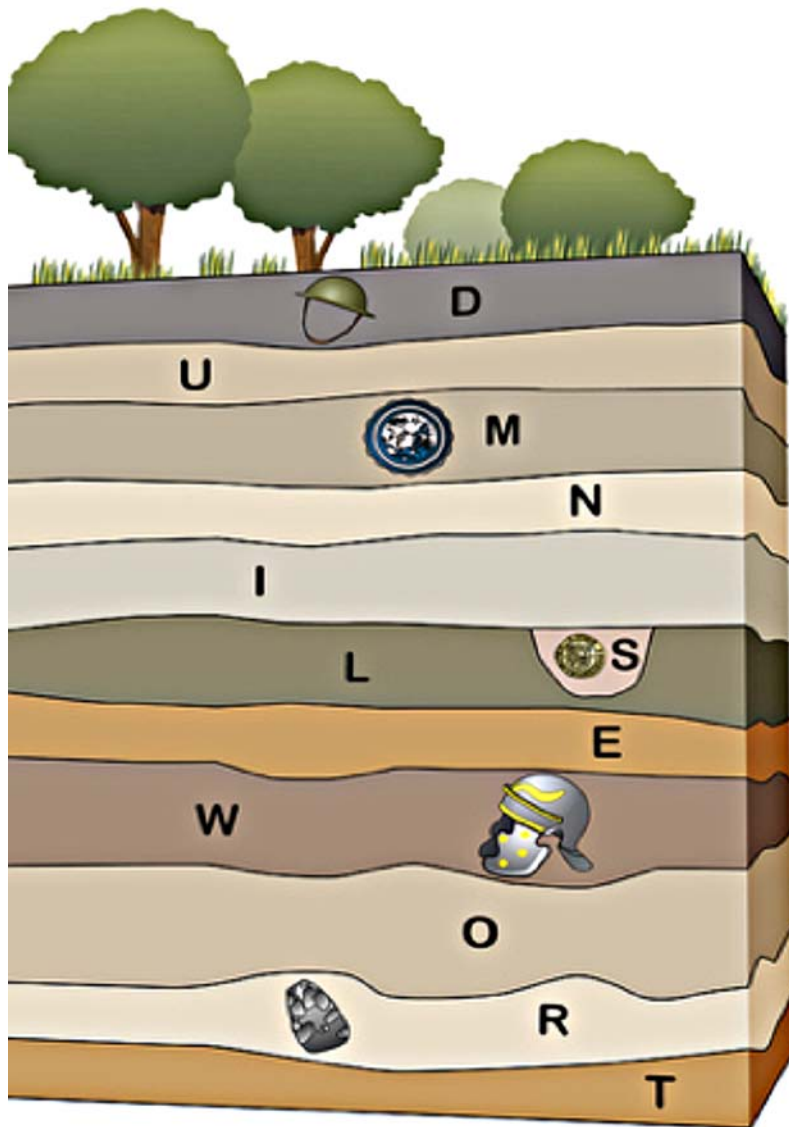


Stratigraphy Activity

Name: _____

Date: _____

Have students complete the stratigraphy puzzle below. See if they can create a new puzzle of their own using a phrase that relates to archaeology.



Layers of archaeology are called stratigraphy.

Can you put the layers of archaeology in the right order – oldest to newest?

Your letters should make three short words that fill in the boxes below.

<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
<input type="text"/>	<input type="text"/>						
<input type="text"/>	<input type="text"/>	<input type="text"/>					

***ACTIVITY 6/ARCHAEOLOGY**

Making Connections with Archaeological Excavations

Name: _____

Date: _____



Review the information provided about the excavations completed at the historic properties. Gather the facts noting the site and date the excavations occurred and the significant evidence and artefacts that archaeologists discovered.

SITE	EXCAVATION DATE	SIGNIFICANT EVIDENCE AND ARTEFACTS DISCOVERED BY ARCHAEOLOGISTS

Are there similarities between the evidence found on the properties?

*ACTIVITY 6/ARCHAEOLOGY

Making Connections with Archaeological Excavations/ANSWERS

SITE	EXCAVATION DATE	SIGNIFICANT EVIDENCE AND ARTEFACTS DISCOVERED BY ARCHAEOLOGISTS
St. Peter's Church	2005	A survey of the churchyard inscriptions and memorials was completed.
St. Peter's Church	2008	A map was created showing all the stones in the church yard. Subterranean chambers, previous entry steps for the church and 26 headstones as well as the remains of Governor George James Bruere and Sir Jacob Wheate were found.
Whitehall	2008	Archaeologists discovered evidence for an early 18th century house, a building probably dating to the middle part of the 19th century with part of a cast iron stove and the remains of two cows buried two meters below the surface.
Whitehall	2010	Archaeologists found that the 19th century building earlier discovered did continue to the north and they also found several large pockets of artefacts, an abundance of fishbone and Astbury Ceramics, produced between 1725 and 1775.
State House	2005, 2009, and 2010	It was determined that only the foundation footprint of the 17th century building survived. Everything above the foundation dates to work that took place in the 1970s to rebuild the building. Excavations also took place in the privy that dates to the late 17th century. Evidence provided information about feasts and balls that took place in the building. Animal remains indicate that attendees ate fresh local fish as well as imported beef and lamb. They consumed coffee, rum and punch from communal dishes and bowls.
Verdmont	2006	Archaeology revealed a posthole and rock cut along the eastern side of the property which warranted further study.
Verdmont	2007	A second posthole was discovered six yards from the first and the rock cut wall was revealed to be a significant rectangular chamber with clear evidence of 18th century occupation. The large quantity of animal bones recovered suggest that this feature was associated with animal husbandry and might have been an animal enclosure with the postholes supporting an associated fenced area.
Verdmont	2012	It was determined that the area underneath the kitchen cottage was a strong candidate for the housing of enslaved Africans, and a blocked up doorway revealed the possibility of a linking staircase between the current patio area and the cellar space. Additionally, archaeological work revealed a posthole on the current patio with a single piece of 18th century tin-glazed earthenware in the fill.
Verdmont	2013	The area known as the kitchen garden revealed the remains of an outbuilding from the earliest period of occupation on the site.

Are there similarities between the evidence found on the properties?

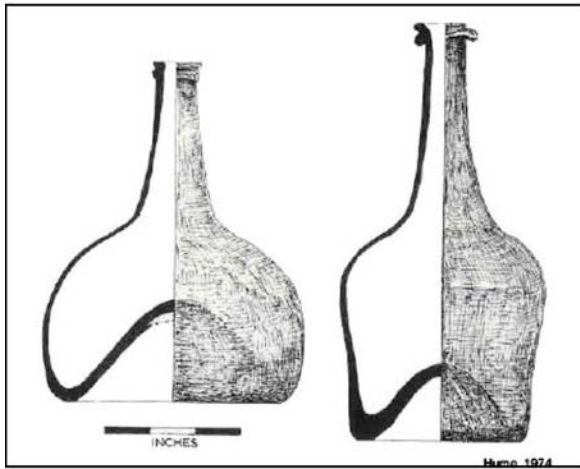
Yes, animal remains, post holes and the remains of previous walls from buildings were found.

Appendix

Bottles & Stemware

The Evolution of the Wine Bottle

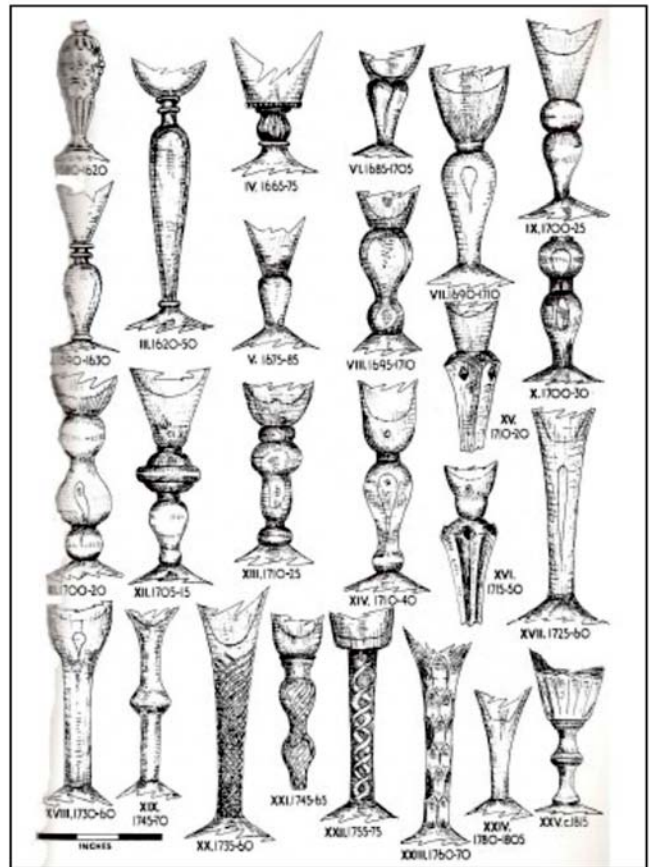
Early wine bottles were hand-blown and tooled with a 'kick-up' and pontil scar were the pontil rod held the bottle as it was blown and shaped. Later bottles were moulded into forms in a number of pieces, and then melded together.



Wine bottles with different kick-up from the second quarter of the 18th century



Dutch/Belgian case or case-gin bottles (1750-1880)



Drinking-glass stems likely to be found on colonial and early Federal sites

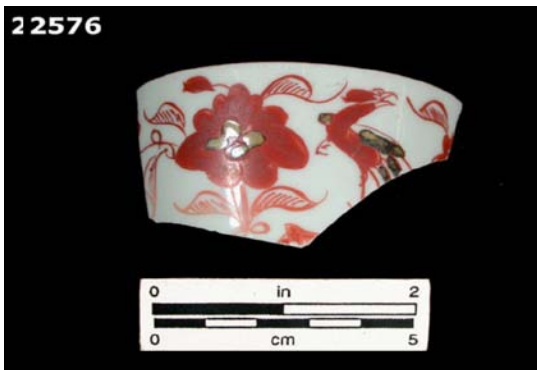
Porcelains



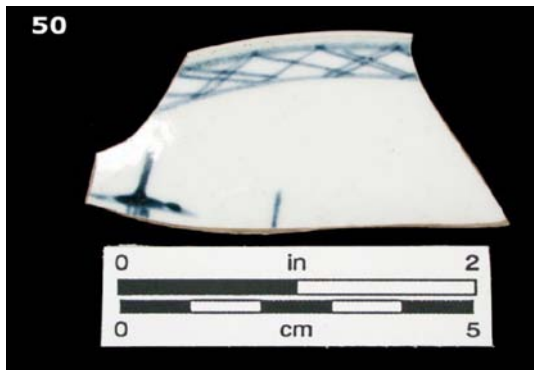
PORCELAIN, CANTON



PORCELAIN, POLYCHROME CHINESE



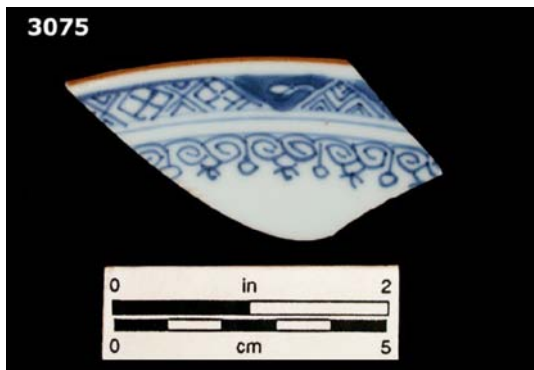
PORCELAIN, CHING POLYCHROME OVER-GLAZE



PORCELAIN, ENGLISH SOFT PASTE



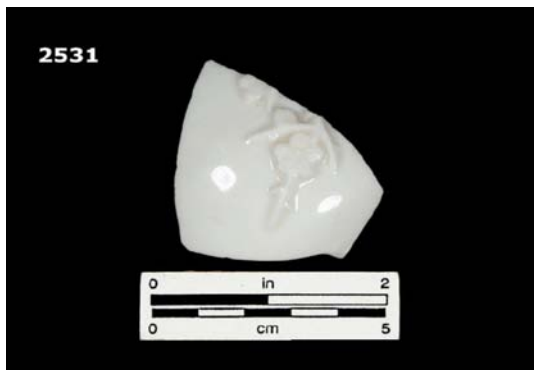
PORCELAIN, BROWN



PORCELAIN, CHING BLUE ON WHITE



PORCELAIN, BONE CHINA



PORCELAIN, DEHUA WHITE

Stoneware



STONEWARE, RHENISH BLUE AND GRAY



STONEWARE, WHITE SALT GLAZED



STONEWARE, DEBASED SCRATCH BLUE



STONEWARE, ELMERS-TYPE

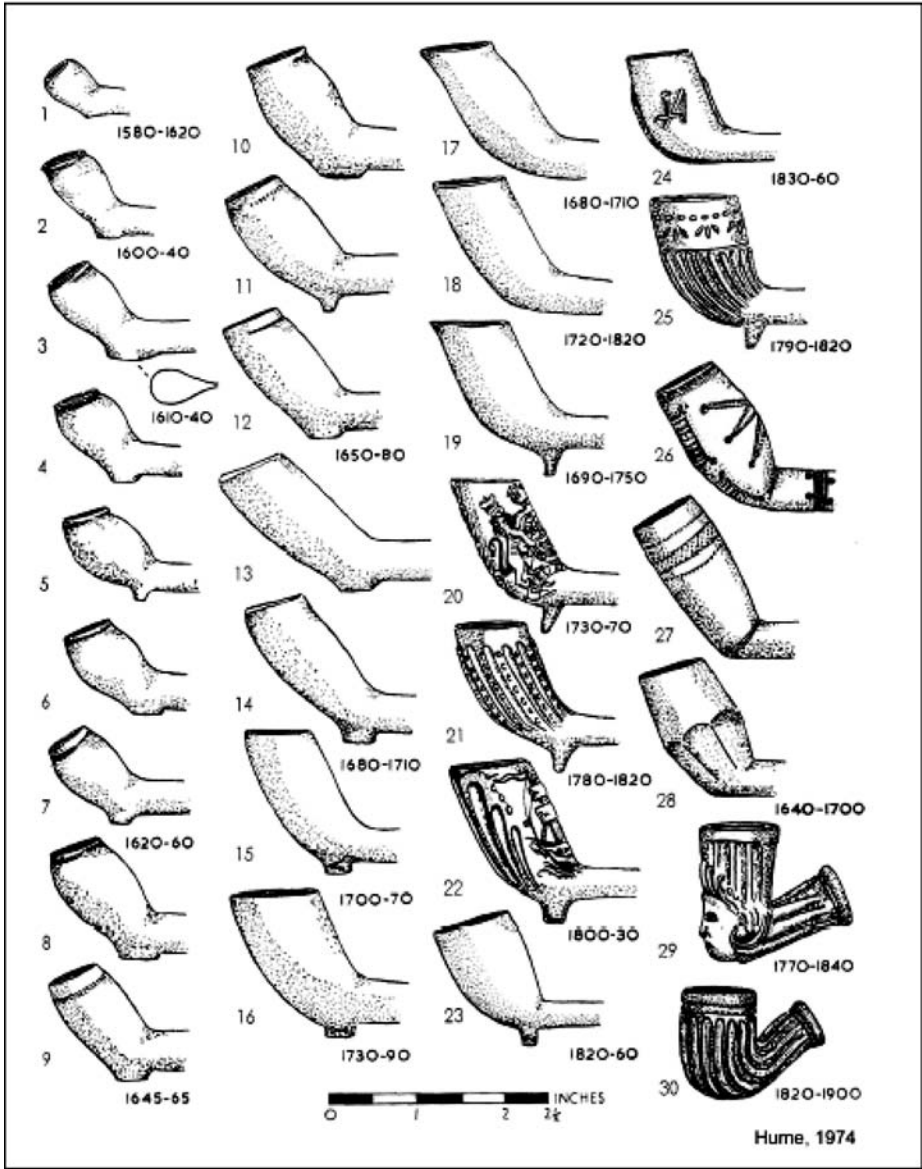


STONEWARE, "FULHAM TYPE" BROWN SALT GLAZED

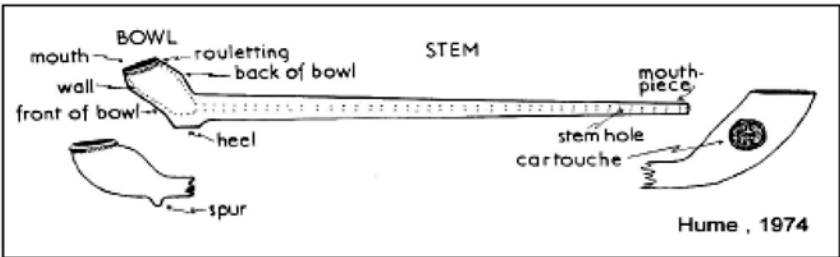


STONEWARE, AMERICAN

Clay Tobacco Pipes

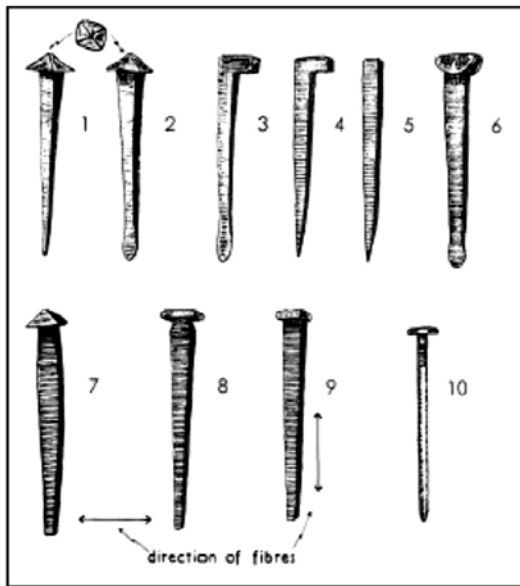


Different pipe bowls (1580-1900)



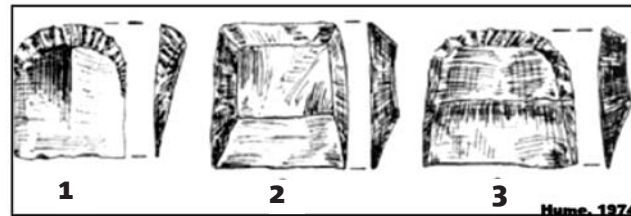
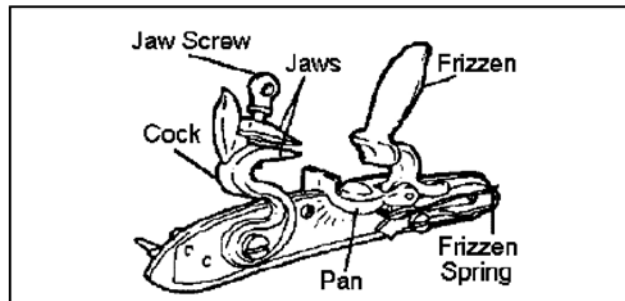
Parts of a clay pipe

Miscellaneous Artefacts



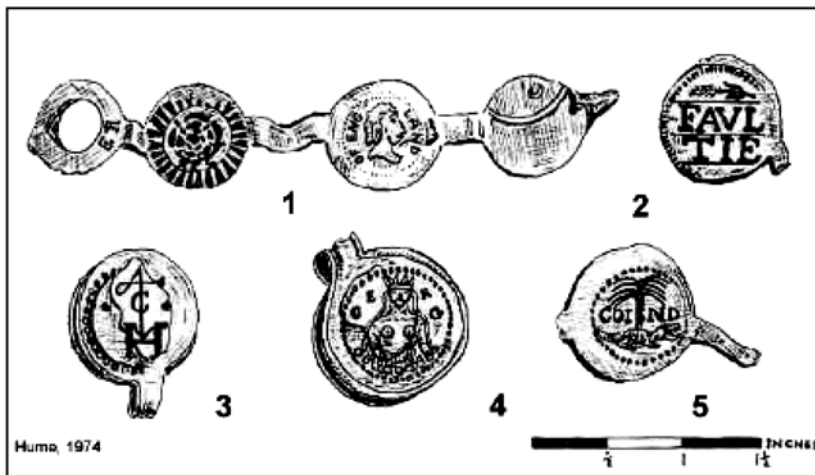
Nails: Wrought nails, cut nails, wire drawn with different nail heads

Gun Parts



Gunflints





















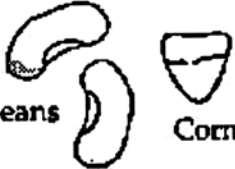



1. Gunspall
2. English Gunflint, gray prismatic type
3. French Gunflint, round back and pale brown



Lead-ball seals

1. Four-part official seal of James II
2. Alnager's seal of uncertain date
3. Typical merchant's seal (17th-18th century)
4. Arms of Mercer's Company of London or perhaps the 'Indian Queen' crest of Virginia; probably 18th century
5. Emblem of the French India Company; 18th century

Ancient Artefacts

			
Pottery	Bone awl	Pottery	Pottery
			
Pottery	Pottery	Stone	Pottery
			
Corn	Pottery	Pottery	Bone
			
Stone	Basketry	Turquoise	Shell
			
Pottery	Shell & cordage	Bone	Pottery
			
Beans Corn	Stone drill	Pottery	Pottery

GET COLOURING

Eric is at an archaeological dig.
Find his tools and colour him in!

BBC
**HANDS ON
HISTORY
DIG!**



- Spade
- Trowel
- Sieve
- Magnifying glass
- Tape measure
- Pen and paper

bbc.co.uk/history/handsonhistory

Glossary

Archaeologist: someone who studies and excavates the remains of past cultures

Artefact: an object made by a human being, typically an item of archaeological, cultural or historical interest

Articulated: made up of two or more sections connected by a flexible joint

Association: the relationship between archaeological finds on a given site

Baroque: relating or belonging to a style of art and architecture which originated around 1600 in Rome, Italy

Bedrock: the solid rock beneath a layer of soil, rock fragments, or gravel

Ceramics: a hard brittle material made by firing clay and similar substance

Context: consists of three primary pieces of information: matrix, provenance and association

Earthenware: pottery made of fairly coarse-textured baked clay that is fired at a very low temperature

Ecofact: artefacts of biological origin such as scallop shells or fishbones, used or modified by humans

Excavate: the act of digging into the ground, measuring and recording information while looking for archaeological remains from the past

Footprint: the shape and size of the area a building or feature occupies

Fossils: the remains of an animal or plant preserved from an earlier era inside a rock or other geologic deposit, often as an impression or in a petrified state

Inscription: a sequence of words or letters written, printed or engraved on a surface

Matrix: the physical medium that surrounds the piece of archaeological find, whether it is sand, clay or limestone

Memorial: something that is intended to remind people of somebody who has died or an event in which people died, such as a statue, speech or ceremony

Provenance: the 3-D location of an archaeological find

Subterranean: existing or situated below ground level

Symmetrical: relating to or having both sides the same

Vernacular: the local architecture of a place or people, especially the architectural style that is used for ordinary houses as opposed to large official or commercial buildings

Archaeology in Bermuda

Teacher Resources

Activities & Curriculum Links

Before your visit/ Introducing Students to Archaeology in Bermuda

Activity	Grade Level	Subject	Curriculum Link
Activity 1 Homes 'Old' and 'Modern'	Primary 3	Social Studies	P3 – Understand the concept of natural and man-made environments.
Activity 2 Read a Landscape	Primary 4	Social Studies	P4 – Produce evidence that demonstrate the ability to use information on the physical and human features of places to define and study regions and their patterns of change.
Activity 3 Read a Landscape	Primary 5	Social Studies	P5 – Explain the sequence and relationships of events. Form a simple organization of key ideas related to a topic.
	Middle 1	Social Studies	M1 – Recognise different types of maps and identify the characteristics common to all good maps. Produce simple maps.

During your visit/ Class Field Trip Activities

Activity	Grade Level	Subject	Curriculum Link
Activity 1 Digging for Artefacts	Primary 3	Social Studies	P3 – Understand the concept of natural and man-made environments.
Activity 2 Exploring the Tucker House Archaeology Exhibit	Primary 4	Social Studies	P4 – Students will produce evidence that demonstrate their ability to use information on the physical and human features of places to define and study regions and their patterns of change.
	Primary 5	Social Studies	P5 – Explain the sequence and relationships of events. Form a simple organization of key ideas related to a topic.
	Middle 1	Social Studies	M1 – Explain how studying ancient civilisations can help us understand how others lived long ago. The paintings, writings, tools and other artefacts give clues as to how they lived – archaeological evidence. Cite examples of what can be an artefact.

After your visit/Additional Information & Activities

Activity	Grade Level	Subject	Curriculum Link
Activity 1 Create an Excavation	Primary 3	Social Studies	P3 – Understand the concepts of environment, natural and man-made. Demonstrate awareness of natural and man-made environments. P4 – Produce evidence that demonstrates their ability to use information on the physical and human features of places to define and study regions and their patterns of change. P5 – Explain the sequence and relationships of events. Form a simple organization of key ideas related to a topic.
Activity 2 The Art of Cross-Mending	Primary 4	Social Studies	
Activity 3 Categorizing Artefacts			
Activity 4 Trash Can Archaeology Dig	Primary 5	Social Studies	
Activity 5 Stratigraphy and Dating Artefacts	Middle 1	Social Studies	M1 – Explain how studying ancient civilisations can help us understand how others lived long ago. The paintings, writings, tools and other artefacts give clues as to how they lived – archaeological evidence. Cite examples of what can be an artefact.
Activity 6 Making Connections with Archaeological Excavations			
Activity 7 Find Artefacts in Your Room			

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School Field Trip Booking Form

Please complete this form, scan and return via email to education@bnt.bm or fax it to: 236-0617

A member of our Education Team will be in touch with you to schedule your field trip. Thank you for contacting the Bermuda National Trust Axis Education Programme.

BNT site requested		
Date requested: Please provide 2 options	1.	2.
Contact person (full name)		
Time requested		
Phone	work	cell
Email		
School		
Year level		
Number of students		
Number of adults: Ratio for school field trips is 1 adult for every 10 students (additional adults are welcome)		
Are there students with learning/ physical difficulties? Please describe.		
Teaching objectives		
Ties with curriculum		
Please answer the following: How did you hear about school field trips and resources provided by BNT?		
Are you interested in attending workshops to learn more about our nature reserves and historical homes? If so, please indicate which sites.		

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School Field Trip Permission Form

Please complete this form, scan and return via email to education@bnt.bm
or fax it to: 236-0617

School Name:

Dear Parents,

Our class will be participating in a field trip to:

Our trip is scheduled for date: time:

PARENT/GUARDIAN PLEASE FILL OUT THE BELOW FORM AND SIGN

I, give my permission for (student's name)
to attend the trip to the Bermuda National Trust property indicated above. Please note that the Bermuda National Trust staff may take photos of individuals attending our field trips and activities, which may be featured in their publications. In signing this form I give consent for my son/daughter to be featured in BNT publications.

.....
Parent/Guardian

.....
Date

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