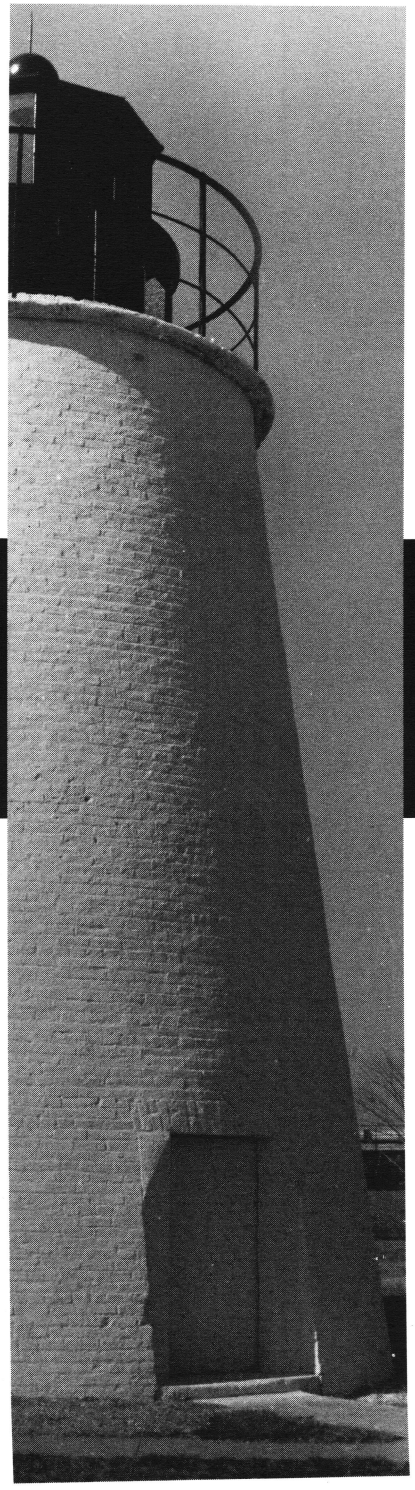
APPENDICIES TO

Historic Preservation Guidelines for *St. Mary's County*



St. Mary's County Historic Preservation Guidelines

Appendix One: *History of St. Mary's County*

When European settlers first arrived in 1634, Algonquin speaking peoples inhabited St. Mary's County in settlements located along the watersheds of the Potomac and Patuxent rivers. Fertile fields planted in maize surrounded their villages. This first European contingent was made up of Catholic gentlemen, the so-called Adventurers, who paid for the expedition, including the passage of the remaining voyagers, indentured servants who were mostly Protestants.

In the first weeks of March 1634 the colonists arrived at the mouth of the Potomac River. On March 25 they celebrated the first Catholic mass in the English colonies on St. Clements Island in the Potomac. By the first of April Leonard Calvert had purchased land along the St. Mary's River from the King of the Yaocomico and established Maryland's first capital, St. Mary's City. During the first three years of settlement the population was concentrated in St. Mary's City. In time, as more land was acquired, Calvert distributed large tracts to the gentlemen who had paid the passage of the other settlers, most of whom worked as indentured servants on the large manorial holdings. In this way the population eventually dispersed over the isolated manor lands, leaving St. Mary's City to the governing officials. The cultivation of tobacco quickly became the economic life-blood of the colony and would have a profound effect upon the development of the County's landscape in the seventeenth and eighteenth centuries.

Political unrest during England's Glorious Revolution in 1689 was soon mirrored in the Maryland Colony. The Calverts were removed from leadership, and many buildings in St. Mary's City were abandoned and allowed to deteriorate once the capital was moved to Annapolis in 1694 –1695; the "Brick Chappell" in St. Mary's City was actually dismantled some time after 1700. The Established Church of England was made the official state sponsored religion, thereby abandoning the policy of religious tolerance for which the Maryland colony had been known.

Although the Maryland Assembly encouraged the establishment of towns in St. Mary's throughout the eighteenth century, individual tobacco plantations remained important social centers up to the days of the American Revolution. Even Leonardtown, designated the county seat in 1708, was built in the middle of a plantation then known as Little Saint Lawrence, which later became part of a larger plantation, America Felix Secundus, on which Abraham Barnes erected the mansion house known as Tudor Hall later in the 1700s.

Both the American Revolution and the War of 1812 disrupted agricultural and social patterns in St. Mary's County. Tobacco shipments to London were cut off and farmers began growing wheat during the Revolution to feed the Continental troops. During the War of 1812 British troops raided Leonardtown, Chaptico and many plantations, burning homes, crops and barns. Many large landholders went into debt and lost their lands. At the same time, those who could not afford land in St. Mary's migrated west to Kentucky which, according to historian Bayly Ellen Marks, resulted in an increase in the proportionate number of slaves in the County.

Through the middle of the nineteenth century tobacco remained the "cash crop" despite deep fluctuations in market prices and an overall agricultural depression. The exploitation of slave labor continued to make the cultivation of the crop possible on large plantations. At the onset of the Civil War the majority of white County citizens were sympathetic to the Confederate cause; in fact, many crossed the Potomac to join Virginia's Confederate troops. Maryland's Governor Thomas Hicks convened a session of the legislature in Frederick, hoping to be out of reach of the commander of the Maryland Troops, who threatened to arrest the governor and legislature if they voted to secede. The members present at that meeting actually voted in favor of secession, but before subsequent action could be taken President Lincoln ordered federal troops into Maryland. In Southern Maryland this occupation began in 1861 and lasted until the end of the war. Many slaves were enlisted off plantations to join the Union army. Hammond Hospital was established in

1862 to attend to sick and wounded federal troops. After the battle of Gettysburg in July 1863 Point Lookout Prisoner of War Camp, known as Camp Hoffman, was established to house Confederate prisoners of war. Conditions at Point Lookout were horrendous and many prisoners died from fevers and malnutrition.

By the end of the Civil War, St. Mary's County was in a state of financial ruin. The abolition of slavery eliminated the cheap labor force necessary to cultivate large tobacco crops and consequently, wealthy planters lost their estates. Former slaves emigrated, stayed on as tenant farmers, or managed to acquire small farms of their own and create close-knit communities around several rural crossroads such as Beachville near St. Inigoes and Abell near Avenue. Large land holdings were no longer manageable; farms decreased in size to accommodate a smaller work force. The remaining decades of the nineteenth century were marked by agricultural reform and experimentation with crops such as peaches, corn and vegetables, although tobacco was still widely cultivated. Many farmers supplemented their incomes by tonguing for oysters during the winter months. Other changes brought public education, waterfront recreation areas, and small industrial packing plants to the County.

While World War I resulted in economic depression in many areas, the popularity of cigarettes kept the tobacco crop in high demand, therefore sparing St. Mary's County until the 1930s. After 1930, however, the County slid into the Depression like the rest of the nation. Yet ironically steady improvements to the quality of life actually began during this time. For instance, electricity became more commonplace in homes following the establishment of the Southern Maryland Electrical Cooperative. By 1940 the Potomac River Bridge opened and U.S. Route 301 became a major route between Washington, D.C. and Richmond, Virginia. As a result, increasingly more automobile travelers began venturing into St. Mary's County, and as gas stations and garages gradually became more common in the County. More local people became automobile owners themselves.

The outbreak of World War II resulted in the establishment of the Naval Air Station Patuxent River in 1941-1942 when the United States Navy took over ownership of 6,400-acre tract of agricultural land at the nexus of the Patuxent River and the Chesapeake Bay. The base quickly became an important aircraft testing center and eventually a training center for NASA's astronauts. The presence of the base resulted in a shift from a predominately agricultural economy to a technical and service economy.

Although today tobacco growing comprises a much smaller share of the local economy, particularly after the passage of the Tobacco Crop Conversion (Tobacco Buyout) Program, agriculture remains a strong economic force in St. Mary's County. Farmers today mainly grow corn, wheat and soybeans. However, experimentation with new crops suggests the possible establishment of a grape growing/ wine industry as well as a market gardening industry growing specialty vegetables for nearby gourmet restaurants and markets.

Undoubtedly the most dramatic change in the County has been the increase in population. From 1790 to 1940 the population of the County was never greater than 15,000, but since the establishment of the naval base it has grown steadily. The 2000 census data puts the population at approximately 91,000. Today the task of managing growth while protecting natural and historic resources represents the County's greatest challenge.

Appendix Two: *Overview of St. Mary's County's Historic Resources*

The English colonists who arrived upon the shores of Maryland in 1634 encountered a landscape already shaped by the Algonquin peoples whose villages dotted the Potomac and Patuxent River watersheds. Their distinctive oval shaped huts of bent saplings covered with woven mats were surrounded by land cleared to plant maize and other food crops. Their practice of burning the forest underbrush made hunting and traveling in the nearby forests easier. According to

contemporaneous accounts, the first English settlement in St. Mary's City made use of abandoned Native American huts for storage and as a first place of worship.

Although no seventeenth century buildings survive in St. Mary's County, work by historians and archaeologists provides a sense of their appearance. Archaeologists have shown that early government buildings in St. Mary's City were constructed of brick in the Jacobean style, common in England at the time. Similarly, historians considering contemporary records indicate that a few wealthy men were able to construct substantial mansion houses, also of brick.

However, most early buildings were constructed using a wood framing system known as "earthfast." The system, used for both agricultural and residential buildings, involves attaching horizontal wood members to posts set directly into the ground. Due to its ease of construction by unskilled labor, it remained the most common form of architecture in the County throughout the seventeenth century.

One of the earliest extant buildings in St. Mary's County is Ocean Hall, which dates from the turn of the eighteenth century. This one-and-a-half story dwelling is constructed of brick laid in a Flemish bond pattern, typical of the period. The house has the distinction of being the only known example of upper cruck roof framing in the United States, a framing system associated with English barn and house roofs.

Other wealthy men continued to build in isolated areas employing the more common earthfast construction method. James Bowles acquired 890 acres and built a simple one-story post-in-ground frame house whose walls and roof were covered in clapboard. It contained two unfinished rooms to which he later added in an effort to create more privacy and specialized spaces for sleeping, eating and entertaining. The core of Bowles' dwelling is today the oldest part of Sotterley Plantation (c.1717), one of the few examples of this type of construction still surviving.

Another early dwelling was the recently demolished Resurrection Manor (c.1725-1750) that originally consisted of only one room. In contrast to later dwellings, Resurrection Manor served to illustrate that settlers utilized undifferentiated interior space with little formality. Fine wood paneling did, however, enhance the interior.

By the mid-eighteenth century the interiors of houses began to acquire specialized rooms for different functions such as dining, sleeping, entertaining, cooking and the like. This coincided with the development of the Georgian style with its symmetrical exterior facades, examples of which are Mulberry Fields (c.1767), Bachelor's Hope (c.1749) and Bushwood Manor (c.1780s). Mulberry Fields, a large two story five bay house designed with a central passage double pile plan, is the only extant home in St. Mary's constructed in all header brick bond. The house typifies a "closed plan," consisting of a central hall flanked by two rooms on either side. This plan resulted in further specialization of living space, separating work areas from formal living spaces used to receive guests. Landscaping around the house also employs the orderly tenets of Georgian style: an avenue of cedars was planted leading down to the Potomac River, creating an optical illusion that makes the house appear closer to the river. Though Bachelor's Hope is a smaller home, it too features Georgian architectural detailing. The house is constructed of Flemish bond brick and features a recessed loggia on its primary elevation. The loggia includes columns and an elaborately decorated cornice. Bushwood Manor was a two story brick dwelling with a hipped roof and an elaborate interior, including a Chippendale-style staircase. The builders of these high style homes probably had access to architectural pattern books from which they derived their designs.

The survival of the homes of the wealthy elite from this period stands in contrast to the lack of small planters' dwellings, tenant houses, and slave quarters, constructed of much more impermanent materials. While these mansion houses do not convey the manner in which the majority of citizens lived, they do establish that eighteenth century St. Mary's society was highly stratified.

Small towns began to emerge during this period, beginning with the designation of Leonardtown as the county seat in 1708. Other crossroads villages sprung up. Upon the establishment of Charlotte Hall Military School in 1797, plans were drawn up for the surrounding community of Charlotte Hall. Other small settlements containing blacksmith shops, stables, stores and granaries arose to serve the surrounding farming population. Mills for processing corn and wheat began to appear beside streams, attracting other small enterprises. Waterside landings developed as hubs of commercial and social activity during this period.

Shortly after the American Revolution a new style of architecture, known as Federal, emerged, featuring delicate ornamentation and at times curved exterior and interior forms. An example of this style, Cremona (c.1819), constructed by William Thomas, features larger windows and lighter, more finely detailed door and window surrounds and mantels, as well as a double riser staircase. The interior of Bard's Field (c.1800) features a tightly spaced central passage double pile plan with elaborate Federal-style mantels.

The few surviving agricultural buildings from this time provide insights into contemporary construction methods. The De La Brooke Tobacco Barn (1790-1820) and the Prospect Hill Tobacco Barn (1790-1820) measure 32 by 16 feet and are framed with hewn and pit sawn beams. Each of these barns has a tilted false plate that carries the weight of the roof rafters, a method of construction dating back to the seventeenth century. County carpenters retained these early construction practices into the late eighteenth and early nineteenth centuries.

Architect/engineer John Donohoo designed and built the first lighthouses in the County. Point Lookout Lighthouse (c.1830) is built of brick covered in stucco and Piney Point Lighthouse (c.1836) is built of brick painted white. During the same period the Greek revival style became popular in the United States. Typified by a Greek temple front and details, early examples of this style in St. Mary's County include Buena Vista (c.1840) and Ellenborough (c.1857), constructed by local designer-builder Vincent Camalier.

During the years preceding the Civil War, the agricultural landscape retained its focus on tobacco, although farmers were beginning to experiment with crops such as potatoes, beans and wheat while also raising livestock. Log and earthfast structures such as the Bond Farm Tobacco Barn (c.1837) and the Log Barn in Hollywood (c.1840s) were in use, as were frame barns. These, of which the Dryadocking Farm Tobacco Barn (c. 1840s) is an example, were usually sheathed with vertical planks attached to hewn braced frames.

The Civil War resulted in the collapse of large plantations, which were no longer profitable without slave labor. The average size of an agricultural holding decreased from 300 to 100 acres. While tobacco remained an important crop, new, less labor-intensive crops such as fruits and vegetables were introduced. Farmers supplemented their incomes by working as watermen during the winter months, promoting the establishment of marine railways (boat repair facilities) and boat building shops along rivers and creeks. In the last quarter of the nineteenth century several areas became significant maritime centers. Bushwood wharf in the Seventh District had a cannery, mill, two oyster packing plants, stores and a steamboat landing. The southern part of the County was home to an oyster breeding station managed by the United States Fish Commission.

In 1865 state funding for white schools began. Not until 1872 did state funding become available for African-American schools. Most, such as the St. Inigoes African American School (c.1900), were one-room buildings. The County has other early twentieth century resources associated with African-Americans, such as the Robert Henry Collins House (c.1890s), the Maddox-Lee House (c.1880-1890) and the Thompson-Carroll House (c.1875-1900). Other structures with strong African-American ties are the Golden Hotel, a summer resort (c.1910-1930), the Abell School (c.1890), the Milestown School (c.1930s), and fraternal organizations such as the Love and Charity Social Club Hall (c.1890s), Sacred Heart Beneficial Society Hall (c.1890s) and the Knights of St. Jerome (c.1885). All of these buildings are modest wood frame structures.

As the twentieth century began, commercial growth continued with the establishment of the Wynne Ice and Packing House, which later became the Davis Oyster Packing Plant in 1925. Recreational areas began appearing in the late nineteenth century, including the now demolished Point Lookout and Piney Point Hotels, Swann's Hotel that burned in 2001 and Swann's Store and its small community of cottages (c.1885-1900, 1920), demolished in 2002.

The standardization and mass production of building materials at the beginning of the twentieth century made it possible for more people of modest means to build homes as the prefabrication of architectural components brought down prices. Decorative pressed metal for walls and ceilings became popular. St. Michaels's Church in Ridge (c.1914-1915) and St. Paul's United Methodist Church in Leonardtown (c.1914-1915) are among the buildings that made use of this new material.

By the end of World War I eclectic and revival styles for both public and private buildings were common. Examples include Leon Dessez's Spanish Mission style Our Lady's Church in Medley's Neck (c.1911) and the new classroom building at the Charlotte Hall Academy done in the Colonial Revival style (c.1931). Craftsman style homes, which could be built from kits sold by the Sears and Aladdin companies, became popular, though the Hutchins House (c.1924) is the only kit house in the County documented so far.

In 1942 the Naval Air Station Patuxent River was constructed on 6,400 acres at Cedar Point along the Chesapeake Bay. The same year, the Navy commissioned the nationally known firm of Kahn and Jacobs to design the first planned subdivision for base workers. Its International style buildings feature tall windows, stucco walls and flat roofs and are nicknamed the "flattops". In 1947 a privately planned subdivision known as Patuxent Park was constructed to meet additional housing demands brought on by the Naval Air Station.

In 1978 the Thomas Johnson Bridge spanning the Patuxent River became the first and remains the only bridge connecting St. Mary's and Calvert Counties. Today suburban development and vacation homes dominate the once sparsely settled agricultural landscape. Improvements to Route 235 and other roads have made at least part of the County an exurb of Washington, D.C. The buildings of the last century reflect building types—shopping centers, housing subdivisions, schools, etc.- common in the rest of the country, employing similar styles and materials.

The challenge of the twenty-first century will be managing growth while retaining distinctive elements of the County's architectural character. By far the most difficult task will be to preserve the landscape itself—rural open space and woodlands- that is under tremendous development pressure.

Appendix Three: *Secretary of the Interior's Standards for Rehabilitation*

1. A property shall be used for its historic purpose or be placed in a new use that requires minimal change to the defining characteristics of the building and its site and environment.

2. The historic character of a property shall be retained and preserved. The removal of historic materials or alteration of features and spaces that characterize a property shall be avoided.

3. Each property shall be recognized as a physical record of its time, place, and use. Changes that create a false sense of historical development, such as adding conjectural features or architectural elements from other buildings, shall not be undertaken.

4. Most properties change over time; those changes that have acquired historic significance in their own right shall be retained and preserved.

5. Distinctive features, finishes and construction techniques or examples or craftsmanship that characterize a property shall be preserved

6. Deteriorated historic features shall be repaired rather than replaced. When the severity of deterioration requires replacement of a distinctive feature, the new feature shall match the old in design, color, texture and other visual qualities and, where possible, materials. Replacement of missing features shall be substantiated by documentary, physical, or pictorial evidence.

7. Chemical or physical treatments, such as sandblasting, that cause damage to historic materials shall not be used. The surface cleaning of structures, if appropriate, shall be undertaken using the gentlest means possible.

8. Significant archeological resources affected by a project shall be protected and preserved. If such resources must be disturbed, mitigation measures shall be undertaken.

9. New additions, exterior alterations or related new construction shall not destroy historic materials that characterize the property. The new work shall be differentiated from the old and shall be compatible with the massing, size, scale and architectural features to protect the historic integrity of the property and its environment.

10. New additions and adjacent or related new construction shall be undertaken in such a manner that if removed in the future, the essential form and integrity of the historic property and its environment would be unimpaired.

Appendix Four: *Guidelines for the Treatment of Cultural Landscapes*

1. Identify, Retain, and Preserve Historic Features and Materials. The first step should be to identify those features and materials of the landscape that are important to defining its character. For example, spatial organization and land patterns, topographic and man-made features, types of vegetation, and the like that contribute to the property's historic value. For example, the relationships between an historic farmhouse and its outbuildings, the placement of tobacco barns on the landscape, the separation of properties by trees, and the relationship of the farmhouse to the road are all features that should be identified and evaluated as to their historic or cultural importance. Likewise the materials used to build houses, barns, bridges, and the like should be evaluated as to their architectural or historical importance. Once those features and materials have been identified, determine which must be retained and preserved, for without them the property would lose its integrity and cultural, architectural, or historical importance.

2. Protect and Maintain Historic Features and Materials. During alterations and changes to the property, one should protect important historic features from damage from adjacent work, as well as ensure that any new work does not destroy or inappropriately alter those features and materials. For example, placing a new barn so that it reinforces existing spatial organizations and land patterns would be a means of protecting and maintaining an historic feature, while locating it in a completely new relationship to the historic buildings would not. Similarly, repointing a masonry wall by duplicating the appearance of the original mortar is a method of maintaining an historic material, while creating a totally new mortar color and profile would not.

3. Repair Historic Features and Materials. In many cases, historic features and materials have deteriorated due to weather, storms or inappropriate maintenance. Repairing those features and materials, rather than replacing them, is preferred. The repairs should be done so that the finished work is as indistinguishable from the original as possible. Typically this means using the same materials, or at least ones that are visually the same, as the original, such as replacing deteriorated wood siding with new wood siding of the same size, profile and finish.

4. Replace Deteriorated Historic Features and Materials. Historic features or materials too deteriorated to repair should be replaced in-kind. For example, a deteriorated wood fence should be replaced with a new wood fence that is similar in design and color to the original.

5. Design for the Replacement of Missing Historic Features. Often historic features documented through photographs, drawings, diaries or other sources have disappeared over time. Replacing them with new features of similar appearance is preferred; for example, replanting missing trees along an entrance drive with the same species. Alternatively, designing a replacement feature that is compatible to the missing feature and the existing resource is acceptable.

6. Alterations or Additions to Accommodate a New Use. Often, an historic property must be altered or added onto in order to be functional for a new use. When this is necessary, the design of the addition or alteration should be compatible with the existing historic resource.

7. Accessibility, Health, Safety, and Environmental Considerations. Most historic properties were constructed prior to current accessibility requirements, health and safety codes or environmental regulations. In bringing an historic resource up to code care should be taken not to alter or destroy character-defining features or materials.

Appendix Five: *Maintenance of Historic Buildings*

Walls, Porches, Projections and Details and Ornamentation

The walls, porches, projections- such as bays, chimneys and turrets- and details and ornamentation of the historic buildings of St. Mary's County are primarily made of brick and wood. Other materials, such as cast concrete block and stone, can also be found.

Brick is one of the most prevalent historic wall materials in St. Mary's County. It is found in a range of sizes, textures, and colors. Typically, brick manufactured after the Civil War was formed in iron or steel molds giving it a fairly uniform size and shape, unlike earlier brick, which was hand-made in wood molds. In addition to the material and size of the mold, brick gains its texture, shape, size, and color from the type of clay used and the temperature at which it is fired in the kiln. The way bricks are laid in a wall (called *coursing*), as well as mortar color and the width and profile of mortar joints, contributes to the character of walls. Most historic brick walls and foundations are laid in *running* bond. Also prevalent are *common* and *Flemish* bond. Common mortar joint profiles include *struck, weather* and *flush.* Other less common profiles include *raked, vee, concave* and *rope.* Mortar is naturally a gray-white color, although some mortar used in historic brick walls and foundations is red or some other color, achieved by adding various coloring agents to the mix.

Wood siding is most commonly found on rural residential and accessory buildings, although it is also found on residential, religious, and other buildings elsewhere in St. Mary's County. Many varieties and shapes of historic wood siding can be found including *German, shiplap,* and *shingle.* Usually associated with a particular building period or style, each gives a wall a unique character. Historically, wood siding on residential, religious and commercial buildings was painted for weather protection. It was usually left unpainted on accessory buildings such as barns.

Maintaining, Repairing, and Replacing Brick and Wood

Fortunately brick is a robust material and requires little maintenance. Wood repainted on a regular basis and not in contact with the ground will also last a long time. However, both will eventually need maintenance and, possibly, repair or replacement. Rain, snow, hail, wind-borne grit and pollutants can affect how quickly brick and wood wear and the frequency that maintenance is required. Wood is also susceptible to damage from insects. Vegetation growing on brick or wood

will accelerate their deterioration, as can foundation plantings that trap underground moisture against the foundations.

When deterioration is detected, the owner should first consider repairing only those areas needing attention, using *in-kind* material (the same as that existing). If deterioration is extensive, replacing the entire wall, projection, or ornamentation(s) may be required. If this is necessary, the owner should first investigate the feasibility of replacing the deteriorated material in-kind. Only after this has been determined not economically or technically feasible should the owner consider replacing the element with a *substitute material* that is chemically and physically compatible with adjacent materials and similar in appearance to that existing.

The following sections discuss some of the common maintenance and repair problems related to brick and wood and how they may be addressed so that the architectural character of a building may be preserved.

Brick

Spalling represents one of the most common brick deterioration problems. It happens when water penetrates the surface of the brick through pores or cracks. In cold weather the water will freeze and expand, causing the surface of the stone or brick to spall, or break away. In this way brick can become deeply eroded over time. Spalling may also result from *sandblasting* or other inappropriate cleaning techniques that remove the brick's protective surface. Spalling in foundations may be the result of *rising damp*, when ground water rises up through the pores in the brick.

Lightly spalled brick is usually left untreated, although some attempt to stop the action using a clear sealant may be an option. This is rarely effective over a long period and tends to change the color of the brick. Historically, lightly spalled brick was often painted, which did tend to stop the surface erosion; however, this also clearly changes the character of the brick and therefore is not recommended unless the wall was historically painted. Heavily spalled brick should be removed and replaced in-kind.

Mortar Joints

The mortar used in brick walls is also subject to deterioration. In the absence of weep holes, moisture condensing between the layers of walls due to the temperature differential between the building's interior and exterior escapes through the mortar joints. Over time the water carries the mortar away. Rising damp has a similar deteriorating effect on the mortar joints in foundations.

When mortar joints have recessed 1/2" or more behind their original surface, the building owner should consider repointing them with new mortar. Also called *tuckpointing*, the mortar used to repoint historic brick walls should be of a chemical composition similar to the existing. It is particularly important that modern high-strength Portland cement mortar not be used in historic walls containing low-strength cement mortar, as modern mortar is harder than most historic brick and some stone, thereby causing condensation and rising damp to migrate through the masonry units rather than the mortar. In freezing weather this may cause spalling.

Removal of old mortar should always be done with hand tools. Saws and other power tools will chip the edges of brick and stone, disfiguring the wall or foundation. New mortar should be struck in the same profile as the existing and be of the same color.

Cleaning Brick

Brick walls may become disfigured through air-borne grit or pollutants or defaced with graffiti. Over time dirt and pollutants may contribute to spalling and other brick surface deterioration problems.

Cleaning brick should begin with the gentlest means possible, proceeding in careful steps to more aggressive methods until the dirt, pollutants or graffiti is removed. This is done to protect the physical and visual integrity of the brick - overly aggressive cleaning methods can erode surfaces and cause extensive maintenance problems. Cleaning methods should be tested on a small inconspicuous area of the wall to determine their effectiveness. The gentlest cleaning method is water washing with detergent using a hand-brush. If this proves not to be effective, the owner should try power washing with water or steam starting at low-pressure (200 psi), gradually increasing the pressure (to a maximum of 600 psi) until the dirt, pollutant or graffiti is removed. The most aggressive method of cleaning brick is chemical cleaning. Selecting an appropriate chemical for the substance to be removed and for the wall material is very important, as is controlling run-off. In no case should sandblasting or blasting with grit, plastic beans or other substances be used to clean brick.

Foundation Water Penetration

Historically, brick foundation walls were sealed on the outside with a cement-based material. Foundations constructed in the 20th century were sealed with a tar-based material. Both act as a waterproof membrane, keeping the crawl space or basement dry. In addition, most historic freestanding buildings had *French drains* of perforated clay tile installed at the *footings* (the base of the foundation wall) that carried ground water away from the building.

Over time, the waterproof membrane may have deteriorated or the drain tiles become clogged with soil or roots, allowing water to seep into the basement. The most effective, but most expensive, method of repair is to replace the membrane or drain tiles. Another often effective corrective method is to have an expanding cement-based compound injected into the ground against the foundation wall. If the water penetration is localized near downspouts, it may be possible to correct the problem by simply extending the end of the downspout away from the foundation.

Historic brick foundations are also subject to *rising damp*. The pores in the masonry act as wicks, drawing ground water up into the wall from the ground. If the base of the masonry wall is spalling, but other areas are not, the cause may be rising damp. Installing a *DPC* (damp proof course) at the horizontal mortar joint between the foundation and wall is the best solution to this problem.

Wood

Almost all historic wood walls, except those found on accessory buildings, were painted to protect the wood from weathering. When paint blisters, cracks, flakes or peels that protection is lost. In addition to rot, wood walls are subject to deterioration by insects.

Consolidating the affected areas with epoxy or another appropriate wood consolidant after proper drying and treatment can repair minor rot and insect damage. If the problem is more extensive the affected areas should be replaced in-kind, using the same or similar species of wood, finish and profile as the existing.

Loose sections of paint should be removed by hand-sanding and bare wood primed prior to repainting. If possible, the same type of paint (oil or latex) should be applied. Heavily encrusted paint that obscures details and profiles should be stripped to the bare wood before priming and repainting. This may be done by hand or with appropriate chemical strippers. Power sanding, sandblasting, heat guns or other methods likely to damage the wood should not be used.

Particular care should be taken in removing paint manufactured prior to 1960 as it is likely to contain lead. Protective clothing and proper cleanup and disposal of lead paint fragments and dust must be undertaken to protect the health of those performing the work as well as the environment.

Selecting new paint colors is often a difficult decision. One method is to use historic colors, based on an analysis of the various coats of paint on the building. Another option for residential buildings in particular is to consult various books on appropriate colors for period buildings. Whichever method is chosen, paint colors should complement each other as well as the colors of unpainted exterior materials and those of neighboring buildings. Typically no more than three colors should be used for an exterior wall, trim and details.

Lead-based Paint

Many wood walls constructed prior to 1960 were painted with lead-based paint. Before repainting the building owner should have samples tested by a reputable testing laboratory. If lead-based paint is found the owner should contact an approved paint contractor to properly remove and dispose of the paint.

Appropriate Substitute Materials for walls, Porches, Projections and Details and Ornamentation

While it is always best to repair or replace walls, porches, projections and details and ornamentation using in-kind materials, in some cases this will not be technically or economically feasible. In these cases, property owners may consider using a substitute material. When selecting a substitute material, particular attention should be paid to the new material's expansion, contraction, and weathering properties, as well as its chemical properties.

Materials expand and contract at different rates due to temperature change and sunlight falling on them. Installing a new material with very different expansion and contraction properties than the existing may cause the joints between the new and old to open. Materials also weather, or *age*, differently, changing appearance over time. When a substitute material is considered for repair or replacement, its weathering properties should be similar to those of the existing material so that the replacement does not become apparent over time.

The most common substitute materials used on historic wood walls are metal and vinyl siding. Typically these materials are installed over existing surfaces to eliminate the need for repainting the wood every 7-10 years. Metal siding is almost never appropriate because its surface finish, profiles and reflectivity are not similar to those of wood. Certain vinyl siding may be appropriate if its reflectivity, finish, size, profile and other visual characteristics simulate the existing wood and it is installed in a manner so that the depth and character of junctions at the foundation, window and door surrounds and eaves are the same as the existing.

Insulating Walls

Building owners may consider adding insulation to walls to improve their thermal performance. Before doing so, the owner should consider the following: most freestanding buildings lose only 20-30% of their heated or cooled interior air through their walls; the majority is lost through windows, doors and roofs. Before adding insulation to walls, the building owner should investigate the cost and benefits of insulating the windows, doors and roof instead.

If the decision is made to insulate the walls, it is important that the method used does not create maintenance problems or harm the appearance of the wall. Brick *cavity walls* (walls with air spaces between the outside and inside surfaces) are often insulated by filling the cavity with foam. Similarly, wood siding is almost always applied to wood stud walls containing cavities. Filling the cavity alters the density of the wall, often causing condensation to occur inside the cavity. If not properly vented, this moisture may cause interior paint and wallpaper to peel, plaster to deteriorate or accelerate the deterioration of mortar joints. It will also cause wood walls to rot, particularly at the sill plate. In addition, some blown-in insulations settle over time, thereby reducing their effectiveness.

Structural Stability of Walls and Foundations

Historic walls, porches and projections lean, rake, heave and develop cracks for myriad reasons. Sometimes these problems are only cosmetic and can be corrected inexpensively. Other times they indicate a structural problem with the wall or foundation.

Correcting wall or foundation structural problems can be very expensive. For that reason, the building owner should have the problem investigated by a qualified contractor, architect or engineer. The owner should obtain alternative methods of correction with considerations made for how each will affect the appearance of the wall or foundation when completed, how much it is likely to cost and how effective it is likely to be.

Windows and Doors

Maintenance, Repair, and Replacement of Doors and Windows

Doors are subject to various forms of deterioration. Wood leafs and surrounds, particularly the threshold and lower portions of the jambs, are susceptible to rot and insect infestation. Brick and stone sills may erode or their mortar joints fail. Door hardware may no longer function properly. The putty or gaskets holding glazing in place may crack or otherwise deteriorate.

Window sashes and surrounds are subject to deterioration from rain, snow, insects, wind-borne grit and pollutants. In addition, window glass may become loose if the putty holding it in place deteriorates and hardware may become worn and inoperable.

Building owners should regularly inspect and maintain their doors and windows. In most cases, consideration should first be given to repairing deterioration using *in-kind* materials. If deterioration is extensive, replacing the entire door or window may be the best solution. If this is the case, the building owner should first consider replacing it in-kind. Only after this proves not technically or economically feasible should consideration be given to replacing a door or window in a *substitute material.*

Some of the more common maintenance problems relating to doors and windows and how they can be addressed are discussed below.

Door and Window Sash

Historic door and window sash is typically made of wood. Wood sash is subject to deterioration by rot, usually caused by improper paint maintenance as well as insect damage. Glass in windows may become loose due to failure of the glazing putty.

Minor rot or insect damage may be repaired using a wood consolidant such as epoxy after the affected area has been properly prepared. More extensive damage- but not so severe as to warrant the replacement of the entire door or window- can be repaired by *scabbing-in* new sections of wood sized and profiled to look like the existing.

If the glazing putty that seals the joint between the glass and the muntins is cracked or brittle it should be removed and the clips that hold the glass in place examined. If they are corroded or missing they should be replaced in-kind and the entire glazing re-puttied.

Door and Window Surrounds and Sills

Wood surrounds may deteriorate as a result of rot, typically caused by improper maintenance of paint and insect infestation. Wind-borne grit or pollutants may abrade brick surrounds, as can constant walking on sills, while both surrounds and sills may deteriorate due to mortar failure.

A building owner should first determine if repairing only the deteriorated portions of a surround or sill using the same material and design is technically and economically feasible. If the deterioration is too extensive for selective repair, the owner should next consider replacing the entire surround or sill in-kind. In both cases, it is important that the repair be profiled and detailed to match the existing so as to preserve the character of the door or window.

Where surrounds or sills are missing they should be duplicated in the original material based on photographic or other documentary evidence. If replacing badly deteriorated or duplicating missing surrounds in the same material and design proves not to be technically or economically feasible, then a substitute material may be used if designed, detailed and colored like the original.

Door and Window Hardware

Door hardware consists of hinges, knobs, pulls and closures. They may become worn through use or go missing. Usually it is better to replace rather than attempt to repair worn hardware. Fortunately, in the past few years period door hardware has become readily available. Replacement hardware should be of the same or a compatible metal and design as the historic.

Window hardware - sash cords, counterweights, cranks, hinges and locks - may also become worn or be missing. Typically, replacement of the damaged or missing parts in-kind is the best maintenance solution. Fortunately, a number of specialty catalogs feature replacement period window hardware.

Replacing Doors and Windows

Door units (leafs and surrounds) that cannot be selectively repaired for technical or economic reasons may have to be replaced. If determined necessary, replacing the door in-kind should be considered first. The replacement should be designed to match the existing in size, profiles, types and number of panels and other character-defining features. This is particularly important for main entry doors.

If using the same material proves not to be technically or economically feasible, then the door may be replaced using a substitute material. As with in-kind replacements, it is important that the design and detailing of the substitute material match the existing door. In addition, the new material should be chemically and physically compatible with those surrounding.

Replacing historic windows is one of the most sensitive issues in historic preservation. Inappropriate replacement windows detract significantly from the property's appearance. Owners should thus consult with the Historic Preservation Commission prior to undertaking any window replacement.

However, if replacing windows is the only option, the building owner should first consider replacing them in-kind, using the same materials as the original designed to match the existing in size, details, profiles and number of lights. Matching the existing window is especially important if it is located on a primary character-defining elevation. If located on a rear or side elevation not seen from the public right-of-way, the replacement should be the same size as the existing, but may if necessary differ in profile, number of lights and other character-defining features as long as it is designed to be compatible with the building.

If using the same material proves not to be technically or economically feasible then the window may be replaced using a carefully considered substitute material. The design, profile, color, details, surrounds, number of lights and other character-defining features of the historic window should be matched as closely as possible in the new material, particularly if the window is located on a primary elevation.

In addition to being compatibly designed, the substitute material should be chemically and physically compatible with adjacent materials. That is, the contraction and expansion ratios of the substitute and surrounding materials- those of the jamb, head and sill or those of the opening- should be similar and non-reactive with each other.

Improving Thermal Efficiency of Doors and Windows

Building owners often wish to upgrade the thermal efficiency of their historic doors and windows. This can be done by adding *weather stripping, caulking* or installing new *storm doors or windows.* If existing windows are so deteriorated that they must be replaced, the building owner should consider installing new *thermal windows.*

Weather Stripping and Caulking Historic weather stripping is made from thin strips of copper, zinc or felt. Located between the door leaf or window sash and jambs, it provides an almost air tight seal. Modern weather stripping is made from copper or aluminum. If worn or missing, new weather stripping should be installed.

Modern caulking compounds have replaced tar-impregnated hemp rope as the sealant between the jambs, head, sill and opening. Applying new caulking can help improve the energy efficiency of the building. Building owners should carefully select caulking that is chemically compatible with the materials of the window and wall. The caulking should also be of a compatible color.

Storm Doors Adding new storm doors will also improve a building's thermal performance. If this option is considered the building owner should make sure that the design, size, materials and color of the new storm door are compatible with the existing and that clear glazing is used.

Storm Windows Unlike historic storm windows that must be removed and replaced with screens in the summer, modern storm windows feature operable storms and screens. New exterior storm window units are usually made of aluminum, some with factory applied paint or vinyl cladding. Sash and frame profiles to match many historic windows are available or may be specially ordered from local suppliers.

The appearance of a new exterior storm window is critical to its compatibility with the historic window. Its design should match, as closely as possible, that of the historic window in size, profiles of sash, frame and muntins, number of lights and other character-defining features. Clear, not tinted or reflective glass, should be used in new storm windows for historic buildings.

An alternative to exterior storm windows are ones installed on the inside of the window sash. The major advantage of internal storm windows is that they tend to be less expensive than exterior storm windows because they may be of a single undivided pane of glass rather than divided lights. The major disadvantages of internal storm windows include that they require modifying the historic window to prevent condensation from occurring and may alter the interior window reveals.

New internal or external storm windows should fit within the existing window opening. Blocking-down heads or blocking-in sides to fit the opening to the storm window should not be done.

Thermal Windows If existing historic windows are so badly deteriorated that they need to be replaced, the building owner should consider installing double or triple-pane thermal windows.

The glass used should have the same reflectivity as the original. Energy efficient E-glass, which has slightly different reflective characteristics, is an acceptable substitute material.

Roofs

Maintaining, Repairing, and Replacing Roofs

Roof structure, membranes, eaves, flashing, gutters and downspouts are subject to deterioration caused by rain, snow, hail, wind and pollutants. Sometimes roofs are also subject to deterioration from insects, foot-traffic, vegetation growth and the actions of birds, squirrels and other animals.

Building owners should regularly inspect and maintain existing roof materials and features. Inspecting a sloped roof can most easily be accomplished from the ground using binoculars. Flat roofs are normally accessible for inspection. When deterioration is detected, the building owner should consult with a roofer knowledgeable in historic roofs to determine the best course of action. In most cases owners should first consider repairing only those areas needing attention using *in-kind* materials. If the deterioration proves more extensive, replacing the entire roof material, feature or projection in-kind should next be considered. Only after repair and replacement in-kind have been determined not technically or economically feasible should the owner consider using a *substitute* material that is chemically and physically compatible with adjacent materials and similar in appearance to the original.

Roofs consist of a number of components that contribute to their ability to protect the building from the weather, their appearance and their ability to support roof-mounted equipment. The most important components of roofs are the: *structure, membrane, eaves, flashing, gutters and downspouts* and *projections.*

Structure The structure of a roof is almost always hidden from view. Typically made of wood, it forms the skeleton that supports the roof decking and membrane as well as other roof components, equipment and structures. The structural members give the roof its shape.

Membrane The roof membrane is the external material used to cover the roof decking that provides the weather-tight surface for a building. When visible the membrane also gives the roof its color, scale and texture. Historic roof membranes in St. Mary's County are made of wood, metal, slate or asphalt.

Eaves The portion of a sloped roof extending beyond the line of the wall is called an eave. Functionally it serves to protect the upper portion of the wall from rain and snow and often provides space to connect gutters. Visually, the eave creates a transition between the vertical wall surface and the sloping planes of the roof. Eaves are usually made of wood.

Flashing Historically made of copper, lead or galvanized steel, flashing covers junctions between the roof and the walls as well as changes in roof slope while sealing the joints between the roof membrane and projections such as chimneys and towers.

Gutters and downspouts Gutters and downspouts are the primary means of channeling water from the roof to the ground, sometimes directly into storm sewers. Their proper maintenance is critical to maintaining a watertight building. Their design is important to the appearance of a building. Historically, exterior gutters and downspouts were made of copper and galvanized steel, with modern ones constructed of aluminum.

The following sections discuss common maintenance and repair problems with roof components and how they may be addressed so as to preserve the architectural character of a building is preserved. This section also discusses acceptable substitute replacement materials.

Roof Structure

Deterioration of the roof structure is almost always due to a lack of proper maintenance of the roof membrane. This allows water to penetrate into the attic or roof cavity, promoting rot in wood decking, joists and beams. Wood roof structure is also susceptible to insect infestation.

Minor rot or insect infestation in wood structural members may be repaired by injecting a consolidant, such as epoxy, into the problem area after the cause of the deterioration has been corrected and the area properly prepared. More extensive damage to wood structural members may require scabbing-in new wood or *sistering* new joists or beams. Sistering involves placing new structural members on either side of an existing member. If the deterioration of the wood structure is extensive it may need to be totally replaced. Typically, it is most cost effective to replace a wood structure with wood of the same structural capacity, rather than use a different material.

Flat Roof Membrane

Flat roof membranes are subject to cracking, called *alligatoring*, delaminating of the felt layers and thinning of the gravel ballast. Minor cracking can often be repaired by applying roofing tar to the affected area. More extensive cracking may require that the affected section be removed and a new built-up roof installed. Thin gravel may be corrected by applying a new layer of tar and gravel to the roof. If the built-up membrane is extensively deteriorated, or is more than twenty years old, the building owner may wish to investigate replacing the entire membrane. Since flat roofs are typically not visible from the ground (and thus do not contribute to the appearance of a building) the owner may wish to consider a modern single-ply, or "rubber," roof rather than a traditional built-up roof.

Sloped Roof Membranes

Wood Shakes and Shingles Historically, wood shakes were hand split which gave them a rough surface, while wood shingles were sawn, therefore having a smoother texture. Although today both are machine made, shakes still maintain a rougher appearance. Shakes and shingles are subject to cracking, splitting, and becoming detached from the roof. They may also rot or become infested with insects. Typically shakes and shingles are replaced rather than repaired.

Slate Slate is one of the most robust roof membrane materials. Typically, a slate roof will last fifty years or more. However, slate is not maintenance free. It is subject to cracking, usually caused by foot traffic, hail or falling tree limbs. Corrosion of the anchors used to attach the slate to the roof may also cause it to detach from the decking. Replacement slate can still be readily obtained in a wide range of shapes and colors to match an existing roof. In addition, some synthetic slates are acceptable substitutes for real slate.

Asphalt shingles Asphalt shingles are subject to wear from foot traffic, abrasion and lifting by wind and puncture from hail and falling tree limbs. Typically, a good quality asphalt shingle will last twenty years before it requires replacement. Fortunately, except for some early twentieth century asphalt shingles, most of the sizes, shapes and colors of asphalt shingles found on historic houses today can be obtained if replacement is necessary.

Metal Standing seam metal roofs, typically made of tin, galvanized steel or terne plate, are subject to lifting in strong winds, rust and fading over time. Typically a good quality metal roof will last fifty years or more, particularly if it is well maintained. If it becomes necessary to repair or replace a metal roof, replacement material is readily obtainable.

Eaves

Wood eaves often deteriorate more rapidly than those built of other materials, as they are subject to rot and insect infestation. Minor damage to wood cornices and eaves may be repaired using epoxy or other suitable injected materials while small areas may be replaced by scabbing-in new wood. In both cases, the repair should be detailed in the same manner as the original. In cases of extensive deterioration, the entire cornice may be replaced in wood or in a compatible substitute material, such as fiberglass, that is designed to match the original's design, profile, details, color and other defining characteristics.

Flashing

Copper, lead and galvanized steel are subject to pitting and thinning, primarily due to wind-borne grit. Typically the damaged sections should be replaced with the same type of metal. Aluminum may be an acceptable substitute flashing material.

Gutters and Downspouts

Historic gutters and downspouts are made of copper, lead and galvanized steel. They are subject to corrosion and detachment due to connection failures. When the latter occurs, they can often be simply reattached using the appropriate type of metal connector. When badly corroded or missing, the affected sections can usually be replaced using the same type of metal. When replacing gutters and downspouts, it is important that the new match the size and profile of the original.

In some cases copper downspouts and even gutters are stolen from buildings for the value of the metal. If this becomes a problem, replacing the copper with aluminum designed to match the original in size and profile and colored to simulate the patina of copper is an acceptable solution.

Finials and Cresting

Most finials and cresting are made of metal. Accordingly, they are subject to corrosion. Typically they can be repaired by brushing the corrosion with a wire brush and repainting or, for more extensive corrosion, removing the finial or cresting from the roof and dipping it in an appropriate chemical bath. After priming, the feature should be reinstalled and painted. Missing finials and cresting should be duplicated in metal based on historic photographs or other documentation and re-installed. New finials or cresting should not be added to roofs where they did not historically exist.

Insulating a Roof

Many property owners wish to insulate their historic roof to reduce energy consumption. Since the location of roof insulation rarely affects the appearance of the building, it is usually acceptable to add insulation to historic roofs. If the building has a sloped roof and accessible attic space, installing insulation is fairly easy and inexpensive. In many cases, installing rigid insulation on top of existing flat roof decking is the least expensive method. In all cases, it is important that the newly insulated roof be properly vented so that condensation does not develop, thereby avoiding potential deterioration of the roof structure and other components.

Appendix Six: *Useful References*

The following are references to assist property owners and tenants in maintaining their historic buildings and landscapes as well as making appropriate changes.

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Light, Sally. *House Histories: A Guide to Tracing the Genealogy of Your Home.* Spencetown, NY: Golden Hill Press, 1995.

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National Park Service. *National Register of Historic Places.* Washington, DC: Government Printing Office, nd. Also available on line from www.nps.gov.

National Park Service. *Preservation Briefs.* Washington, DC: Government Printing Office, various dates. Also available on line from www.nps.gov.
The following briefs should be particularly helpful.

1. *The Cleaning and Waterproof Coating of Masonry Buildings.*
2. *Repointing Mortar Joints in Historic Masonry buildings.*

3. *Conserving Energy in Historic Buildings.*
4. *Roofing for Historic Buildings.*
6 *Dangers of Abrasive Cleaning to Historic Buildings*
8. *Aluminum and Vinyl Siding on Historic Buildings: The Appropriateness of Substitute Materials for Resurfacing Historic Wood Frame Buildings.*
9. *The Repair of Historic Wood Windows.*
10. *Exterior Paint Problems on Historic Woodwork.*
11. *Rehabilitating Historic Storefronts.*
14. *Exterior Additions to Historic Buildings: Preservation Concerns.*
16. *The Use of Substitute Materials on Historic Building Exteriors.*
17. *Visual Aspects of Historic Buildings as an aid to Preserving Their Character.*
18. *Rehabilitating Interiors in Historic Buildings: Identifying Character-Defining Elements*
19. *The Repair and Replacement of Historic Wooden Shingle Roofs.*
21. *Repairing Historic Flat Plaster – Walls and Ceilings.*
22. *The Preservation and Repair of Historic Stucco.*
23. *Preserving Historic Ornamental Plaster.*
25. *The Preservation of Historic Signs.*
28. *Painting Historic Interiors.*
29. *The Repair, Replacement and Maintenance of Slate Roofs.*
32. *Making Historic Properties Accessible.*
35. *Understanding Old Buildings: The Process of Architectural Investigation.*
36. *Appropriate Methods of reducing Lead-Paint Hazards in Historic Housing.*

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Von Rosentiel, Helene and Gail C. Winkler. *Floor Coverings for Historic Buildings: A Guide to Selecting Reproductions.* Washington, DC: Preservation Press, 1988.

Wagner, Richard. *The New Old House Starter Kit.* Washington, DC: National Trust for Historic Preservation Information Series, 1997.

Note: Asterisk denotes publications available only at the St. Mary's County Department of Land Use and Growth Management.

Appendix Seven: *Useful Online Resources*

The following are additional resources available on the internet to assist property owners and tenants in maintaining their historic buildings and landscapes.

American Memory Page, Library of Congress: http://memory.loc.gov/ammem/amhome.html

Land Use and Growth Management Site (under the County site) http://www.co.saint-marys.md.us/planzone/

Maryland Historical Trust: http://www.marylandhistoricaltrust.net

National Park Service: http://www.nps.gov/

National Trust for Historic Preservation: http://www.nthp.org

Preservation Maryland: http://preservemd.org

St. Mary's County Government Official Web Site: http://www.co.saint-marys.md.us

St. Mary's County Public Library System: http://www.stmalib.org

St. Mary's County Historical Society: http://smchistory.org

Appendix Eight: *Glossary*

Archaeological Assessment Preliminary determination of the presence of archaeological resources in a particular area.

Bulls-eye Window A round window, often divided by muntins.

Character-defining Element Any part of a building that if removed or inappropriately altered would compromise its architectural character.

Documentary Evidence Written or graphic information about the history or appearance of a building or landscape.

Fanlight A window, often semicircular, over a door with radiating glazing bars suggesting a fan.

Fenestration Typically the doors and windows on the facade of a building.

Historic Resource A building, object, landscape, structure, or other physical element that has been judged to be historic due to its architecture or association with an historic person or event.

Luminaire Light bulb, or other light source.

Maintain To keep in an existing state. The Secretary of the Interior's *Standards* views maintaining historic material preferable to replacement or restoration.

Preserve To protect, to keep from harm or destruction. Preservation of an historic building or landscape may involve maintenance, as well as rehabilitation, replacement or restoration.

Public Right-of-Way Public streets, sidewalks, alleys, parking lots, and easements.

Rehabilitation. To return to a state of usefulness. Rehabilitation often includes maintenance, as well as replacement and upgrading of systems, structure or other factors to comply with building codes as well as functional requirements.

Replace To put something new in place of something worn out or destroyed. Typically the replacement part has the same physical characteristics and attributes as the one being replaced.

Repointing To replace missing and loose mortar in brick and stone walls. Also known as tuckpointing.

Restoration To return a building or landscape back to a selected point in time.

Scenic Corridor A road, trail, river or other linear corridor that is considered scenic. Section 62.7 of the St. Mary's County Comprehensive Zoning Ordinance defines the five scenic road corridors in the county.

Sidelight A vertical window located to the side of a door.

Spalling The breaking off of the exterior layer of stone or brick, often caused by water freezing just under the surface.

Terne plate Iron plate dipped in an alloy of lead and tin. A popular metal roofing material in the 19th and early 20th centuries.

Transom A horizontal bar above a window.

Transom Window A horizontal window located above display windows and entries in commercial storefronts.

View Shed The view from a particular point to or from an object, typically defined as the area within a 60° angle bisected by a straight line from the viewer to the object.

Voussoir One or more wedge shaped sections of an arch.

Window Light A pane of glass.

Working Landscape A landscape that is actively used for farming, grazing, tree or wood production, usually for commercial purposes.

Appendix Nine: *Americans with Disabilities Act*

Introduction

In 1990 the Americans with Disabilities Act (ADA) became law. Its purpose is to ensure that most buildings constructed or altered after January 1992 and used by the public will be accessible, to the greatest extent possible, to persons with disabilities.

ADA accessibility requirements specifically apply to *public accommodations, commercial facilities* and *government buildings.* Public accommodations refers to hotels, restaurants, theaters, retail shops, service shops, transportation terminals, museums, schools, day care centers and other types of buildings typically frequented by the public. Commercial facilities refers to factories, warehouses, office buildings and other types of buildings primarily used by employees and business owners. Government buildings include those owned, leased or otherwise used by the local, state or federal government or by any government agency or instrumentality.

While historic buildings are not exempt from ADA requirements, the Act recognizes that compliance may "threaten or destroy" significant architectural spaces, features, materials or finishes. Thus the Act establishes a consultation process that may allow *alternative minimum requirements* or *alternative methods of compliance* to be used. Alternative minimum requirements are typically adjustments made to dimensions of ramp slopes, door widths, and other features that will allow accessibility without significantly altering historic features, materials or finishes. Alternative methods of compliance are typically other ways to achieve accessibility. For example, in an historic house museum it may be possible to provide videotapes or CD-ROM information on the building and exhibits in an accessible location rather than provide accessibility to all floors.

Planning Accessibility

Adapting an historic building to meet ADA requirements should begin with an inventory of existing *architectural barriers* - steps, doors, interior stairs, restrooms and the like - that prevent persons with disabilities from using the building. The inventory should include a description of the significance of the features describing their design, materials, finishes and importance to the historic character of the building. Next, methods of eliminating the barriers or providing alternative methods of compliance should be investigated. Each should consider how the modification would affect the character of the feature. In some cases, alternative minimum requirements may be investigated.

Building Site

A route accessible to persons with disabilities from the public sidewalk or on site parking lot is often easy to achieve without significantly altering the character of the building or its site. For example, parking spaces can be designated for persons with disabilities and curb cuts made in appropriate locations. Sidewalks are typically wide enough (3' - 0") to accommodate wheelchairs, or can be widened with minimal change to the landscape. Steps from public to private sidewalks can often be modified with ramps or alternative paths developed.

When modifications are made to parking areas, curbs and sidewalks it is usually appropriate to use the same type of material as that existing. If a new material is introduced, it should be compatible

in scale, texture and color with the historic material and the character of the building and landscape.

Building Entrance

Creating an accessible entrance may require modifying steps, landings, doors and thresholds or adding ramps or exterior lifts. Typically, the accessible entrance should be the primary public entrance to the building. If modifying this entrance or adding ramps or lifts at this location would significantly alter the historic character of the building then a secondary public entrance may be considered. Rarely, if ever, should rear or service entries be made the primary accessible entrance.

Building Interior

Creating an accessible interior may require adding stair lifts or elevators and modifying interior doors, restrooms and amenities such as water fountains and telephones.