THE COLORS OF CULTURE:  
A FINISHES STUDY  
OF THE  
DUTCH-AMERICAN STONE HOUSES OF  
BERGEN COUNTY, NEW JERSEY  

Kimberly Michele De Muro  

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INTRODUCTION

The Dutch-American Stone Houses of Bergen County, New Jersey represent “one of the largest surviving clusters of a significant early American regional building type” in the United States.1 Built from the early eighteenth to the middle of the nineteenth century, these houses are commonly characterized by the employment of structural members based upon H-bent frame construction, red sandstone elevations, and steep gable or gambrel-shaped roofs. Although a large body of research has been undertaken concerning this vernacular house type, including research on those stylistic traits just mentioned, little if any research has been published concerning the architectural finishes of these distinct structures. The aim of this thesis is to identify if a palette of distinctively Dutch paint colors for interior and exterior paints existed and was employed in the Dutch-American Stone Houses of Bergen County from 1740 to 1776; or, if the paint colors employed within these houses were part of a larger colonial trend.

Interior and exterior architectural finishes were widely employed by those living in the Netherlands in the seventeenth century, and the practice transferred with this cultural group to the New World. Although there is no physical evidence of architectural finishes during the earliest years of New Netherlands’ settlement, by the beginning of English rule in 1664 architectural paint was employed on both interior and exterior architectural surfaces of Dutch and Dutch-American houses.2

Although the Dutch in colonial Bergen County would have constructed houses during their earliest years of settlement from the mid-seventeenth century through the early to mid-eighteenth century,

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2 Lisa Bruno, email message to the author, March 10, 2011; Site visit by the author to the DeWint House, Tappan, NY, April 2011.
few, if any, of these early houses remain. By the beginning of the period of study, an interplay of the Dutch and English building traditions employed in the colonies through the seventeenth and eighteenth centuries, modified by the available materials and climate of the Hudson River Valley and Bergen County region, evolved into the well-studied, Dutch-American house form. As such, the period of study has been limited to reflect the lack of early, extant Dutch stone houses in and within the vicinity of Bergen County, New Jersey. The period of study begins in 1740, the estimated date of construction for the John Naugle House (for which the author completed a paint study as a part of this Master’s thesis) and ends in 1776, with the United States declaring their independence from Great Britain.

The population of Bergen County during the period of study was quite diverse, however, the area continued to be defined by its early settlers’ Dutch culture. As T. Robins Brown and Schuyler Warmflash state in their work, *The Architecture of Bergen County, New Jersey*:

> They [the 18th c. residents of Bergen County] were Dutch, as well as French Huguenots, Flemish, Germans, and others who intermarried and adopted the Dutch-American cultural norms about them. They worshiped in Dutch Reformed Churches for the most part and continued to speak “Jersey Dutch” well into the nineteenth century.³

Those who traveled through Bergen County, New Jersey during the colonial period frequently commented about the “Dutchness” of the province. At the beginning of the Revolutionary War, a British officer described the inhabitants of Bergen County as being “chiefly the posterity of the first settlers . . . who were Dutch, and they seem to retain their principles, industry, frugality and assiduous perseverance in the means of striving.”⁴

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Within the larger region of the Hudson Valley, as well as Manhattan, Brooklyn, Long Island, and New Jersey, the importance and distinction of the Dutch community's decorative arts and culture has been widely recognized. Contemporary accounts, such as day books, ledgers, letters, estate inventories and travelers’ accounts, describe the richness of Dutch cultural items, some of which can still be viewed in museum and historical society collections today: the traditional Dutch kas (tall cupboard) and other furniture pieces, portrait paintings, religious paintings, prints, decorative tiles, silver spoons, and spoon boards, among them. The prevalence of tangible Dutch cultural items highlights the important role decorative arts played in the everyday life of Bergen County residents during the colonial period.5

Similar to other cultural items, architectural finishes are reflective of the cultures from which they are a part. Considering the importance of decorative materials to the Dutch-American culture, it is not unreasonable to speculate about the presence and cultural significance of their architectural finishes; specifically, if these architectural finishes were particular to this colonial group, or if the paints used in these homes were a part of a larger trend within the various American colonies of North America.

The period of study, from 1740 to 1776, probably represents the last period in which a purely Dutch color paint scheme may be found. It is during this time that consumerism, which would explode after the American Revolution, became well established, as will be discussed in Chapter Four. During the eighteenth century, an unprecedented number of new commercial goods, including pigments, were introduced to the colonial realm. This accelerated trade correlated with

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5 Several collections of colonial-era Dutch paintings and decorative arts are held at The Metropolitan Museum of Art, Brooklyn Museum, New York Historical Society, Albany Institute of History and Art, and National Gallery of Art, among others.
a growth in consumerism, fostered by an increase in the availability of goods, an expansion in overseas trade with Great Britain, and domestic transportation improvements, both by water and land.

The Dutch of Bergen County were not an exclusive market for the purchase of imported goods. They most certainly were members of a larger society in which these goods were highly sought and valued. By the early 1720s, the importation of English goods to the American market was done on a fairly regular basis as business ventures; it expanded and accelerated between the 1740s and the eve of the Revolutionary War. In fact, by the mid-eighteenth century New England, a handful of colonies in North America, had become England’s largest export market in the entire world.6

England’s exclusive rights to trade with the American colonies, in addition to growing English immigration and settlement, led to the increasing influence of English culture on the Dutch population. The degree of assimilation varied according to the amount of English influence to which a particular Dutch population was exposed. In some areas, such as New York City, these English cultural habits were quickly accepted, while in others, such as Albany, they were not.

This thesis considers these outside commercial and cultural influences, as well as what is known of the Dutch-American culture and their architecture finishes to determine if a particular palette of distinctively Dutch paint colors was used in the Dutch-American Stone Houses of Bergen County,

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New Jersey from 1740 to 1776, or, if the paint colors in use at that time were part of a larger colonial trend.
**METHODODOLOGY**

As a part of this Master’s thesis, paint samples were extracted from three houses and/or their wood architectural elements located within Bergen County, New Jersey: the John Naugle House, Closter, New Jersey; the Isaac Naugle House, Closter, New Jersey; and the Westervelt House, Tenafly, New Jersey. Each house was selected after a thorough examination of available evidence related to eighteenth century stone houses within New Jersey and the vicinity was undertaken.

Initially, because the focus of this thesis was paint colors in Dutch-American houses within New Jersey, a determination had to made as to where the most heavily populated Dutch area of New Jersey during the eighteenth century was located. Historically, two concentrations of Dutch culture existed in the state: Bergen County, located in the north, and Somerset County, located in the central portion of the state. To resolve where a higher concentration of those immersed in the Dutch culture existed, a study of Reformed Dutch Churches in each area was performed. In North America, the Reformed Dutch Church served as the center of Dutch culture and the Dutch-American community. As such, the Church’s presence within a geographic location signaled the existence of this community. Through research, it was discovered that Bergen County and its adjacent areas had more Reformed Dutch Churches during the period of study than its Somerset counterpart.\(^7\)

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\(^7\) According to Firth Haring Fabend, “From Albany to the Hackensack Valley to the Raritan Valley, in Manhattan, in Brooklyn – in every geographical area where the Reformed Dutch Church flourished – its members’ intensely active social lives centered around church-related activities, often as many as six or eight a week, and a diverse range of purely secular activities, such as parties.” In short, the Reformed Dutch Church served as the center of the Dutch communities throughout the wider Dutch cultural region of New York and New Jersey. It appears that the Reformed Dutch Church served as the spiritual, cultural, and geographic center of many of these communities. A visitor to Dumont, Bergen County, New Jersey in 1899 remarked that hundreds of people who continued to speak Jersey-Dutch (a Dutch dialect spoken in Bergen and Passaic Counties into the early twentieth century) lived within a five-mile radius of the Schraalenburgh Church. During the colonial era, however, there is evidence of persons who regularly traveled ten miles to attend services at the Dutch Reformed Church. Firth Haring Fabend, “The Reformed
Once Bergen County was selected as the geographic region of focus, research was undertaken to select houses to be included within this Master’s thesis. Initially, the Bergen County Stone House Survey at the Bergen County Division of Historic and Cultural Affairs was consulted. This document is a compilation of the original survey forms completed by Claire K. Tholl for the Stone Houses of Bergen County Thematic Nomination for the National Register of Historic Places. The author went through the entire survey, compiling a list of possible houses based on estimated dates of construction. The author then contacted Tim Adriance, a Historic Preservation Specialist based out of Bergen County, to further refine the list. Mr. Adriance assisted the author in gaining access to the privately-owned John Naugle House, and sampling architectural elements from the Isaac Naugle House. The Bergen County Department of Historic and Cultural Affairs assisted the author in contacting Kevin Tremble, the owner of the Westervelt House.

Each of the houses chosen, the John Naugle, Isaac Naugle, and Westervelt House, met the various parameters set by the author’s thesis requirements (Figure 1). Each was located within the geographic region of colonial Bergen County, within ten miles distance of a Reformed Dutch Church and the Persistence of Dutchness in New York and New Jersey,” in Dutch New York, The Roots of Hudson Valley Culture, ed. by Roger Panetta (Yonkers, NY: Hudson River Museum/Fordham University Press, 2009), 152 – 154; “The Ramapo Reformed Church,” Ramapo Reformed Church, accessed February 4, 2017, http://ramaporeformedchurch.org/about_us.html. According to the author’s research, by 1776 there were fourteen Dutch Reformed Churches located within northern New Jersey and southern New York: one in present-day Rockland County, New York; two in present-day Passaic County, New Jersey; seven in present-day Bergen County; two in present-day Morris County; two in present-day Essex County; and one in present-day Hudson County, or approximately one church in every 38.9 square miles (This number was calculated by allowing for a five mile radius around each known church location or area, if the congregation had been organized but a permanent church had not yet been constructed). Comparatively, there were ten Dutch Reformed Churches located with central New Jersey by 1776: two in present-day Hunterdon County; six in present-day Somerset County; one in present-day Middlesex County; and one in present-day Monmouth county, or approximately one church every 51.84 square miles (It is important to note that the Dutch Reformed Church in Monmouth County, New Jersey, was located fifteen miles away from the closet Dutch Reformed Church in New Brunswick, New Jersey. However, because of the close proximity, it was included in this tally. If removed, the number of Dutch Reformed Churches drops down to nine, or one approximately every 54.48 square miles). Although the author created this list after consulting several primary and secondary documents regarding the establishment of Dutch Reformed Churches in these areas of northern and central New Jersey, it does not preclude that there may have been other Dutch Reformed Churches in existence prior to 1776.
Church, constructed between the years of 1740 to 1776, and lastly, exists today as a reasonably well-preserved example of a Dutch-American Stone House.

A significant amount of research was undertaken to create a historic context for the Dutch in Bergen County during the period of study from 1740 to 1776, to help both the author and the reader understand the community and society in which these people lived. Chapter One explores the early history of colonial Bergen County, including changing boundary lines, as well as early settlements, settlement patterns, and demographics during the period of study. Chapter Two better defines the distinctive Dutch culture of Bergen County and the wider Dutch cultural region of New
York and New Jersey, and explains how this culture was able to continue into the nineteenth century. Chapter Three focuses on the evolution of Dutch-American architecture from its Netherlandic roots to a style which maintained several early attributes but by the mid-eighteenth century also incorporated English stylistic features, mainly those of the Georgian architectural style.

A discussion on paint availability and use begins in Chapter Four, which examines the pigments available to the residents of Bergen County during the period of study and the larger consumer revolution that was taking place during the eighteenth century. Chapter Five observes paint use by the Dutch throughout the larger Dutch cultural region as well as Bergen County. This includes a study of Dutch material culture and architectural features, as well as primary documents and firsthand accounts, secondary sources and scholarly articles, and the accounts of historic preservationists specializing in Dutch-American architecture and previously completed paint studies.

A number of cultural institutions and small house museums have undertaken paint studies of both interior and exterior architectural features of Dutch and Dutch-American houses within the larger Hudson Valley region. The main objective of many of these studies was to identify either the original paint color used or to determine a paint color for a specific period of significance. It is important to note that the techniques used to complete paint studies and paint analysis have evolved over time. Early paint studies used the scrape method, which entailed literally scraping away layers of paint to reveal earlier layers of paint, with the conservator visually identifying individual paint layers and paint colors. This technique posed various issues with accuracy, including unknowingly missing individual layers, and paint color matching. In the 1950s, Penelope
Hartshorne Batcheler, a National Park Service architect, pioneered the use of the stereomicroscope to study paint while working on the restoration of Independence Hall in Philadelphia.⁸ Today, this technique continues to be used, with paint samples (ideally with attached substrates) being removed from an architectural feature, set in a clear casting resin, and examined with a stereomicroscope. In doing so, a conservator can accurately identify the stratigraphy of painted layers. These layers are then matched to a color standard, one such standard being the Munsell color system, as well as a commercial paint color, such as Benjamin Moore.⁹ Beginning in the 1970s, paint analysis also grew to include chemical testing and fluorescent staining, used to identify the particular pigments used to create the paint, as well as the paint media, or binder.¹⁰

Larger cultural institutions, including the Metropolitan Museum of Art and the Brooklyn Museum, have in-house conservation departments that undertake this work. Smaller house museums, on the other hand, contract with architectural conservation firms and architectural paint conservators. A number of paint studies were located, which provided some insight into early paint colors used within the larger New York and New Jersey region. These studies include an exterior and interior study of the Wyckoff-Garretson House (c. 1715 with alterations and additions dating to from the mid-eighteenth to the early nineteenth century) in present-day Somerset, Somerset County, New Jersey, an interior and exterior study of the Van Cortlandt Manor (original portion possibly constructed in the seventeenth century, with several alterations completed by 1749) in present-day Croton-on-Hudson, Westchester County, New York, exterior study of the Jan Martense Schenck

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¹⁰ Ibid., 173.
House (c. 1675) originally constructed in the town of Flatlands in Brooklyn, New York and now located in the Brooklyn Museum, the Dutch Period Room, which is the larger chamber of the Daniel Peter Winne House (c. 1750) originally constructed in Bethlehem, Albany County, NY, now located in the Metropolitan Museum of Art), and the Abraham Hasbrouck House (1721-1734) in present-day New Paltz, Ulster County, NY.

Locating additional paint studies, as well as houses, from this period in Bergen County proved difficult. Only the Dey Mansion (1740-1750) exhibited historic paint colors from the period.¹¹

Unfortunately, in a number of Dutch-American houses the earliest paint layers are no longer extant, most probably due to paint stripping, refinishing, or the complete replacement of certain architectural features. This was found to be the case for both the interior and exterior of the Nicholas Schenck House (c. 1770-1775), originally constructed in Canarsie, Brooklyn, NY, now located in the Brooklyn Museum. In 1929, the City of New York Parks and Recreation gave the house as a gift to the Brooklyn Museum. The house was completely stripped of all paint finishes before it was disassembled and brought to the museum that same year. The interior of the Jan Martense Schenck House (1675), originally constructed in Brooklyn, NY, now also housed in the Brooklyn Museum, had been dramatically altered over time, thus it did not retain its earliest original paint layers. Two additional houses, both located in Bergen County and dating from the historical period studied herein, lacked original paint layers as well. The paint study undertaken by the Campbell-Christie House (c. 1774), originally located in New Milford, revealed only early twentieth century paint layers, while the paint study of the Kearney House (c. 1761), located in

¹¹ Changing political boundaries now place the Dey Mansion in Passaic County, NJ, although when constructed it was part of Bergen County. A paint study of the Dey Mansion, “Historic Finishes Study: Dey Mansion, Wayne, N.J.” was completed by Materials Conservation Collaborative, LLC in 2012.
Alpine, only exhibited paint layers from the late nineteenth century on. Because of the limited amount of physical evidence of early paint finishes remaining in Bergen County houses of the eighteenth century, it is particularly important to provide a full discussion of the paint materials available to residents of Bergen County at that time period. Chapters Four and Five are an effort to lay out the type, relative cost, and general availability of paint materials in the New York area generally and Bergen County in particular, where possible.

Chapter Six focuses on the findings of the three paint studies of Dutch-American Stone Houses in Bergen County completed by the author, as well as the exterior paint study of the Westervelt House completed by Acroterion, Historic Preservation Consultants in 1995 and the Dey Mansion paint study completed by the Materials Conservation Collaborative, LLC in 2012. Chapter Seven delves into a comparison of the John Naugle, Isaac Naugle, and Westervelt houses, drawing conclusions regarding the commonalities between each house’s original owner, as well as similarities and differences between early paint colors and use. These findings are then compared against the identified (though scant) primary documentation of paint use within Bergen County during the period of study. Along with information from the Dey Mansion paint study, it is possible to develop a palette of paint colors in popular use in Bergen County during the period of study.

In Chapter Eight, to confirm if the trends identified were, in fact, specific to the Bergen County Dutch, or perhaps to the larger Dutch American cultural region, color schemes found in Bergen County are compared against those found in the larger Dutch-American community. To further ascertain if the color palette found in the Dutch-American Stone Houses of colonial Bergen County was particular to that region or perhaps part of a larger trend throughout the American colonies, a
comparison to the color palette of colonial North America developed by Frank S. Welsh and published in *Paint in America: The Colors of Historic Buildings* was undertaken.
CHAPTER 1: THE EARLY HISTORY OF COLONIAL BERGEN COUNTY AND THE BERGEN COUNTY DUTCH

The northeast corner of New Jersey, now known as Bergen County, is one of the longest continuously settled areas within the original thirteen colonies of the United States of America. After the creation of the Dutch East India Company in 1621, the first wave of Dutch settlement centered around New Netherland, in areas now known as Manhattan, Brooklyn, Queens, Staten Island, and Jersey City. The increasing population and lack of available land encouraged the next generation of inhabitants to move outside of this central locale into the areas today known as Westchester and Long Island, New York, and Bergen County, New Jersey. The early settlement of Bergen County, by a population both ethnically and culturally Dutch, led to an area largely characterized by this cultural group well into the nineteenth century.

From the beginning of European settlement to the founding of the American Republic, Bergen County was under the dominion of three distinct entities: the Netherlands from 1609 to 1664, England from 1664 to 1783, and the United States from 1783 to present day. The period of study, from 1740 to 1776, encompasses the last decades Bergen County and the American colonies under English colonial rule. As a result of changing leadership in addition to changing times, Bergen County underwent various boundary changes and settlement patterns during these different periods of occupation (Figure 2).

12 Brown and Warmflash, Architecture of Bergen County, 9.
Under Dutch rule before 1664, the area yet to be called Bergen County was not a legal entity in and of itself. Still a part of larger New Netherland, there were very few early settlers who chose to live in this vicinity, the majority preferring to reside in present day Manhattan, Brooklyn, Queens, and Staten Island. Of those who did purchase land from the Lenni-Lenape Native American tribe, in those areas to the west of the Hudson River, their interest centered on trade more so than settlement.\(^{14}\) Two of the area’s earliest attempts at permanent settlement were the

Vriessendael colony (present day Edgewater, New Jersey), founded by Daniel de Vries in 1640, and Achter Col (present day Bogota, New Jersey), patented to Myndert Myndertsen and Godard Van Reede, heer Van Nederhorst in 1642.\textsuperscript{15} Both early settlements, however, were completely wiped out by Native American attacks associated with the Indian War of 1640-1643.\textsuperscript{16}

Consequently, the first permanent settlement to survive in northern New Jersey did not occur until almost twenty years later, with the establishment of Bergen (present day Jersey City) in 1660. This was the result of Tielman van Vleck and Pieter Rudolphus’ third petition to Governor Stuyvesant and his Council in 1660 to “settle on the maize land” behind Communipaw.\textsuperscript{17} The reluctance of this authoritative body to allow for new settlers in the region arose from the early devastation of Vriessendael and Achter Col. Interestingly, Bergen was the first and last permanent settlement in New Jersey to be established by the Dutch before the English conquered New Netherland in 1664.

In that year, Dutch rule gave way to the English upon Charles II granting New York and New Jersey to his brother James, Duke of York. James subsequently granted New Jersey to Sir George Carteret as well as to John, Lord Berkeley.\textsuperscript{18} The two then agreed upon a division of the colony in 1676, a diagonal line from the northwest corner to the southeast corner of the colony, which created West Jersey, based upon the Berkeley claim, and East Jersey upon Carteret’s. It was under this English rule that Bergen County in 1683 became a legal entity, receiving a charter from the provincial legislature. The boundaries established for Bergen County were the line separating the

\textsuperscript{15} Brown and Warmflash, \textit{Architecture of Bergen County}, 8; Frederick W. Bogert, \textit{Bergen County, New Jersey History and Heritage Volume II: The Colonial Days, 1630-1775} (Hackensack, NJ: Bergen County Board of Chosen Freeholders, 1983), 3.

\textsuperscript{16} Bogert, \textit{History and Heritage}, 3.

\textsuperscript{17} Ibid., 7.

colonies of New York and New Jersey to the north, the Hackensack River to the west, and the Hudson River to the east, terminating at Constables Hook to the south.19

It is during this early period of English sovereignty that large-scale expansion into northern New Jersey began to take place. Almost immediately after the founding of Bergen, New Barbadoes Neck (present day Lyndhurst) was settled in 1670. Thereafter, additional settlements began to spring up in the area, including New Milford in 1677, Acquackanonk (present day Passaic) circa 1679, and Hackensack prior to 1682.20

In 1710, the boundaries of Bergen County were extended from those established in 1683. Although the northern and eastern boundaries remained the same, the western and southern boundaries were altered. The new southern boundary was the Passaic and Pequannock Rivers, and the new western boundary was just to the west of Long House Creek.21 With this change, Bergen County was significantly enlarged. These boundaries were to remain constant until 1837, when county lines were again redrawn, diminishing Bergen County to two-thirds its former size.22

Beginning with the earliest period of settlement in New Netherland, the majority of the population in Bergen County was consistent with that of the larger region, mainly made up of those of with Dutch, Flemish, and Walloon ancestry.23 Others, however, began to migrate to the area for various reasons. A pamphlet published in 1681 emphasized some of New Jersey’s redeeming attributes,
and highlighted the reasons why some were choosing to settle in the province: the cheapness of passage; self-governance; the promise of religious toleration; and the quality of farmland, which was both abundant and affordable.  

Towards the end of Dutch rule, a large influx of French Huguenots immigrated to New Netherland. Protestants escaping religious persecution under the Catholic monarch King Louis XIV of France, many originally settled in Manhattan, Staten Island, and Harlem, similar to the generation of Dutch settlers before them. Like the Dutch, French Huguenots began to purchase land west of Manhattan, in both northern New Jersey and southern New York. In Bergen County, one of the most prominent of these men was David Demarest, a French Huguenot from Picard, France. In 1677, Demarest purchased a large tract of land known as the French Patent (within present day Bergen County), which he intended to be a safe haven for 30 to 40 French Huguenot families, including his own. Demarest became a common family name in Bergen County, and was associated with Dutch culture and settlement in the region.

With the beginning of English rule, English people began to settle throughout the whole of New Jersey, including within the northern portion of the state. The English established their own settlements or settled into existing Dutch communities, with Dutchmen and Englishmen living side by side. Several English settlements were established in northern New Jersey, including New Barbadoes Neck and the English Neighborhood (present day Leonia) in colonial Bergen County,

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24 Clemens, *Uses of Abundance*, 16.
26 Major and Major, *Huguenot*, 76.
as well as the nearby towns of Newark and Elizabethtown (in present day Essex and Union Counties, respectively).  

From Dutch to English rule, the population of Bergen County continued to rise. The first census for the county was enumerated in 1726, with a total population of 2,673 persons, 2,181 of whom were white. The balance of 492 were black, most of whom were slaves. The next census, taken in 1738, totaled the population at 4,095 (3,289 white, 806 black), a growth of over fifty-three percent from the previous census. Although slightly later than the study period, the Census of 1790 showed the Bergen County population had grown to 12,601, 10,108 white persons, 2,301 slaves, and 192 persons described as “all other free persons,” presumably those of Native American and African descent; a population increase of over 200 percent in approximately fifty years.  

The rising population of Bergen County in the eighteenth century can be attributed to both natural growth and new settlement. Regardless, by the close of the eighteenth century, the Dutch remained the largest single ethnic group in the county. According to Peter Wacker, as of 1790, forty percent of the white population of Bergen County was of Dutch ethnicity, followed by German (twenty percent), French (fifteen percent), English (fifteen percent), and Scots and Scots-Irish (ten percent). Therefore, even at this late date, the Dutch was the largest and most influential ethnic group residing within the boundaries of Bergen County.

30 Wacker, Land and People, 162.
CHAPTER 2: THE PERSEVERANCE OF DUTCH CULTURE IN NORTHERN NEW JERSEY

Although New York City more readily adapted English cultural habits in the period after 1664, the majority of Dutch settlements in New York and New Jersey held tight to the Dutch lifeways derived from those of the seventeenth century Netherlands. This distinct culture was able to persevere well into the eighteenth century for three distinct reasons: (1) the laissez-faire attitude of the English towards Dutch cultural practices; (2) the continuation of traditional rural village settlement practices; and (3) the lack of new immigration from the Netherlands. In conjunction, these three factors allowed for the persistence of a thriving Dutch community in the New World.31

Upon the English assuming control of New Netherland from the Dutch in 1664, the English allowed the Dutch to maintain their property, their livelihoods, and language just as they had under Netherlands’ rule. Perhaps most importantly, this included the ability to maintain their church and community life. Much of community life centered around the Reformed Dutch Church, perpetuating Dutch religion, language, education, and communal ties. Not only did the English allow the existing Reformed Dutch Churches to operate, they also permitted the Reformed Dutch Church to expand, as was necessary to serve the growing Dutch population in both New York and New Jersey.32

The number of Reformed Dutch congregations in and around Bergen County rose with the growth in population which took place throughout much of the seventeenth and eighteenth centuries. The addition of a new church often followed settlement patterns within the area. The first congregation

32 Ibid.
to be established in this vicinity was Old Bergen in present day Jersey City in 1660. By 1720, seven Reformed Dutch congregations had been established including those at Hackensack, Passaic, Belleville, Wyckoff, and Fairfield, New Jersey and Tappan, New York. By 1776, this number had doubled with additional congregations in Dumont, Schraanlenburgh (present day Bergenfield), Ridgewood, Pompton Plains, Montville, Paterson, and English Neighborhood (incorporating portions of present day Ridgewood, Englewood and Leonia, and others). Therefore, from the onset of Dutch settlement in northern New Jersey, most of the population of Bergen County was within five miles of at least one Reformed Dutch Church. This length of travel was viewed as an acceptable distance from the church, allowing individuals to participate on the Sabbath and to be involved in the larger community.

The second factor which led to the maintenance of this Dutch lifestyle was the continuation of traditional rural settlement patterns. By the turn of the eighteenth century, those areas settled earliest by the Dutch no longer had a vast supply of land to bequeath to their offspring. Unlike the English practice of primogeniture, where only the eldest male child would inherit land, the Dutch traditionally divided their landholdings among all male heirs upon their death, a practice known as partible inheritance. For the Dutch, this practice allowed for a tightly knit group of family members to continually reside in the same community. Once land parcels along the Hudson River Valley and on Long Island became too small for subsistence, however, this practice was no

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longer feasible. As a result, in order for this traditional settlement pattern to continue, many migrated to New Jersey where land was available.\textsuperscript{36}

Through the records of land purchases made in northern New Jersey during this period, the persistence of this cultural settlement pattern is pervasive. Acquiring land was accomplished by petitioning the Governor for the privilege to purchase land, through land speculators, or through direct private sale.

Lastly and perhaps most important for the continuation of the culture, the cohesion of the Dutch community in the New World stemmed from the limited number of Dutch immigrating by the end of the seventeenth century. As a result, Dutch culture in the colonies was not regularly infused with the changing culture of the homeland. Therefore, the Dutch culture in the New World did not evolve with that of the contemporary Netherlands; rather, the Dutch culture of the colonies had its roots in the country their parents and grandparents and great-grandparents left, the Netherlands of the mid-seventeenth century.\textsuperscript{37}

Within northern New Jersey, the predominance and strength of this distinct culture during the period was omnipresent. This strength derived from the continuation of Dutch religious life and settlement patterns, which was furthered by the solidity derived from marriage and familial bonds. Endogamous marriages between, as well as among, Dutch families throughout the region reinforced existing cultural ties, leading to a further strengthening of this already tightly knit cultural group.\textsuperscript{38} This practice in northern New Jersey is made evident through the marriage

\textsuperscript{36} Ibid.
\textsuperscript{37} Ibid., 120.
\textsuperscript{38} Ibid., 123.
records of the Reformed Dutch Church, with the frequent recurrence of culturally Dutch surnames including Ackerman, Banta, Haring, Lydecker, Naugle, Demarest, and Westervelt. As can be expected, these marriages led to the creation of rather large extended families in this limited geographic area.

It is worth noting, however, that the Dutch communities of New York and New Jersey were not homogeneous. In addition to those of Dutch ancestry, there were also groups of Germans, French Huguenots, and Flemish dispersed throughout the larger Dutch population, and census data shows that slaves of African and Native American ancestry lived among (and often with) the Dutch. In time, all of these groups, regardless of their ethnicity, came to adopt the dominant Dutch cultural norms which surrounded them. This included attendance at the local Dutch Reformed Church, adoption of the Dutch language, and overall membership in the larger community. Again, the institution of marriage was utilized as a tool to strengthen this heterogeneous Dutch community. When a marriage took place between a Dutch and a non-Dutch individual, the non-Dutch partner was quickly welcomed into the Dutch partner’s family, which incorporated the new member into the Dutch way of life.

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40 Goodfriend, “Social and Cultural Life,” 123. The Demarest family of Bergen County exemplifies the tendency of outsiders to become culturally Dutch. Descending from David Demarest, a French Huguenot who immigrated with his wife Marie and a small family to the Americas in 1663, the Demarest family lived in Staten Island and Harlem before permanently settling in New Jersey in 1678. That year the family moved onto the French Patent, a large tract of land, by some accounts totaling 5,000 acres, which David Demarest bought from the Tappan Indians after permission had been granted by the New Jersey Proprietors in 1677. Upon their arrival to Bergen County, David’s chosen language was French. He was also fluent in Dutch, and spoke some English and German. By the early eighteenth century, however, the Demarest family would have almost entirely spoken Dutch. Future generations intermarried with Dutch families and worshiped at the Dutch Reformed Church, solidifying their place in the Hackensack Valley Dutch community. Major and Major, *Huguenot*, 77 – 85 & 106.
CHAPTER 3: THE EVOLUTION OF DUTCH-AMERICAN ARCHITECTURE

The Dutch population of Bergen County built homes that reflected the Dutch cultural society of which they were a part. As various historians, including Rosalie Fellows Bailey, David Steven Cohen, Clifford Zink, T. Robins Brown, and Jeroen van den Hurk, have found, the Dutch houses constructed throughout New York and New Jersey had their roots in traditional Netherlandic building techniques. Like so many other aspects of Dutch culture, however, Dutch-American architecture in the New World evolved from its seventeenth-century beginnings to include design elements and features from other cultural groups and architectural styles, most notably that of English Georgian architectural style.

Existing archival and archaeological evidence suggests that the earliest permanent habitations constructed in the New World by settlers sponsored by the Dutch West India Company demonstrate that these settlers had “transplanted both architectural forms and settlement patterns from the Netherlands and that these were distinct within urban and agrarian contexts.”41 Perhaps the earliest scholar to concretely connect the architectural forms of the New World and those of the Netherlands was Thomas Jefferson Wertenbaker. Focusing on Manhattan, Wertenbaker used seventeenth century images and contemporary architectural descriptions to show that the buildings of New Netherland mirrored those of the homeland.42 Jeroen van den Hurk, in his PhD dissertation Imaging New Netherland: Origins and Survival of Netherlandic Architecture in Old New York, established similarities between Netherlandic and early New Netherlands architecture through the

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Through his examination of surviving evidence including firsthand accounts and views and plans of seventeenth-century New Amsterdam, Sean E. Sawyer, in his article “Constructing the Tradition of Dutch American Architecture, 1609-2009,” concluded that New Amsterdam’s early settlement patterns closely mirrored those of commercial, northern European towns; and that its architecture replicated earlier Dutch precedents. Evidence also suggests the use of Netherlandic precedents in rural architecture through the middle of the seventeenth century, where “farmers of New Netherland adopted familiar northern European, primarily Dutch and Flemish, architectural types,” including the construction of the combination barn-house in New Netherland.

Documentary evidence suggests the use of specific Netherlandic architectural features in these early buildings. Of the nineteen contracts studied by Jeroen van den Hurk, fifteen called for a particular type of window to be used. Three of those window styles were distinctly Netherlandic, the others a variation of one of the three. Most notably, thirteen of the nineteen contracts specified the use of a Dutch kruiskozijn window in an overwhelming sixty-eight percent of the total contracts surveyed. Sawyer also noted that the “second and third generation residential and commercial buildings” in New Amsterdam closely replicated medieval precedents in urban areas of the Netherlands that were characterized by pantile clad roofs, building massing with gable ends.

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43 Ibid., 95 & 109.
44 Sawyer, “Constructing the Tradition,” 95 – 96.
46 van den Hurk, “Imagining New Netherland,” 168. *Kruiskozijn* windows are divided into four sections by a mullion (vertical member) and a transom (horizontal member). The two lower openings are shuttered, while the two upper openings are glazed.
oriented towards the street, the brick facades anchored to internal timber frames with iron tie rods, leaded glass casement windows, and wooden front stoops.47

John R. Stevens, in his work Dutch Vernacular Architecture in North America, 1640-1830, identified the common characteristics found in Dutch-American homes. Most Dutch-American homes were one-and-one-half stories in height, had knee walls, and nearly all had a basement or cellar, a non-partitioned attic for grain storage, a jambless fireplace, and pre-1750, a steeply pitched roof. In addition to those design elements, Stevens also found similarities in the framing techniques of both frame and stone Dutch Houses:

All of the extant Dutch-American timber-framed houses follow a standard pattern in having a series of closely-spaced bents that consist of wall posts into which are framed massive anchor beams, three or four feet below their upper ends (H-bents). Sometimes the joints between anchor beams and posts are reinforced with short, stout braces. This feature can be seen in a number of surviving buildings scattered over almost the whole area of Dutch settlement...48

Dutch stone houses, with load bearing masonry walls, mimicked the H-bent form found in frame Dutch houses. Here, the masonry walls served as substitutes for wooden posts, generally with anchor beams, or attic floor joists, set several feet below the top of the masonry wall.49 Stevens also found that the floor beams within masonry houses exhibited the same characteristics in both sizing and spacing as their framed counterparts.50

Additionally, early floor plans in Dutch-American houses tended to be linear. In houses that contained more than one room, either as originally built or as the result of an addition, the rooms

47 Sawyer, “Constructing the Tradition,” 95 – 96.
50 Stevens, Vernacular Architecture, 15.
shared a party wall and were not divided by a hall. Regarding exterior building materials, Dutch-American houses of frame construction were the most common type constructed in the seventeenth and eighteenth centuries throughout the wider Dutch cultural region.\textsuperscript{51} Beyond buildings of frame construction, exterior building materials differed based on location and the local availability of materials, mainly stone. Generally, there are four areas in which a specific exterior material was predominantly employed, including: 1) Brownish red sandstone employed in present-day Bergen, Morris, and Passaic Counties of northeastern New Jersey and present-day Rockland County of southeastern New York; 2) Wood-framed houses in present-day Brooklyn, New York and Monmouth and Somerset Counties, New Jersey; 3) Gray fieldstone in the Middle Hudson Valley of New York and the Upper Delaware Valleys of New York and New Jersey; and 4) Brick in the Upper Hudson Valley.\textsuperscript{52}

As one may expect, many of the characteristics of Dutch-American houses within colonial Bergen County were shared with those of the larger Dutch cultural region. Although the building materials differed, the many physical characteristics of Bergen County homes were quite similar to those defined by John R. Stevens:

The Early Stone Houses of Bergen County, New Jersey, are typically one-and-one-half story buildings with cellars. Stone masonry walls rise to just above the garret floor. The front and rear walls receive the roof rafters and the end gables are framed and sheathed with shingles, clapboard or (rarely) brick.

Originally, space was ordered into vertical layers with the cellar, main floor, and garret. These correspond to the functions of food storage, multi-purpose (food-preparation and cooking/eating/working, sleeping, etc.) and the sleeping garret


\textsuperscript{52} Cohen, Dutch-American Farm, 40 – 55.
which also contained storage space. Most garrets were unfinished, however, some contained finished rooms.\(^{53}\)

Also, the spacing and sizing of floor beams within Bergen County stone houses match what Stevens describes for the wider Dutch cultural region. Additionally, early floor plans within colonial Bergen County were also generally linear, with party walls shared between two or more rooms.

By the middle of the eighteenth century, the Dutch of northern New Jersey and southern New York, as well as the wider Dutch cultural region, began to incorporate various English and later-American stylistic features into both new and existing structures. Typically, adoption of these stylistic features depended upon, in part, a community’s degree of isolation and its exposure to the ever-enlarging English cultural group, in addition to one’s socioeconomic status.\(^{54}\) In New York City for example (the earliest area in the wider Dutch cultural region to be Anglicized), the city’s population was exposed to Classical style architecture as early as 1700, with the construction of City Hall.\(^{55}\)

According to Sean E. Sawyer, the wealthier an individual, the more likely it was “that they would choose to abandon medievalizing Netherlandish forms and build in a modern, classically inspired style,” a choice which “spoke most strongly of aspirations to status and power to be gained by

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54 Cohen, *Dutch-American Farm*, 46; Sawyer, “Constructing the Tradition,” 103.

Initially, this shift in architectural style occurred most readily among the elite Anglo-Dutch and merchant classes in New York City, but soon thereafter was followed by the Anglo-Dutch who resided outside of the urban environment. Notable examples of these Anglo-Dutch, Georgian style residences throughout the wider Dutch cultural region include: the John Schuyler House (c. mid-eighteenth century, demolished in 1924) in North Arlington, Bergen County (Figure 3); Van Cortlandt Mansion (1748) in present-day Bronx, New York; the Dey Mansion (1740-1750) in present-day Passaic County, New Jersey; the Philipse Manor Hall (eighteenth century) in present-day Yonkers, New York; the Schuyler Mansion (1761-1765) in Albany, New York; and the Van Rensselaer Mansion (1765, demolished in the 1890s).


56 Sawyer, “Constructing the Tradition,” 104.
For those living outside of urban areas, presumably as well as those of less elite status and/or wealth, this change was more gradual, as “English design elements were selectively introduced and adapted” to Dutch-American houses.\(^{57}\) Many scholars agree that this change in architecture was directly related to the loosening grip of “Netherlandish culture” in the face of “increasing English social and political dominance,” and lead to the incorporation of English stylistic elements into these Dutch houses. In addition, it also changed the pattern of Dutch domestic life, including a shift from multi-use spaces to a specialization of spaces within one’s home.\(^{58}\)

With this gradual change, several predominantly English stylistic elements were incorporated into the Dutch-American home. One of the earliest additions to the Dutch-American house was the use of sash windows in favor of casement windows, most of which had been replaced throughout the larger Dutch cultural region by the 1750s.\(^ {59}\) Floor plans also began to be heavily influenced by the English Georgian style. Earlier floor plans, which were commonly set in a linear arrangement, gave way to floor plans based upon a full Georgian plan, featuring either a central hall with two rooms on either side, or a two-thirds Georgian plan, with a side hall with two rooms situated along one side of the hall. Another distinctive feature of later Dutch-American houses, the gambrel roof, was also adapted from the English. With no Netherlandic precedent, this double slope roof was in fact borrowed by the New York and New Jersey Dutch from the English settlers of New England.\(^ {60}\) Other changes included the removal of built-in bedsteads, jambless fireplaces, and the addition of baseboards.\(^ {61}\)

\(^{57}\) Ibid., 106.
\(^{58}\) Ibid., 106.
\(^{59}\) Ibid., 109.
\(^{60}\) Cohen, Dutch-American Farm, 34.
Typically, homes considered by many today to be quintessential examples of “Dutch Colonial” architecture, were in fact constructed after 1776, and were heavily influenced by the American Federal style.62 The Vreeland House, of Leonia, New Jersey, is one such example. The main section of the house was built between 1810 and 1820 by the Vreeland family, attached to an earlier stone section built in the late eighteenth century. The nineteenth-century addition was one-and-one-half stories, with a five-bay main façade, gambrel roof, and a large overhanging eave supported by six slender columns creating a portico. The most characteristic sign of Federal style influence is the delicate Adamesque woodwork surrounding the front door.63 This main portion serves as an outstanding example of a building form of the house that would later become identified by twentieth century historians as “Dutch Colonial,” while the smaller, gable roofed section which was more truly “Dutch” and “colonial” was largely ignored.

CHAPTER 4: THE AVAILABILITY OF PIGMENTS TO THE RESIDENTS OF BERGEN COUNTY AND THE CONSUMER REVOLUTION OF THE EIGHTEENTH CENTURY

During the period of study, 1740 to 1776, residents of Bergen County, New Jersey, were gradually becoming part of a larger consumer society. By the middle of the eighteenth century that trans-Atlantic consumer society included most inhabitants of the American colonies. The transition from a local, subsistence economy to a broader one is substantiated by newspaper advertisements, merchants’ accounting books, and expanded transportation routes, as well as by the passage of ever more restrictive legislation regulating colonial trade. As a result of increased trade, a multitude of consumer goods, including the pigments necessary to make paints became increasingly available in the colonies. There is evidence that not only were such wares accessible to the residents of Bergen County, but also that there was a willingness and desire to obtain them.\(^{64}\)

Transportation and Trade in Colonial New Jersey

Goods sold by New York City merchants were available to residents of Bergen County both by direct purchase and through developed interstate trade networks, evidenced by firsthand accounts and by the financial records of New York City merchants. Peter Kalm, in *Travels into North America*, writes of the importance of the trade network, which went through New Jersey, specifically the centrally located towns of Trenton and New Brunswick, New York City and

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\(^{64}\) In their article, “Colonial and Federal America: Accounts of Early Painting Practices,” Abbott Lowell Cummings and Richard M. Candee have illustrated that architectural paint use can be documented in the American colonies into the mid-seventeenth century. With research that primarily focused on New England, the authors concluded that prior to 1700, evidence suggests that whitewash and other non-oil based media were widely employed on both interior woodwork and walls. Documentation shows that oil-based paints began to be used in New England just before 1700, which came into general use during the eighteenth century. Abbott Lowell Cummings and Richard M. Candee, “Colonial and Federal America: Accounts of Early Painting Practices,” in *Paint in America: The Colors of Historic Buildings*, ed. Roger W. Moss (Washington, D.C.: Archetype Press, Inc., 1994), 13. Evidence suggests that by 1740 to 1776 in Bergen County, oil paints were used regularly on wood trim. This, however, does not preclude the use of whitewash on wood or other surfaces, including plaster. Oil paint was the only type of finish found in all of the paint studies examined and performed by the author for houses during the period of study.
Philadelphia. Known as the Assanpink or “Old Dutch” trail, this overland route was the major network connecting New York City to Philadelphia. Kalm explicitly stated the importance of the trade that took place between the residents of New Brunswick and New York:

New Brunswick belongs to New Jersey; however the greatest part, or rather all its trade is to New York, which is about forty English miles distant; to that place they send corn, flour in great quantities, bread, several other necessaries, a great quantity of linseed, boards timber, wooden vessels, and all sorts of carpenters work. Several small yachts are every day going backwards and forwards between these two towns. The inhabitants likewise get a considerable profit from the travelers, who every hour pass through on the high road.

Although Peter Kalm does not mention Bergen County in Travels, he does identify the larger interstate trade networks and patterns that were established during this period. In doing so, he acknowledged the fact that New Jersey residents actively traded with two of the largest port cities in the American colonies, and in doing so were able to obtain numerous imported goods from England.

Throughout the eighteenth century, New York and New Jersey were solely connected to one another by waterways. Bergen County, in particular, was connected to New York City by numerous water routes including the Hudson, Hackensack, Passaic, Pequannock and Saddle Rivers. Travel was facilitated by various privately owned ferries that transported people and goods between the two states. The earliest such license was granted to Pieter Hetfelsen in 1669, allowing

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65 Peter Kalm, Travels into North America: Volume I (Warrington: William Eyres, 1770), 221.
67 Kalm, Travels, 230. For the ease of the reader, I have changed some old English to modern English where appropriate, including replacing \( f \) with \( s \); Interestingly, Kalm notes that a “great quantity of linseed,” was shipped from New Brunswick to New York. Linseed oil, the most common oil used in oil based paint during the period, was produced from linseeds from the flax plant (also known as flax seeds).
him to run a ferry between Communipaw—present day Jersey City—and New York.\textsuperscript{68} In 1704, the New Jersey legislature identified eight ferries which were to be taxed.\textsuperscript{69} By 1750 that number had increased dramatically, with approximately fifty ferries operating within the state. Based on relative size, New Jersey had more active ferries than any other colony in North America.\textsuperscript{70}

While ferry service vastly expanded during this period, so did New Jersey’s roadways. These two advancements lead to speedier travel within the colony. This is perhaps most evident in the dramatic decrease in travel time between New York and Philadelphia, through New Jersey, which took place between 1750 and 1772.\textsuperscript{71} In 1750, it took five days to travel between New York and Philadelphia; by 1756, this had decreased to three and one half days; nine years later, the trip took a total of only three days to complete.\textsuperscript{72} After the “Flying Machine” coach was invented in 1766, travel time was further diminished, totaling two days to complete the trip in winter, and only one-and-one-half days to complete in the summer.\textsuperscript{73} This further increased accessibility, ease of travel, and interconnectedness within the colony, particularly to New York City and Philadelphia.

Surviving records directly link Bergen County residents to purchases in New York City through the account books of New York City merchants. One such example is the account book of Ann Elizabeth Schuyler, a female merchant of New York. Schuyler, the widow of the merchant Philip Schuyler, maintained an account book of the sales and transactions that took place in her shop.

\textsuperscript{69} Lurie and Wacker, \textit{Mapping New Jersey}, 120.
\textsuperscript{70} Ibid.
\textsuperscript{72} Ibid.
\textsuperscript{73} Ibid.
from 1737 until 1769. Although Schuyler could not afford to specialize in the products she carried in her store, she did have an extensive trade network, which included such far-flung places as Amsterdam and Curacao. Schuyler’s account book reveals details of the accounts of her numerous patrons, including each person’s name, place of residence, any credit that had been extended, and on occasion, a list of items purchased. Further examination of these entries makes it appear that Schuyler did not sell painters’ colors. Regardless, the storekeeper had recorded numerous patrons from Bergen County who frequented her shop, most notably those from Hackensack. The presence of Bergen County residents in Ann Elizabeth Schuyler’s account books as early as 1737 indicates that there was ready access to New York City from Bergen County, and its residents showed a willingness to travel there for specialty goods at that time.

**Painters’ Colors and Pigments in New York City and the American Colonies**

Advertisements printed in colonial era newspapers, as well as one merchant’s accounting book, provide some insight into the pigments of this period. Not only can one discover the variety of pigments available to Bergen County colonists, but one can also determine the latest possible date such pigments were available for purchase, the painting techniques that painters believed to be desired by colonists, and in some cases, the origin of these imported goods.

The first newspaper printed in New Jersey was the *New Jersey Gazette*, published out of Burlington, on December 5, 1777. As a result, Bergen County news, classifieds, and advertisements from before this date were published in colonial newspapers that served larger

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cities such as New York.\textsuperscript{77} Although classifieds from residents of Bergen County can be found in said newspapers during the period, such as the sale of Cornelius Wynkoop’s house along the “Hackinsack” River in \textit{The New York Weekly Post Boy} in 1745, there are no such advertisements for the sale of pigments in the county during that period.\textsuperscript{78} There are however advertisements for such goods being sold in New York City.

The earliest known advertisements for “painters colors” in a New York City newspaper was that of the Boston merchants Merrett and Fletcher, Grocers’ on June 28, 1731, publishing a second advertisement in August of that year.\textsuperscript{79} Presumably, this is the same John Merrit of Boston who

\textsuperscript{77} The three earliest newspapers published in the American colonies were all printed in Boston, Massachusetts. The earliest “news sheet” published in the American colonies was \textit{Boston’s Publick Occurrences Both Forreign and Domestick} (1690) by Benjamin Harris, followed by \textit{The Boston News-Letter} (1704-1726) originally printed by postmaster John Campbell (continued under various names until 1776), and the \textit{Boston Gazette} (1719-1741) printed by James Franklin for William Booker (continued under various names until 1779). By 1750, at least five additional newspapers had been printed in Boston, including the \textit{New-England Courant} (1721-1726), the \textit{New-England Weekly Journal} (1727-1741), the \textit{Weekly Rehearsal} (1731-1735, continued as \textit{The Boston evening-post} (1735-1775)), the \textit{Boston weekly post-boy} (c.1734-1750, continued as \textit{The Boston post-boy} (1750-1775)), and \textit{The Independent advertiser} (1748-1749). Philadelphia’s first newspaper, \textit{American Weekly Mercury} (1719-1746), was published by James Breig, followed by \textit{Universal Instructor in all the Arts and Sciences and Pennsylvania} (1728-1729) printed by Samuel Keimer, which was purchased by Benjamin Franklin and Hugh Meredith and renamed the \textit{Pennsylvania Gazette} (1729-1782). By 1750, at least three additional newspapers had been printed in Philadelphia, including the \textit{Philadelphische zeitung} (1732, also the first German newspaper published in the American colonies), the \textit{Pennsylvania Journal} (1742-1779), and the \textit{Pennsylvania Fama} (c.1748-). Newspaper publication in New York State did not begin until November 1725, with the first printing of the \textit{New-York Gazette} (1725-1744, continued as \textit{The New-York evening-post} from 1744-1752) by William Bradford. The state’s second newspaper, \textit{The New-York Weekly Journal} (1733-1751) was published by John Peter Zenger. By 1750, one additional newspaper was published in the state, \textit{The New-York weekly post-boy} (1743-1747) which was continued as \textit{The New-York gazette, revived in the weekly post boy} (1747-1752). Newspapers were also published in several other American colonies prior to 1750 including several iterations of \textit{The Maryland Gazette} (1727-1731, 1733-1734, and 1745-1800+) and \textit{The Maryland Gazette reviv’d} (1732-1733), \textit{The Rhode-Island gazette} (1732-1733), \textit{The South Carolina gazette} (1732-1775), and \textit{The Virginia gazette} (1736-1780), and \textit{Pensylvanische berichte...} (1746-1766). “Early American Newpapering,” Colonial Williamsburg, accessed March 12, 2017, https://www.history.org/Foundation/journal/spring03/journalism.cfm; “The First Newspapers in America,” \textit{PaperAge}, November/December 2004, http://www.paperage.com/issues/nov_dec2004/11_2004newspapers.pdf; “The Early History of Newspaper Publishing in New York State,” New York State Library, accessed March 12, 2017, http://www.nysl.nysed.gov/nysnp/history.htm; “Eighteenth-Century American Newspapers in the Library of Congress,” Library of Congress, accessed March 12, 2017, http://www.loc.gov/rr/news/18thc0coverpage.html.


advertised more than thirty pigments for use in either oil or water during the 1730s.\textsuperscript{80} Nearly ten years later, a John Merrett (perhaps the same Boston merchant) was advertising “Painters Colours” on April 27, 1741, as well as other building materials including nails and English steel.\textsuperscript{81} Both Merrett and Fletcher, as well as John Merrett [Merrit], were general merchants, selling other imported luxury goods not related the finishing of buildings, including teas, sugar loafs, and spices. The earliest known document to identify pigment colors by name that were available in New York City is the May, June, and July 1732 accounts of John Roosevelt, a general merchant and businessman in New York City. According to his records, Roosevelt sold “linseed oyl,” as well as “red paint,” white lead, “blew smalt,” “barr black,” red lead, yellow, Spanish brown, and “blew.”\textsuperscript{82} In addition to several other business ventures, John Roosevelt also owned a linseed oil mill. In 1712, John Van der Heul and John Roosevelt petitioned the General Assembly of the Colony of New York “that by their Industry and great Charge they have Erected in the City of New York a Mill for Grinding Flaxseed and making Lintseed oyle [sic],” asking for the exclusive right to produce linseed oil in the colony for ten years, which was granted. In addition, anyone else who attempted to produced linseed oil in the colony during that period would be fined “Two

\textsuperscript{80} Cummings and Candee, “Early Painting Practices,” 22. A notice in the \textit{Postscript to the Boston Gazette} published August 13-20, 1733, notified the public that Merret and Fletcher had dissolved their partnership. Directly below this notice, “John Merrett Grocer” advertised his wares, including painters’ colors, being sold from his store at “Three Sugar Loaves and Canister in Kingstreet near the TownHouse Boston.” On September 28, 1736, John Merrit (spelled with an \textit{i} instead of \textit{e}) again advertised his wares, including painters’ colors, out of the same location. Advertisement, \textit{Postscript to the Boston Gazette}, August 13 to August 20, 1733, Page Supplement 4; Advertisement, \textit{New England Weekly Journal}, September 28, 1736, 2.


hundred pounds, Current money of the colony of New York,” to be paid to Heul and Roosevelt.\textsuperscript{83} According to his 1745/6 will, John Roosevelt continued to own and operate said mill at that time.\textsuperscript{84}

The Arts and Crafts in New York, 1726-1776: Advertisements and News Items from New York City Newspapers, compiled by Rita Susswein Gottesman and published by the New York Historical Society, includes a collection of early advertisements for painting supplies. Examination of this compilation gives further insight into pigments as a commodity during the period of study. In her work, Gottesman identified twelve advertisements for paint supplies, submitted by nine vendors, which were published in New York City newspapers from 1746 to 1772.\textsuperscript{85} It is important to note that although Gottesman identified a rather comprehensive list of vendors, she did not include every advertisement published by each vendor during the period. Therefore, several of these vendors published several newspaper advertisements for their wares in New York City newspapers during the period of study.

Of the nine vendors Gottesman identified as selling pigments from 1746 to 1776, only three of those appear to be general merchants. Two of those merchants, Raphael Goelet, whose earliest advertisement was published in 1746, and L. Kilburn, whose advertisement was published in 1772, were extremely specialized – the former selling “Barr and White Lead, Oil and other Painting Colours, Wholesale and Retail” and the latter selling items such as pigments, paint brushes, and linseed oil.\textsuperscript{86} Both merchants also sold other goods directly related to the finishing of buildings,

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\begin{itemize}
\item \textsuperscript{83} Colonial Laws of New York From the Year 1664 to the Revolution...Volume I (Albany, NY: James B. Lyon, State Printer, 1896), 752.
\item \textsuperscript{85} Although Gottesman identified several early vendors who sold paint in New York City in the mid-eighteenth century, she did not list every advertisement each vendor printed during this period.
\item \textsuperscript{86} Rita Susswein Gottesman, The Arts and Crafts in New York, 1726-1776: Advertisements and News Items from New York City Newspapers (New York: Da Capo Press, 1970), 352 – 355. Gottesman had mentioned that Raphael Goelet published an advertisement in 1747, but it appears his earliest advertisement was published in 1746. From
\end{itemize}
\end{footnotesize}
specifically window and diamond glass. Only one of the nine pigment-selling merchants after 1746, John Roosevelt, as mentioned above was a general merchant, offering a variety of goods including decanters, wine glasses, ale glasses, salts, mustard pots, “crewits”, tumblers, cans, and Bristol pipes, among other items.\(^87\)

Richard M. Candee, in his Master’s thesis *Materials Toward a History of House Paints: The Materials and Craft of the Housepainter in Eighteenth Century America*, identified a variety of ways in which pigments were obtained throughout the colonies during this period. In Virginia, for example, there were importers, gentlemen who would send their agents abroad to directly obtain painters’ colors as well as oils. In New England, on the other hand, it was the captains of merchant ships who obtained those materials for resale. There were also more generalized wholesale and retail merchants in the colonies who dealt in various goods, including those necessary for painting. Interestingly, however, Candee noted “the largest supply of painters’ colors throughout the colonies, to judge from contemporary advertisements, was from the shop of the painter.”\(^88\)

Corresponding with Richard M. Candee’s findings, most of the vendors who were selling pigments in New York City during this period were painters themselves. In their advertisements the men included not only the wares they had for sale, but also the painting services they offered. John Humble and the firm of Thomas and James Barrow, simply identified themselves as painters and/or glaziers.\(^89\) Obadiah Wells, who printed several advertisements between 1746 and 1752, stated one

\(^{87}\) Gottesman, *Arts and Crafts*, 335.


of his earliest advertisements that “glazing or painting Work is done,” and in the second that he offered “any sort of glazing and painting and glazing work.”

The firm of Flagg and Searle’s classified was meant to “inform the Publick, that they do all Sorts of Glaizing, House, Ship and Coach Painting; likewise Japanning, Lacquering, &c. after the neatest Manner.”

G. Duyckinck also advertised the specific services he offered, including “limning, painting, varnishing, japanning, gilding, glasing, and silvering of looking glasses.”

Of the published documents identified by Gottesman, there were six that simply stated that painters’ colors could be obtained from their shop and six that stated the particular pigments available for purchase. Although Gerardus Duyckinck specified he offered white lead, in addition to various “Painter’s Colours” in *The New York Weekly Post-Boy* in 1746, the first retailer to denote the particular pigments which he supplied in his store, by name, was Obadiah Wells. In his 1748 advertisement in *The New-York Evening Post*, Mr. Wells listed “White lead, Red-lead, Indian red, Spanish ‘Brown, Oaker, Yallow, &c. Also Coperas & Rossin…Vermillion, Prutian-blue, Umber, Spruce-Oaker” as the colors that were available at his shop.

Nine months after the former was published, John Humble also advertised his wares in *The New York Gazette Revived in the Weekly Post Boy*. Humble exhibited a slightly more expanded selection of available pigments including “white lead, red lead, Spanish brown, spanish white, venetian red, English oker, spruce yellow, blue smalt, vermilion, prussian blue, india red, verdigrease, umber, white vitriol, gold and silver


92 Gottesman, 349.

93 Ibid., 352.
Six years later Gerardus Duyckinck published his second advertisement in The New York Gazette or the Weekly Post Boy. Unlike his first advertisement, Duyckinck’s second advertisement listed the pigments he had on offer in his shop, including “White-Lead, Red-Lead, Spanish Brown, English, French, Spruce and Stone Oker, Indian and Venetian Red, Ivory, Frankford and Lamp-Black, Umber Cullin’s Earth, Smalt's Prusian Blue, Vermillion, Verdigrase.”

In five of the twelve advertisements being considered, the paint vendor indicated the paint colors he offered in his shop were imported. Apparently, this was customary for the period, as Marcus Whiffen has already identified in his 1960 study of Williamsburg architecture:

Paint colors were another import, and one of which it seemed that the colony could never have enough; advertisements of colors for sale in the Virginia Gazette, usually beginning “Just imported,” are legion.

Such was the case in New York, where “Just imported,” “Just imported from London” and “Europe,” as well as “Best London” were used to showcase that fact. Whiffen’s observation is supported upon examination of the Townshend Act of 1767. In an attempt to make a “more certain and adequate provision for the charge of the administration of justice, and the support of civil government, and defraying the expense of defending, protecting, and securing the said colonies,” England levied a tax on various items exported to the colonies to create a steady revenue stream to pay for those expenses. To generate a source of reliable income, crown, plate, flint, and white glass, green glass, tea, and paper, as well as red and white lead and “painters colours,” had taxes

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95 Gottesman, Arts and Crafts, 354.
imposed upon them. The inclusion of red lead, white lead, and “painters colours” in the Revenue Act suggests that those commodities were imported to America regularly enough to warrant their inclusion in the tax. In addition, the author of the act, Charles Townshend, apparently chose those particular items because “he was aware that the colonies were incapable of producing some of the articles and that England monopolized trade in them.” Nonetheless, despite being taxed, the paint merchants who published those advertisements believed that those same imported goods remained desirable and in high demand in the colonies.

According to T.H. Breen in the article “Baubles of Britain”: The American and Consumer Revolutions of the Eighteenth Century, the desire for imported goods was a colonial-wide phenomenon, not only restricted to pigments but imported goods as a whole. By the mid-eighteenth century, British colonists had acquired an insatiable appetite for the latest manufactures being imported from Britain. In fact, “at a time when the American population was growing at an extraordinary rate, per capita consumption of British imports was actually rising. In other words, more colonists purchased more manufactured goods every year.” It was not only the wealthy that exhibited a preference for imported goods, but those in less affluent, rural communities as well. As Breen colorfully illustrates:

One English traveller [sic] discovered to her surprise that in rural North Carolina women seldom bothered to produce soap. It was not a question of the availability of raw materials. Good ashes could be had at no expense. But these rural women were consumers, and they preferred to purchase Irish soap “at the store at a monstrous price.”

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99 Ibid.
102 Ibid.
103 Ibid., 79.
In total, between 1750 and 1773, the American market for imported English goods rose 120 percent, further demonstrating the colonists’ desire for, and willingness to purchase at a much dearer rate, English imported goods.\textsuperscript{104}

The Townshend Revenue Act was not England’s first legislative act passed with the intention of regulating or profiting from colonial trade; prior to 1767 England had enacted numerous laws to control trade to and from America. A series of laws ratified in 1660, 1663, and 1671, known collectively as the Navigation Acts, were extremely prohibitive. Although those three laws included a number of stipulations, there are two that are of particular importance. The first, from the 1660 law, mandated that all merchant ships carrying goods into America had to be either English or colonist owned, meaning ships which were owned by other countries or their citizens were unable to transport commodities into the American colonies. The second, a part of the 1663 law, further restricted trade by requiring that all European exports intended to be imported to America had to pass through England before being transported to America.\textsuperscript{105} The implication of those laws appears to be quite simple: if a pigment was not found or available in England, it is highly probable that pigment would not be available in the American colonies.

Ian Bristow’s \textit{Interior House-Painting Colours and Technology, 1615-1840} is, without question, the most comprehensive study of the pigments available in England during the period under consideration. In his work, Bristow ascertained there were seven pigment colors available in England at this time: white, blue, green, yellow, red, brown, and black.\textsuperscript{106} Candee, in \textit{Materials},

\begin{flushleft}
\textsuperscript{104} Ibid., 78.
\textsuperscript{105} James Henretta, David Brody, and Lynn Dumenil, \textit{America A Concise History: Volume I: To 1877} (New York, NY: Bedford/St. Martin’s, 2002), 70.
\end{flushleft}
had previously identified the same classification of pigments available in the United States as in England during the period, save brown, of which different brown pigments were categorized as either black or red, based upon characteristics of the particular pigment. Upon examining the New York City newspaper advertisements and Roosevelt’s 1732 accounting book, it becomes evident that every pigment color available to Englishmen during the eighteenth century in England was available for purchase within New York City. By 1732, six of these pigment colors were available for sale, including white, brown, red, blue, yellow, and black, with green becoming available at the very latest by 1748. Thus, the numerous pigments that could be obtained in New York City were available to Bergen County residents.

The pigments available in New York can also be compared to those available in Boston and Philadelphia, as well as other American colonies, during the same period. Although the earliest known newspaper advertisement for painters’ colors was printed in 1711 in New England, extensive paint analysis and historical research has traced the area’s earliest known paint use to the mid-seventeenth century. Specific pigments and their earliest known date of existence or use include: yellow ocher (ca. 1664), charcoal black (ca. 1664), copper green (ca. 1664), soot black (ca. 1675-1680), red ocher (ca. 1700), carbon black (ca. 1700), and lampblack (seventeenth century). The 1684 stock inventory of Daniel George, a Boston painter, also lists numerous pigments including large amounts of “best Oaker” (60 lbs.), “English Oaker” (300 lbs.), course red lead (200 lbs.), “red colour” (150 lbs.), “Sprues Oaker ground” (40 lbs.), white lead (200 lbs.),

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108 Zabdiel Boylston printed the earliest found newspaper advertisement for painters’ colors in the American colonies in 1711, advertising that these wares were for sale at his Apothecary shop in Boston. Advertisement, *The Boston News-Letter*, March 17 to March 24, 1711; Advertisement, *The Boston News-Letter*, March 31 to April 7, 1712, 2. Cummings and Candee highlight the findings of several paint analyses, as well as primary documents, which identify several early pigments prior to published newspaper advertisements. Cummings and Candee, “Early Painting Practices,” 13 – 41.
ground white lead (50 lbs.), red lead (150 lbs.), as well as smaller amounts of “Pinck,” “Browne,” “blue Verdigreece,” vermilion, “Oyle Smalte,” and “straes smalte.”

In Philadelphia, it appears that the earliest advertisement for a specific pigment was by John Hyatt, a brass founder, who was selling “very good Lamp-black…by whole sale or retail.” Nearly a decade later, several more pigment colors were advertised for sale by merchant Alexander Wooddrop in 1731. In his April advertisement, Wooddrop listed several painters’ colors available at his shop, including “Vardey-greese,” copperas, white lead, indigo, and yellow oker, in addition to several building supplies including London steel, bar iron, and glass. Seven months later, Wooddrop’s selection of pigments for sale grew to include Venetian red, Spanish brown, and vermilion, as well as other materials used to produce paints and varnishes, including white copperas, allom, and “oyl of turpentine.” Interestingly, he also expanded his selection of building materials to include nails and chimney tiles. As such, it appears that by 1731, all of the seven color families identified by Bristow and Candee were available for purchase in Philadelphia.

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112 Advertisement, The American Weekly Mercury, April 1 to April 8, 1731, 4.

113 Advertisement, The American Weekly Mercury, November 4 to November 11, 1731, 4.

114 It is important to note that pigments were imported into port cities up and down the colonies, and from there made available throughout the American colonies during this period, and not only in New York, Philadelphia, and Boston. One noted example is the 1735 advertisement in the South Carolina Gazette by Peter Horry, who carried white lead, red lead, spruce oaker, umber, and Prussian blue in his Charleston, South Carolina location. It is important to note that this is the first advertisement listing Prussian blue for sale found by the author. Advertisement, South Carolina Gazette, November 8, 1735, 3. Prussian Blue is a synthetic pigment, credited to a German chemist who “discovered” it circa 1704-1706. The pigment was not widely available to painters until 1724, as such, its appearance in South Carolina a decade later shows the extent of trans-Atlantic trade and the fashion-consciousness of at least some of the colonial population.
Although painters’ colors were advertised for sale in the American colonies, the purchase price of these commodities was not. In England, however, William Salmon, in multiple editions of his *Palladio Londinensis: Or, The London Art of Building*, published an inclusive list of the “price of colours” as well as the price of services rendered by the painter, available in eighteenth century England. The price of work seems to fluctuate based on the color, which would reflect the cost of the pigments use to create the color. In his second edition, published in 1738, Salmon thoughtfully lists the services of the painter and associated costs:

1. Sash-Frames, Sash-Lights, Window-Lights, and Casements, are done at *per Piece*.
2. Modillion, and other outside Cornice, at *per Foot running Measure*.
3. Outside Painting three times in Oil is worth, if well done, from 5.d to 6d. *per Yard*.
   Inside Painting, new Work, of common Colours, at 6d. *per Yard*.
4. Inside Painting, old Work, of common Colours, at 4d. *per Yard*; but of extraordinary Colours, as
5. Olive Colours, at 8 d. *per Yard*.
8. Sash-Frames, at 12 d. *each*
9. Sash-Lights, at 1 d. *each*
10. Window Lights and Casements, at 3 d. *each*.
11. Iron Bars, at 1 d. *each*, or more if very large.
12. Modillion Cornice, from 4 d. to 8 d. *per Foot running*.
13. Common outside Cornice 2 d. *per Foot running*.

*N.B.* All carving in Rooms and out-side Frontispieces to Doors &c. are so various, that they must be valued by the Time and Materials expended.115

The price of colors as noted by Salmon suggests the hierarchy of pigments, with lead white as the most inexpensive, and a “Fine deep green” as the most expensive:

Best White Lead ground in Oil, at 36 *s. per 112 lb.* or 4 *d. per lb.* One Pound of which, with two Pennyworth of Oil, will paint 8 square Yards; which is three Farthings *per Yard*, for which Painters usually charge 4 *d. per Yard*.

Pearl Colour, ground in Oil, at 4 *d. and 5 d. per lb.*

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115 William Salmon, *Palladio Londinensis, or the London Art of Building*. (Second Edition) (London, England: A. Ward at the King’s Arms in Little-Britain; J. Clarke, Golden Ball, Duck-Lane, near Little-Britain; J. Oswald, at the Rose and Crown in the Poultry; T. Osborne, in Grays-Inn; and E. Wicksteed, at the Black Swan in Newgate-Street, near Warwick-Lane, 1738), 58.
Lead Colour, ground in Oil, at 4 d. and 5 d. per lb.
Cream Colour, ground in Oil, at 4 d. and 5 d. per lb.
Stone Colour, ground in Oil, at 4 d. and 5 d. per lb.
Wainscot, or Oak Colour, ground in Oil, at 4 d. and 5 d. per lb.
One Pound of any of these Colours, with Oil, will paint 8 square Yards, for which Painters usually charge 4 d. per Yard.
Chocolate Colour ground in Oil, at 6 d. per lb.
Mohogany Colour, ground in Oil, at 6 d. per lb.
Cedar Colour, ground in Oil, at 6 d. per lb.
Walnut-tree Colour, ground in Oil, at 6 d. per lb.
One Pound of any of these Colours, with Oil, will paint 10 square Yards, for some of which Painters usually charge 4 d. per Yard, for others more.
Gold Colour, ground in Oil, at 8 d. per lb.
Olive Colour, ground in Oil, from 8 d. to 12 d. per lb.
Pea Colour, ground in Oil, from 8 d. to 12 d. per lb.
Fine Sky Blue mixed with Prussian Blue, ground in Oil, 8 d. to 12 d. per lb.
Wallnut-tree Colour, ground in Oil, at 12 d. per lb.
Pea Colour, ground in Oil, at 12 d. per lb.
Pink Colour, ground in Oil, at 12 d. per lb.
Blossom Colour, ground in Oil, at 12 d. per lb.
One Pound of any of these Colours, with Oil, will paint 8 square Yards, for some of which Painters usually charge 10 d. or 12 d. per Yard, for others they will expect more.
Fine deep Green, ground in Oil, at 2 s. 6 d. per lb.\textsuperscript{116}

William Salmon’s work was not the only builder’s handbook published in London that captured the prices of painter’s work and pigments during the eighteenth century. Two earlier books, The City and Countrey Purchaser, and Builder’s Dictionary: Or, The Compleat Builder’s Guide. (1703) by Richard Neve, and The Builder’s Dictionary: Or, Gentleman and Architect’s Companion. (1734) by an unknown author, catalogued a number of standard prices for painter’s services and to a lesser extent, the price to employ a painter to apply particular colors. The latter also provides the names of pigments used during the period.

\textsuperscript{116} Salmon, Palladio (Second Edition), 59 – 60. The following explains the old English currency used in the builder’s handbooks published in London during the eighteenth century: Two farthings equals one halfpenny; four farthings equals two halfpence equals one penny (d); twelve pence (pennies) equals one shilling (s); The above list Salmon printed in nearly identical fashion in his seventh edition of Palladio, published in 1767, however, it is not clear if this means that prices remained relatively unchanged during the period. It is more likely that the earlier edition was not edited before it was reprinted in the later edition of Palladio.
Although William Salmon’s two works are the most comprehensive of the four builders’ handbooks, a comparison of the prices given in his work with those from *The City and Countrey Purchaser* and *The Builder’s Dictionary*, give an opportunity to examine the range of prices for painters’ services and to employ a painter to paint a specific color from 1703 until 1767 in England.

Of the three painters’ services mentioned in all four books: the painting of sash lights, sash frames, and iron bars for windows, the assigned fee remains relatively unchanged (Table 1).

Table 1.

<table>
<thead>
<tr>
<th>Builders’ Handbook</th>
<th>Year</th>
<th>Sash Lights</th>
<th>Sash Frames</th>
<th>Iron Bars for Windows</th>
</tr>
</thead>
<tbody>
<tr>
<td><em>The City and Countrey Purchaser, and the Compleat Builder’s Guide</em></td>
<td>1703</td>
<td>1 d per light</td>
<td>1 s per frame</td>
<td>1 d per bar, or more based on size¹¹⁷</td>
</tr>
<tr>
<td><em>The Builder’s Dictionary: or, Gentleman and Architect’s Companion...In Two Volumes</em></td>
<td>1734</td>
<td>1 s per light</td>
<td>1 s per frame</td>
<td>1 d per bar, or more based on size¹¹⁸</td>
</tr>
<tr>
<td><em>Palladio Londinensis; or The London Art of Building. In Three Parts</em></td>
<td>1738</td>
<td>1 d per light</td>
<td>12 d per frame</td>
<td>1 d per bar, or more if very large¹¹⁹</td>
</tr>
<tr>
<td><em>Palladio Londinensis; or The London Art of Building. In Three Parts</em></td>
<td>1767</td>
<td>1 d per light</td>
<td>12 d per frame</td>
<td>1 d per bar, or more if very large¹²⁰</td>
</tr>
</tbody>
</table>


¹¹⁸ *The Builder’s Dictionary: or, Gentleman and Architect’s Companion...In Two Volumes* (London, England: Printed for A. Bettesworth and C. Hitch, at the Red-Lion in Pater-noster Row; and S. Austen, at the Angel and Bible in St. Paul’s Church-Yard, 1734), Volume II.


All of the prices given remain consistent throughout the period. All four handbooks also record the cost of employing a painter to apply three painting colors: wainscot, walnut tree, and white lead. In contrast to the cost of employing a painter to paint a specific architectural feature, the cost of these paint colors decreased over the given time period (Table 2).

Table 2.

<table>
<thead>
<tr>
<th>Builders’ Handbook</th>
<th>Year</th>
<th>Wainscot</th>
<th>Walnut Tree</th>
<th>White Lead</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>The City and Countrey Purchaser, and the Builder’s Dictionary: or the Compleat Builder’s Guide</strong></td>
<td>1703</td>
<td>New Paint: 8 d per yard</td>
<td>10 d; or 16 d to 18 d per yard</td>
<td>10 d to 1 s per yard&lt;sup&gt;121&lt;/sup&gt;</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Old Paint: 7 d per yard</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>The Builder’s Dictionary: or, Gentleman and Architect’s Companion…In Two Volumes</strong></td>
<td>1734</td>
<td>New Paint: 8 d per yard</td>
<td>10 d; or 16 d to 18 d per yard</td>
<td>10 d to 1 s per yard&lt;sup&gt;122&lt;/sup&gt;</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Old Paint: 7 d per yard</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Palladio Londinensis; or The London Art of Building. In Three Parts</strong></td>
<td>1738</td>
<td>4 d per yard</td>
<td>4 d per yard, possibly more</td>
<td>4 d per yard&lt;sup&gt;123&lt;/sup&gt;</td>
</tr>
<tr>
<td><strong>Palladio Londinensis; or The London Art of Building. In Three Parts</strong></td>
<td>1767</td>
<td>4 d per yard</td>
<td>4 d per yard, possibly more</td>
<td>4 d per yard&lt;sup&gt;124&lt;/sup&gt;</td>
</tr>
</tbody>
</table>

<sup>121</sup> Neve, *City and Countrey Purchaser*, 215 – 216.
<sup>122</sup> *The Builder’s Dictionary*, Volume II.
<sup>124</sup> Salmon, *Palladio* (Seventh Edition), 63 – 64.
Unlike the cost of painters’ services per architectural piece, which remained relatively unchanged from 1703 to 1767, the cost of employing a painter to paint in a specific color decreased rather dramatically during the same period. The two earlier works, from 1703 and 1734, quote the same prices: Ten pence to one shilling per yard for white lead; eight pence for new painting work per yard and seven pence for old painted work per yard of wainscot; and ten pence to sixteen to eighteen pence per yard for walnut tree color.\(^{125}\) Salmon, however, quotes all work in these colors to be four pence per yard; an amount less than half for wainscot, two-thirds for white lead, and one-half to three-quarters less for walnut color. Perhaps, these decreases can be attributed to an increase in the production of pigments. Regardless, this noted decrease in cost may have made the use of a number of paints and pigments more accessible to the populations of both England and the American colonies in the late-1730s than earlier in the eighteenth century. At best, however, this observation of prices in England only gives a baseline for prices in colonial America. Presumably, shipping costs would have been incorporated into the price a colonist paid to obtain these items, in addition to levied taxes, meaning colonists in American would have had to pay more to obtain pigments than their English counterparts in Great Britain.

A closer look at Salmon’s inventory, as well as the pigments and colors presented in *The Builder’s Dictionary*, reveals that all of the pigments mentioned within these works were the same as those being stocked and advertised by New York City merchants, as well as other colonial merchants, by the 1730s and 1740s: white, blue, green, yellow, red, brown, and black.\(^{126}\) Salmon’s list, unlike

\(^{125}\) Old painted work meant that the feature had previously been painted, while new painted work meant that it was the first time the feature was to be painted.

\(^{126}\) *The Builder’s Dictionary*, similar to William Salmon’s works, identified the various colors and pigments used in house painting during the period, which included Indigo, Red Lead, Verdigrease, Umber, White Chalk, Red Oker, Spanish Brown, Smalt, Vermillion, Lake, Masticote, Lampblack, Black, and Ivory Black, among others. These, like the colors mentioned in Salmon’s works, cover all of the pigments sold in New York by the late 1740s.
colonial advertisements listing pigment colors for sale, gave the reader an indication as to the name of paint colors in everyday use and their cost during the period. Common colors were the cheapest ranging in price from four pennies to five pence per pound, including white lead, pearl, lead cream, stone and wainscot/oak color. These colors were followed closely by those based in brown or black pigments costing six pence per pound: chocolate, mahogany, cedar and walnut-tree. More specialized colors based in blue, green, yellow, and red pigments were more expensive still: gold and olive costing eight pence per pound; pea, fine sky blue and Prussian blue ranging from eight to twelve pence per pound; orange, lemon, straw, pink, and blossom color at twelve pence per pound; and by far the most expensive of all pigments available during the period, fine-deep green, at the dear price of two shillings six pence per pound, a price two-and-one-half times higher than any other available pigment.

The availability of William Salmon’s *Palladio Londinensis*, as well as Richard Neve’s *The City and Countrey Purchaser* and the later *The Builder’s Dictionary*, were not limited to England. By the mid-eighteenth century, as a part of the consumer revolution taking place during the middle of the eighteenth century, a flurry English carpenter’s handbooks as well as influential architectural pattern books of the period had reached the American colonies. The four books mentioned here are part of this trend, with their earliest known American references in 1754, 1743, and 1741, respectively. During the eighteenth century, Salmon’s carpenter’s handbook was one of the most widely used in the American colonies. Access to these works exposed American builders, designers, and architects alike to the current, architectural trends of London, including the new

127 Common colors contained a higher white lead content in proportion to other pigments in their composition, and comparatively much more white lead was used in these common colors than in more expensive painters’ colors.  
Palladian inspired architecture of the period, available pigment colors, and market rate pricing for pigments and painters’ services.\textsuperscript{129}

Comparing the availability of pigments in New York City, Philadelphia, and Boston as well as England, makes it is quite apparent that the consumer revolution that took place in the middle of the eighteenth century impacted one’s ability to purchase painters’ colors. Although the availability of painters’ colors appears to have occurred in Boston at an earlier time than either New York or Philadelphia – which could be attributed to Boston’s preeminence in colonial America, or perhaps, to the publication of a notable number of newspapers per capita – by, at the very latest 1748, a standardization of available, imported goods had taken place.

By the mid-eighteenth century, residents of Bergen County had become a part of a larger American consumer society. Contemporary accounts and newspaper articles, as well as the expansion of ferry and overland routes and technological advancements in transportation, evidence the new interconnectedness of the colonies, based mainly on trade and the ability to obtain imported consumer goods. That involvement introduced Bergen County residents to a multitude of newly available goods imported from England, which they were apparently willing and able to obtain.

CHAPTER 5: DUTCH PAINT USE: MATERIAL CULTURE AND ARCHITECTURE

Although Dutch residents of Bergen County had increasingly more access to imported goods, including pigments, by the middle of the eighteenth century, it is quite apparent their own form of material culture continued to thrive within their communities. This observation is apparent upon examination of Dutch material culture in America. Focusing upon cultural artifacts, which remain from the eighteenth and nineteenth centuries, it is clear that Dutch culture was able to persist throughout this period.

An investigation of existing material culture and architectural features, as well as primary documents and firsthand accounts, suggest some of the painting practices and colors employed by the Dutch during this period. Paintings of the time, including portrait, landscape, and religious, give an indication of what Dutch buildings and people, including their clothing and personal effects, looked like. Material remnants including furniture, both built-in and stand alone, architectural features, and particular Dutch artifacts, including spoonboards, have physical evidence highlighting Dutch paint use and as well as specific colors which were employed.

The predisposition of Dutch colonists to paint both their homes and their furnishings is a trait which derived from the seventeenth century Dutch culture of the Netherlands. The wealth amassed by the Netherlands during the Golden Age of the seventeenth century created a society which highly valued, and purchased, domestic material goods. An inquiry into Dutch painting in the Netherlands, through period paintings and primary documents, also established some of the traditional painting colors employed by this European culture in their homeland.
Secondary sources and scholarly articles have also added to this body of knowledge, as have previously completed paint studies and the accounts of historic preservationists’ specializing in Dutch and Dutch-American architecture. The earliest accounts mention little, if anything of architectural painting; if finishes are even touched upon, often it is their absence entirely that is notable. Later scholarly research gradually acknowledged the use of both interior and exterior finishes throughout the region, a practice that increases over time. Specific colors were also recognized, through paint studies as well as by the observations of preservation professionals.

A thorough examination of those sources gives some insight into the particular paint colors used in the Netherlands during the seventeenth century and by the Dutch of New York and New Jersey during the eighteenth century. The research seems to indicate that although not every Dutch family in the larger Dutch cultural region painted their homes, if they could afford to do so, they did. Additionally, there is evidence into the 1730s that persons of Dutch ancestry chose to paint their homes in styles and paint schemes based on Netherlandic, not English, precedent.

**Eighteenth Century Colonial Paintings & Seventeenth Century Dutch Genre Paintings**

Contemporary colonial paintings and portraiture give some insight into the paint used on both the interior and exterior of Dutch-American buildings. The hanging of paintings, including portrait, religious, landscape and genre works, was extremely popular among both the middle- and upper-class citizenry of the Netherlands. This practice was largely a result of the prosperity the Netherlands experienced during the Golden Age of the seventeenth century. In fact, this custom was very much particular to the Dutch culture in the Netherlands and the Americas until the nineteenth century. As Eric Jan Sluijter holds:
The great majority of the innumerable Dutch seventeenth-century paintings now hanging in museums all over the world were originally meant to decorate the homes of Dutch burghers. The paintings were made as commodities to embellish the environment in which these people lived their daily lives. It was certainly not a matter of course that burghers in cities like Amsterdam, Haarlem, Leiden, and Delft displayed high numbers of paintings on their walls. Not until the nineteenth century did this happen on a comparable scale in other European countries, even though pictorial production in Italy, Flanders, and France had been vigorous since the fifteenth century.\textsuperscript{130}

This penchant for paintings was transported with Dutch immigrants to the New World. In the colonies, the preference for portrait, religious, and landscape paintings is evident. Though only 250 or so Dutch colonial paintings have survived to the present day, primary documents including account books and wills indicate many more were undertaken during the colonial period. In addition to Dutch colonial paintings, colonists’ collections also included European paintings. The pervasiveness of the ownership numerous paintings by individual families has been captured in colonial records, including thirty-nine by New York City Mayor Cornelius Steenwyck, sixty-one by barber-surgeon Jacob De Lange in 1685, nineteen by Sara Webber in 1685, seventeen by Maria Van Varick in 1696, as well as four paintings owned by a family from Schenectady, New York during the early eighteenth century.\textsuperscript{131}


The most well-known painting to capture the exterior of a Dutch-American home is the *Van Bergen Overmantel*. Attributed to John Heaten, this work, completed c. 1733, is the only known painting to convey Dutch farm life during the period (Figure 4).  

![Figure 4: John Heaten, Van Bergen Overmantel, c. 1733, oil on cherry wood, secured with white pine battens, 16.25 in. x 88.75 in. Courtesy of the Fenimore Art Museum, New York State Historical Association.](image)

Portraying the homestead located in Leeds, Albany (present day Greene County), New York, the depiction captures not only the daily activities of farm life, but also those buildings around which this life centered. These buildings included a Dutch barn, two Dutch hay barracks, a blacksmith shop, and the house itself. The house and outbuildings portrayed in the painting were constructed in 1729 by Gerrit and Marten Van Bergen, sons of the original landowner Marten Gerritse Van Bergen. The one-and-one-half story home was constructed of local limestone. The main portion of the house features brick above the eave line, either a pantile red roof or a wooden shingle roof painted red to look like pantiles, two dormers with rolled gabled pediments, and what appear to be *bolkozijn* windows at the first floor, the latter three stylistic features directly adopted from the Netherlands. In contrast to the main house, the side wing appears to have an unfinished wood shingle roof. In addition to both natural and manufactured materials, the house also featured painted surfaces, including casement window frames and stiles, shutters, front door frames, and the front door itself. All the exterior frames were painted white, while the door’s stiles and panels

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133 Ibid., 119.
134 Ibid., 119 – 120. *Bolkozijn* windows are divided into two even sides by a center mullion. One opening is shuttered and the second is glazed.
were painted a darker color, perhaps a dark green, with white trim. All of the house’s shutters appear to be open with a painted, tri-colored design comprised of red stiles, white trim, and dark panels, perhaps dark green.

Comparison of the *Van Bergen Overmantel* with seventeenth century Dutch genre paintings indicates that the implementation of Dutch building and painting techniques in the English colonies of North America was carried out into the middle of the eighteenth century. No other Dutch artist

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135 Although it is clear that the main door’s panels, as well as the shutters’ panels, were painted a dark color, based on visual observation it is not entirely clear precisely which darker color was used, due in part to the fugitive nature of some pigments, as well as their degradation over time.
of the period captured the exterior of Netherlands’ structures with such precision as did Pieter de Hooch. In two of his paintings, *Figures in a Courtyard behind a House* (c. 1663-1665) (Figure 5) and *Woman with a bean basket in vegetable garden* (c. 1660) (Figure 6), the similarities of the Van Bergen home and those two paintings from the Netherlands cannot be denied. Both of de Hooch’s depictions show pantile red roofs, dormers, unfinished masonry, a stepped brick parapet gable end extending above the pantile roofline, and white trim throughout. The shutters featured in each of the paintings are different. Those featured in Hooch’s *Figures in a Courtyard behind a House*, show open shutters in the lower portion of the first story window that are painted red. One

Figure 6: Pieter de Hooch, *Woman and a Maid with a Pail*, c. 1660, oil on canvas, 53 cm x 42 cm. Courtesy of The State Hermitage Museum, St. Petersburg, Russia.
of the most interesting comparisons is that of the shutters featured in *Woman with bean basket in a vegetable garden* and *Woman and a Maid with a Pail* with those of the *Van Bergen Overmantel*. The open shutters in each of the paintings is nearly identical. Both exhibit exactly the same tri-colored pattern of red stiles, white trim, and dark center panels. This observation is extremely important. Not only does it show that decorative painting styles from the Netherlands were employed in American domestic architecture, but it also signifies that *particular* paint schemes from the Netherlands were employed as well.

Markedly, the use of this architectural style was not employed by an immigrant from the Netherlands, but rather was perpetuated by first generation colonists, Gerrit and Marten Van Bergen. Their father, Marten Gerritse Van Bergen was also not a recent immigrant, having traveled to New Netherland in 1640. Left childless from his first marriage, Van Bergen fathered five children, including Gerrit and Marten, after his second marriage to Neeltje Mynderson in 1686 at the age of 70; Van Bergen lived in North America for thirty-six years prior to marrying Mynderson.\(^{136}\) Therefore, by the time the two brothers built their homes c. 1729, the family had been established in Albany for nearly ninety years. The construction of this home by the Van Bergen brothers illustrates the propagation of the use of Dutch architectural elements and decorative paint schemes on the exterior of these structures well into the eighteenth century.

The outdoor paintings of seventeenth century Dutch genre painters also shed light on paint colors that were in popular use during the seventeenth century. Again, the works of Pieter de Hooch are the best representations of the period. In the ten exterior paintings completed by Hooch that were examined by the author, only eight specific paint colors could be identified. Those colors include:

red (on shutters, trim, and doors), white (on trim, brick, banisters, pilasters, door hoods, entablatures, cornices, and shutters); blue gray (on door trim, doors, shutters, a wooden hood over an exterior water pump, and window trim); green (on doors and shutters); brown (on shutters, trim, and banister stiles); gray (on shutters); and red brown (on shutters). Several paintings also include dark panels on shutters, and several dark doors, the color of which cannot be reliably determined, but it is possible they may be dark gray, green, or black. The paint colors utilized the most were white, red, and blue gray. The blue gray appeared to be the most versatile in exterior uses, not relegated to only one or two exterior elements, as was the case with red, or to only accent elements, as was the case with white. The most highly ornamental exterior element captured by de Hooch were the shutters. In addition, two patterns were exhibited in de Hooch’s paintings, the tri-colored shutters mentioned above, as well as an X design, as seen in *A Dutch Courtyard* (c. 1658-1660).

In *A Dutch Courtyard*, the two side triangles are painted gray, while the upper triangle is painted white and the lower triangle appears to be either a dark gray or black.

An examination of other outdoor paintings completed by Dutch genre painters would indicate Hooch’s color use was not the artist’s preference, but rather colors commonly used at the time. Johannes Vermeer, in his *View of Houses in Delft, Known as The Little Street* (c.1658), showed closed green shutters, open red and gray blue shutters, gray blue and tan window trim and brick walls that were whitewashed along the first floor. A closed door also appears to have been painted black. Unlike the first floor, which was whitewashed and had painted shutters, the second and third stories featured both unfinished brick and shutters. Jan Havicksz Steen’s *Adolf and Catharina Croeser, Known as ‘The Burgomaster of Delft and His Daughter’* (1655) also illustrated a similar use of color, featuring white trim around the windows and an open red shutter.
Perhaps one of the most interesting documents to show exterior paint colors are measured drawings completed as part of building contracts in seventeenth century Netherlands. Some of these drawings were painted in watercolor to show the materials and finishes to be used.\textsuperscript{137} Due to their being used in the field, many of these documents have not survived. One known example, prepared for a housebarn in Bulwijck, featured a set of drawings, including side, rear and front elevations, details, sections, and a floor plan. Of those drawings featuring the exterior, the draftsmen painted the bricks pink, the clapboards brown, the thatched roof yellow, the treads of the stoop gray, and the doors and shutters green.\textsuperscript{138} The majority of these building materials were represented in their natural color, without finishes; however the shutters and doors were painted, as is commonly seen in the Dutch genre paintings mentioned above. Again, this is an indication that the genre painters were depicting the exterior of homes as they actually were, with painted architectural elements.

American colonial portrait paintings also give some insight, albeit extremely limited, into the interior decorative schemes of Dutch-American homes during the middle of the eighteenth century. Many of the extant paintings from this period are examples of Dutch Patroon portraiture, a style which exhibits a realistic depiction of everyday life, stressing informality and seemingly simplistic in nature.\textsuperscript{139} Previous scholarly research has suggested that this style of art was “little more than a derivative of seventeenth century English portraiture,” specifically modeled after British mezzotints that were first introduced to the American colonies in 1710. Although some colonial

\textsuperscript{137} van den Hurk, “Imagining New Netherland,” 126 – 130.
\textsuperscript{138} Ibid., 130.
\textsuperscript{139} Deborah Chotner, American Naïve Paintings (Washington, DC: National Gallery of Art; [Cambridge, England]: Cambridge University Press, 1992), 45. The Patroon System was established by the Lords Nineteen, the governing body of the Dutch West India Company, in 1629 to encourage the settlement of New Netherland. In exchange for settling colonists in the New World, Patroons (who were wealthy Dutchmen) were given extensive tracts of land, powers of local government, and some participation in the fur trade. “Freedoms, as Given by the Nineteen of the Chartered West India Company to All those who Want to Establish a Colony in New Netherland,” World Digital Library, accessed January 2, 2017, https://www.wdl.org/en/item/4068/.
artists did reference these mezzotints in their own work, others did not – especially artists practicing in the Albany area. Interestingly, these English mezzotints were, in fact, grounded in the Dutch tradition, many of which were completed by artists who were either born or trained in the Netherlands. It has been suggested this is the reason why the works appealed to Dutch patroons. In addition to British mezzotints, some artists were also inspired by Dutch Bibles, which arrived in the Hudson Valley around 1700.\textsuperscript{140} As such, the composition of a number of Dutch colonial paintings that depict interior finishes are heavily based upon earlier works. Although the composition of many of these paintings was influenced by earlier sources, the artist still depicts the “Dutchness” of their subject with the inclusion of Dutch cultural items, including clothing and tapestries, which were indications of fashions and wealth.

Considered to be one of the more elaborate examples of colonial costuming and background is the portrait \textit{Magdalena Douw} (c. 1740), attributed to John Heaton. The artist captures not only the pattern, style, and color of the sitter’s dress, but also showcases an extremely ornate interior decorative scheme. The background, based at least in part upon illustrations from a Dutch Bible, features the wall painted in a blue green shade and arched windows being supported by decorative pilasters and capitals, painted in a slightly off-white hue. Just below the window sills, the wall appears to have wooden wainscoting, which was laid horizontally. The wainscoting, like the walls, was painted in a blue green hue.\textsuperscript{141}

Unlike the portrait of \textit{Magdalena Douw}, the majority of colonial portraiture only depict a small portion of the interior space as the sitter’s backdrop. When interior details have been depicted by

\textsuperscript{140} Ruby, “Dutch Art,” 55.
\textsuperscript{141} Ibid., 53 – 55.
the painter’s brush, the inclusion of classical elements is a noted tendency. Often, these decorative
details take the form of window balustrades. Perhaps the most detailed of these is in the portrait
of *Ariaantje Coemans Verplanck* (c. 1722), attributed to Nehemiah Partridge. Here, a detailed
balustrade extends across the window opening located behind the sitter, which appears to be
painted white. Again, however, this portrait is based upon an English mezzotint by G. Beckett
modeled after Sir Godfrey Kneller’s portrait of Lady Bucknell. Other portraits including a
variation of this decorative element are *Young Lady with a Fan* (1737) attributed to the Gansevoort
Limner (possibly Pieter Vanderlyn), *Mr. Van Vechten* (1719) attributed to the Schuyler Limner
(possibly Nehemiah Partridge), and *Boy of the Beekman Family* (c. 1720) whose creator is
currently unknown. Again, it is important to note that each of these paintings depicts a very similar
composition, with the subject standing to the right, the inclusion of tapestries above the subject,
and an open window with a balustrade to the left, overlooking natural scenery. The similarity of
each of these drawings may again indicate the inspiration for each came from an existing source.

Existing Dutch Patroon portraiture depicts the lives of wealthier Dutch-American citizenry of the
Hudson Valley. Even among this group, who were in a position to acquire whatever imported or
domestic goods they desired, a persistence of Dutch material culture is evident. This trend
continues from the earliest paintings until the late 1740s, and possibly thereafter. The portrait
*Elsje (Rutgers) Schuyler Vas* (1723) painted by Gerardus Duyckinck, displays the sitter in the
traditional dress worn by Dutch women in colonial New York.\textsuperscript{142} The portrait *Susanna Traux*
(1730) executed by the Gansevoort Limner, catches the young girl in a stripped dress, the style of

\textsuperscript{142} Deborah L. Krohn, ed., *Between East and West: The World of Margrieta Van Varick* (New York, NY: Bard
Graduate Center: Decorative Arts, Design History, Material Culture; The New York Historical Society; New Haven,
which was extremely popular in Dutch settlements in America during the period. The slightly later portrait *A Young Lady with a Fan* (1737) by Pieter Vanderlyn, showcases the sitter’s hairstyle and gold earring, which are unmistakably Dutch in origin. The latest of these, a portrait entitled *Catalyntje Post* (c. 1747) by an unknown artist, captures the sitter in Dutch shoes, recognizable for their pointed toes and thick, high heels.

Because many of those paintings capture the lifestyle of the more well to do Dutch American colonists, referring to Dutch genre paintings of the seventeenth century may give some insight into paint use in middle and lower class homes in the American colonies. A comparison of the portrayal of Dutch interiors of the Netherlands and the physical remnants of those in North America show very similar architectural attributes, the most prevalent of which were jambless fireplaces and exposed structural wooden beams using the “H-bent” frame.

Similarities of the exterior of Dutch, Dutch-American and Netherland’s homes have already been identified through remaining physical evidence and paintings. Mariet Westermann, in her article “Costly and Curious, Full of Pleasure and Home Contentment, Making Home in the Dutch Republic,” recognized the variation of finishes depicted in Dutch genre paintings:

> All of these finely worked, frequently colorful furnishings were seen against backdrops of varied hues and materials, ranging from whitewashed walls with Delft tile plinths and backsplashes to tapestries and gilt leather.

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144 Ibid., 148.
145 Ibid., 574.
As can be expected, Dutch genre paintings of the period show that the amount and variation of decorative finishes in Netherlandic homes correlated with economic wealth. In less wealthy homes, such as the one depicted in Pieter de Hooch’s *Soldier Offering a Woman a Glass of Wine* (c. 1653), both interior and exterior woodwork remains unpainted. A middle-class home, like the one illustrated in Jan Vermeer’s *The Music Lesson* (1662-1665), shows a marble checkered floor, and yellowish brown painted wood, on both the ceiling beams and the window frames and trim. An upper class home, such as that represented by Emmanuel de Witte in his *Portrait of a Family in an Interior* (1678), shows a number of decorative elements including a marble floor and mantelpiece, gilt leather wainscoting topped by a chair rail painted gray, a painted paneled door, and a highly ornate marbleized door surround. The door, which leads to an outside garden, is open showing viewers its exterior side. Again, the door is painted decoratively, with stiles and panels painted in dark blue or black, both with an off-white trim.

In addition to painted finishes, these interior renderings also depict architectural features found within Netherlandic homes during the seventeenth century. Exposed ceiling beams are viewed in the homes of the well to do and the less wealthy alike. This is also the case for the quintessentially Dutch jambless fireplace, the only type of fireplace featured in any of the Dutch genre paintings examined. As expected, each painting that featured a window showed one of three typical Dutch window styles, the *kruiskozijn*, the *bolkozijn*, or the *kloosterkozijn*, all variations of casement windows. Additionally, these paintings did not depict either wooden or painted baseboards along the bottom of an interior wall.
Dutch-American Furniture

Decorative painting by the Dutch in the American colonies is perhaps most widely seen and recognized on their furniture. According to Roderic Blackburn, in his work *Remembrance of Patria*, not only was the use of decorative painting regularly employed, it was also particular to the Dutch-American culture of New York and New Jersey. As he states:

Form and style are not the only distinguishing features of early New York and New Jersey furniture. The use of certain wood species, paint colors, and stains, are often indications of New York and New Jersey origin.\(^{147}\)

Both solid and contrasting paint colors were employed in the decorative painting of Dutch furniture. When common woods such as white pine, tulip popular, and maple were employed in furniture making, they were often painted over to conceal their true identity. Furniture that was less expensive, such as bed frames, chests, and chairs, were painted in one color, most commonly red, black, green, blue, blue gray or a brown stain.\(^{148}\) The Bergen County Historical Society, of Bergen County, New Jersey, has two such chairs in their collection. A ladder back chair with two rungs, which upon visual inspection featured remnants of an earlier red paint, followed by a later layer of green; and a three rung ladder back chair painted in green. Those two chairs were painted in colors recognized as those commonly used by the Dutch throughout the larger New York and New Jersey region in furniture painting.

More expensive pieces of furniture, such as the Dutch kast, could be painted using a variety of colors. Two well-known examples of pieces from New York City or the surrounding vicinity are held by the Metropolitan Museum of Art, on exhibit in the Dutch Period Room. The first, dating between 1690 and 1720, is yellow popular, red oak, and white pine painted with lead white and

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\(^{147}\) Blackburn and Piwonka, *Patria*, 258.

\(^{148}\) Ibid.
carbon black using a painting technique known as grisaille.\textsuperscript{149} The design is reminiscent of prototypes found in the Netherlands during this period, including the pendants and festoons, in addition to the pomegranate and quince design in the center of each door panel.\textsuperscript{150} The second, dating between 1650 and 1700, is made of white and red oak and painted to simulate marbleized patterning using what appears to be yellow, brown, gray, and black paint colors.\textsuperscript{151}

Built-in furniture was also treated in a decorative manner. Ester Singleton, in \textit{Dutch New York}, recognized the trend in that colony. Concerning cabinetry with glass doors, those constructed of the “plainest and cheapest wood” were often painted green, red, or yellow, in addition to sometimes being inlaid or carved.\textsuperscript{152} An example of this can be found in the Dewint House of Tappan, New York. A later addition to the home, constructed in the 1750s, featured a built-in cabinet painted Prussian blue on the exterior and interior woodwork painted salmon pink.\textsuperscript{153}

Another extremely important and undeniably Dutch item found in Dutch-American homes during the period was the spoon rack. As Roderic Blackburn explains:

\begin{quote}
It was a old custom for a man to present a wooden spoon holder to a woman to commemorate betrothal or marriage, sometimes inscribing his or her initials and the date thereon. Dutch family members placed their spoons (the most common eating implements) in assigned slots at the end of each meal. Household inventories in Amsterdam archives list spoon racks with slots for twelve to sixteen spoons.\textsuperscript{154}
\end{quote}

Spoon racks were highly individualized; of the sixty racks known today, no two are exactly alike. Many, however have similar characteristics, including that most were carved of poplar wood and

\textsuperscript{149} “Kast [American; New York City or vicinity] (09.175),” in \textit{Heilbrunn Timeline of Art History} (New York: The Metropolitan Museum of Art, 2000-), (December 2009)).  
\textsuperscript{150} Ibid. 
\textsuperscript{151} Ibid.  
\textsuperscript{153} Site visit by the author in March 2011.  
\textsuperscript{154} Blackburn and Piwonka, \textit{Patria}, 159.
painted one or more colors. Of those which were painted in their entirety, the most common color was a bottle green. On occasion, accents of yellow, white, red, and orange were used to highlight carved decoration.

**Contemporary Accounts from the Eighteenth Century**

There are very few primary sources that give insight into the interior finishes, or lack thereof, of the eighteenth-century Dutch and Dutch-American homes of New York and New Jersey. In most of the accounts that do exist, an emphasis is placed not on the architectural finishes of one’s home, but rather on the dress, manners, customs, furniture, and material possessions of the home’s Dutch American inhabitants. Albeit limited, one early source indicates no treatment was in use, while two later sources specify a particular paint color utilized on the interior of Dutch and Dutch-American buildings during the eighteenth century.

The earliest of these sources comes from the 1704 traveling journal of Madam Sarah Kemble Knight. Knight, a gentlewoman from Boston, took a trip from the northern city to New York, documenting what she encountered along the way. While in the “Citti of New York,” she wrote an account of both the exteriors (bricks sometimes laid in checkers and glazed) and interiors of the Dutch houses upon which she came:

> The inside of them are neat to admiration, the wooden work, for only the walls are plasterd, and the Sumers and Gist and plained and kept very white scowr’d as so is all the partitions if made of Bords.

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155 Ibid.
157 Ibid.
Knight indicated that the woodwork of the Dutch houses in New York City in the early eighteenth century was not painted but rather left unfinished.

A later source is that of Peter Kalm, a Finnish-Swedish naturalist, who kept a detailed journal during his travels through the North American colonies from 1748 to 1751. The contents of his journal were translated to English and published in 1770 under the title *Travels into North America*. While on the island of Manhattan during November 1748, he undertook writing a generalized description of homes within the locale:

The walls were whitewashed within, and I did not anywhere see hangings, with which the people in this country seems in general to be but little acquainted. The walls were quite covered with all sorts of drawings and pictures in small frames. On each side of the chimneys they had usually a sort of alcove; and the wall under the windows was wainscoted, and had benches placed near it. The alcoves, and all the wood work were painted with a bluish grey colour.\(^{159}\)

This entry is perhaps one of the most detailed contemporary descriptions of the interiors of Dutch homes in either New York or New Jersey from this period. Most importantly, Kalm did not give a description of only one home within the confines of New York, but of “most of the houses” within the vicinity.\(^{160}\) In doing so, Kalm recognized that by this date the painting of one’s interior was a common occurrence and that the employment of a “bluish grey colour” in the process was widely done. In addition to recording the interior finishes of Dutch homes in Manhattan, Kalm also noted the old Dutch Church was “painted in the infide [sic],” although no specific paint color was mentioned.\(^{161}\)

\(^{159}\) Kalm, *Travels*, 250.

\(^{160}\) Ibid., 249.

\(^{161}\) Ibid., 250 – 251.
To date, only one document has been uncovered that indicates a particular paint color employed on the interior of a Bergen County building during the eighteenth century: the minutes of a meeting of the Justices and Freeholders of the County of Bergen during the 1760s. The office of Freeholder was created in the act of February 28, 1714, of the colonial assembly, for the purpose of the “building and repairing of jails and courthouses within each respective County of the Province.”  

This elected group was given the responsibility of appointing “managers to do and see done such things as works as they shall agree upon to be done and performed” as well as authorizing the cost and materials of work to be undertaken at said buildings.

For this reason, when the 1734 Court House of Bergen County was undergoing extensive renovations during the 1760s, decisions concerning said work had to be approved by the Freeholders of Bergen County. At the May 22, 1765 meeting of the Justices and Freeholders of the County of Bergen, it was decided that the chosen Court House managers, Jacob Zabrinskie and William Provoost, were to “have the stair case altered” in addition to having the interior walls painted:

And it is further ordered that the Said Managers Shall have the Insides of the Court Rooms painted in a light blue Colours and Draw Upon the County Collector for the payment thereof.

Not only did the Freeholders specify for the interior to be painted, they mandate it be in “light blue Colours.” Although this document does not denote if this treatment was meant for wood trim, plaster, or both, it does reveal the interiors of structures in Bergen County and its vicinity were

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162 Bogert, *History and Heritage*, 42.
163 Ibid.
164 *Minutes of the Justices of the Board of Chosen Freeholders* (New Jersey: Bergen County Historical Society), 91.
being painted by that time, and, in this case, the chosen color was an exceedingly popular choice for that period of time, as is evidenced by Peter Kalm’s earlier account of Manhattan interiors.

Prior to the minutes of that May meeting, there is no indication that the interior of that building had ever been painted. Unfortunately, no material evidence of the Court House exists, due to its destruction in 1780 by fire, set by the British during a raid on Hackensack in the throes of the American Revolution.165

**Early Studies of Dutch-American Architecture**

Early studies of Dutch-American architecture, most notably *Pre-Revolutionary Dutch Houses and Families in Northern New Jersey and Southern New York* (1936) by Rosalie Fellows Bailey and *Dutch Houses in the Hudson Valley before 1776* (1928) by Helen Wilkinson Reynolds, did much to identify and define this early American building type.166 These publications, as well as others, contained a wealth of information regarding Dutch-American architecture throughout the wider Dutch cultural region, describing characteristics of the style including its form, materials, floor plans, roof styles, design elements, construction techniques and architectural features. Interestingly, however, these works give little consideration to early architectural finishes. Of the scant information each author does provide regarding architectural finishes, it is important to note that her conclusions are most probably based on visual observations or perhaps oral histories, rather than scientific paint analysis.

165 Bogert, *History and Heritage*, 52.
166 Written as companion volumes under the auspices of The Holland Society of New York, each of these books has been widely regarded as the foundation of study for this building type.
Reynolds, in her study of the Hudson River Valley, made little mention of exterior decorative features and no mention of interior decorative features. Saying of the former:

In the main, little attention was given at first to that which was merely decorative. Utility was the imperative consideration in a day of stern realities for living conditions. The most conspicuous external expression of the natural liking for decoration is the balustrade along the roof-line, which is found on a small number of houses.\textsuperscript{167}

Bailey, in her study of Northern New Jersey and Southern New York, was of the impression architectural paints were not widely used. Of the exterior, Bailey asserted:

A notable feature of the Dutch style is the combination of various building materials – stone, shingle, clapboard, brick and iron were often used in one house to form a beautiful composition, with each element contributing its share and adding life and scale by its individual quality.\textsuperscript{168}

The author did indicate, however, that exterior masonry walls were “sometimes covered with a sand and lime wash and frequently whitewashed or painted.”\textsuperscript{169} Of interior finishes, Bailey stated:

The seventeenth and eighteenth century farmhouses of the Dutch were austere and severely plain, depending completely for their effect on beauty of line and blending of varied building materials. Houses continued to be built in the same style until about 1835.\textsuperscript{170}

Some earlier studies, including \textit{The Social History of Flatbush and Manners and Customs of the Dutch} (1881) by Gertrude Lefferts Vanderbilt, provide slightly more information on paint use. Vanderbilt, however, gives no indication regarding her sources. Of the exterior, Vanderbilt mentioned that the iron hinges holding shutters were painted black and that outhouses were

\begin{footnotes}
\item[169] Ibid., 23.
\item[170] Ibid., 30.
\end{footnotes}
“covered with a heavy coat of dark red paint.” Of the interior, Vanderbilt stated that the heavy hewn beams supporting the upper story were “left in the natural color of the wood,” the bricks within the fireplace were painted every summer with red-lead “to look fresh and tidy,” and the cellar was whitewashed semi-annually “to ensure perfect cleanliness.” Vanderbilt’s study was built upon an earlier study of Flatbush, Brooklyn by Thomas M. Strong. Citing the Records of the office of the Secretary of the State at Albany, Strong published one of the earliest found mentions of paint use in New Netherland, stating that Reverend Johannes Theodorus Polhemus requested of Governor Stuyvesant on December 20, 1659, that “his church wanted painting, to preserve it.” This later reference does not indicate if the church was eventually painted, however, it does appear to show that paint was available and in use in New Netherlands by the late 1650s.

**Recent Scholarship & Architectural Remnants**

No comprehensive study of the architectural finishes of Dutch-American houses in Bergen County, nor the larger Dutch cultural region of New York and New Jersey, has ever been undertaken. Much of what has been written of paint colors in Dutch-American houses has either been sourced from mid-twentieth century architectural histories or is observational in nature. Although visual observations do provide some insight regarding paint use on architectural elements, certain vital information cannot be gathered from this method, including: 1) an accurate chromochronology of painted layers; 2) viewing the condition of the substrate, and whether the substrate was painted

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172 Ibid., 67 – 77.
soon after its installation; 3) viewing pigment size and particle distribution; and 4) gaining an understanding of pigments and binders by examining the samples using reflected ultraviolet light.

Several contemporary histories of Dutch-American architecture have used general histories regarding paint use in the American colonies to create a narrative regarding early paint use in the Dutch-American community. As such, it appears it is generally believed that paint use by the Dutch began in the early eighteenth century, with earlier houses being left completely unfinished. A lack of early physical evidence from seventeenth century to the early eighteenth century, however, makes this hypothesis difficult to definitively prove. Additionally, paint analysis of seventeenth century homes in New England, proves early paint use within the American colonies, dating paint use in the American colonies to before the first quarter of the seventeenth century.

Regardless, it appears that by the early eighteenth century, paint was being applied to the exterior roof shingles and clapboards of Dutch-American homes, as is evidenced by remnants of red paint on the original shingles of the early eighteenth century Van Cortlandt Manor House, in Croton-on-the-Hudson, Westchester County, New York, as well as the original clapboards of the Juriaan Sharp House in Defreestville, Rensselaer County, also painted red.\textsuperscript{174} The Ariaantje Coeymans House in Coeymans, Albany County, New York, also exhibits early paint use. Built c. 1716 by a member of the Coeymans family, the home is a two-and-one-half story stone and brick structure.\textsuperscript{175} This home still has remnants of paint on the interior window frames as well as the exterior shutters, which when closed would face the interior of the house. The interior frames were either a cream or white. The color of the shutter is disputed; Meeske stated the shutters were painted orange,

\textsuperscript{174} Meeske, \textit{Hudson Valley}, 230 – 231.

yellowish white, and green, while John Stevens, a noted historian of Dutch-American architecture, described the shutters as being:

> Of batten construction, are painted to look like they are paneled, with red margins and dark blue, almost black centers (Prussian blue?) surrounded by a margin of white corresponding the moldings on the battens.\(^{176}\)

Again, according to Stevens’ color account, exactly the same decorative color scheme that was used on the shutters of the Ariaantje Coeymans House was also employed on the shutters of the Van Bergen House.

A later example of the decorative painting on shutters was found at the aforementioned Juriaan (Juria) Sharp House. The home was built slightly later than the previous building, constructed c. 1740.\(^{177}\) Similar to the Coeymans House, the casement window frames were painted white, the interior of the shutters featured blue gray stiles, yellow molding, and orange paneling, and the exterior was painted solid red.\(^{178}\) Interestingly, replicas of these shutters were used in the Dutch Room of The American Wing in The Metropolitan Museum of Art. This room comes from the Daniel Peter Winne House c. 1750: a two room, one-and-one-half story home originally situated in Bethlehem, Albany County, New York.\(^{179}\)

Other exterior elements also received painting treatments. According the Meeske, one of the most popular colors to use on exterior woodwork was a Venetian red, remnants of which have been found on both the 1737 Van Alen House in Kinderhook, New York, and Crailo, the early

\(^{176}\) Meeske, *Hudson Valley*, 232; Stevens, “Cross-Windows.”


eighteenth century Van Rensselaer Manor house in Rensselaer, New York. As mentioned above, red was also used to paint clapboarding and shingles. Another popular color choice was white, used to paint window frames, as well as porches, balustrades, and railings.

Some Dutch-American homes featured a variety of paint colors on different architectural elements. Roderic Blackburn, in his work *Remembrance of Patria*, held that the use of contrasting colors was a common occurrence in Dutch-American architecture. A fairly early example is the above mentioned Van Cortlandt Manor House. In addition to featuring red roof shingles, the house also has a porch, railings, and balustrades painted in white, door frames painted light gray, shutters painted blue gray, and downstairs doors painted in chocolate brown featuring white panels. On the exterior of this early eighteenth century home, five paint colors were utilized.

Paint was also utilized on the interior of Dutch and Dutch-American homes during the seventeenth and eighteenth centuries. However, significantly less research has been accomplished on interior paint finishes as opposed to their exterior counterparts. According to Meeske, the interiors of the earliest Dutch-American homes were left largely unpainted. Of woodwork in these early homes, Meeske held that everything including the floors, beams, and panels were left unfinished, being washed frequently, if not daily. Walls covered in plaster, however, were whitewashed. Similar to exterior finishes, whitewash was often tinted to have a blue, gray, ocher, or pinkish tone.

Beginning in the Anglo-Dutch period during the mid-eighteenth century, a tendency to paint woodwork in addition to plaster walls developed. According to Meeske, the paint color most often

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180 Meeske, *Hudson Valley*, 228.
181 Ibid., 233.
184 Ibid., 335.
used was blue gray. The use of this color seems to not have been reserved to a specific area or surface, but rather was used throughout the home, on all woodwork including wood trim, beams, joists, and paneling, as well as plastered walls. A remnant of the Gerrit van Bergen House (c. 1729), a casement window with glass set in lead cams, exhibited traces of this blue gray color. During the eighteenth century, traditional Dutch casement windows began to give way to English sash windows. The above example is interesting because it is a more traditional Dutch casement window (not a later English sash window), that was installed at a later date and painted in this blue gray color. In addition to blue gray, other paint colors were utilized on the interior woodwork of Dutch-American houses, including yellow ochre, white, and Venetian red.

The prevalence of various shades of gray, in addition to reds, has also been noted. John Stevens, in his own research, observed that of “the colours used on trim elements of Dutch-American houses, there does seem to be a degree of standardization in the interiors with the use of greyed [sic] colours and sometimes red.” Bill McMillan, the former Supervisor of Restoration for Historic Richmond Town, in Staten Island, New York, also made the same observation, that grays and reds were the primary interior colors found in Dutch and Dutch-American houses. Roderic Blackburn has also remarked, “Blue-grey and red were the favored house paint colors used by the Dutch.”

The addition of baseboards also became popular during the Anglo-Dutch period. Wood baseboards were added to these homes and were often being painted black or red so “the woodwork

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187 John R. Stevens, email message to the author, October 2010.
188 Bill McMillan, telephone conversation with the author, November 2010.
would not show scuffing and general wear and tear.” Additionally, there were also occurrences of baseboards painted onto plaster walls. One such example is the DeWint House of Tappan, New York. On the base of a plaster wall, which was hidden by the addition of a cupboard in the 1750s, the presence of either a black or dark brown painted baseboard was visible.

Blackburn showed evidence of the highly decorative nature of the interior of some Dutch-American buildings. The Wyckoff House, at Six Mile Run (present day Franklin Park), Somerset County, New Jersey, boasted a mid-eighteenth century door of a highly decorative nature. Painted by Daniel Hendrickson of Holland (present day Middletown), Monmouth County, New Jersey, the door features paintings on both of its sides. The first side exhibited two large paintings that encompassed one panel apiece, a flower bouquet on the upper panel and a horse and rider on the lower; while the second side showed two smaller paintings, each of a single bird perched on a branch with leaves. The colors employed on the former were white, salmon, blue, and green. Another mid-eighteenth century example of Hendrickson’s work is an interior door from the Cornelius Couwenhoven House in Pleasant Valley, New Jersey. One side exhibited an upper and lower panel, the former a large Netherland type home, and the latter a flower bouquet. Here, he employed dark blue, white, gray, red, black, salmon, blue, and green.

**Additional Paint Studies**

**Wyckoff-Garretson House**

*Franklin Township, New Jersey*

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190 Meeske, *Hudson Valley*, 331.
191 Site visit by the author to the DeWint House, March 2011.
The Wyckoff-Garretson House was originally constructed by John Wyckoff between 1715 to 1730.\textsuperscript{194} John Wyckoff was a grandson of Pieter Claesen Wyckoff, a prominent Long Island merchant who originally immigrated to New Netherlands from Norden (in present day Germany) in 1637.\textsuperscript{195} Pieter’s son, Cornelius, purchased approximately 1000 acres in central New Jersey, just to the south of the Raritan River, in 1701, subsequently dividing the land and deeding it to his three sons in 1714/1715.\textsuperscript{196}

Cornelius Wyckoff inherited the property from his father in 1746. Soon thereafter, he made several minor alterations to the house, including the rebuilding the fireplace in the English manner and redecorating the large front chamber to include a mantelpiece, cupboard, and wainscoting.\textsuperscript{197} In 1800, the property was sold out of the family to Samuel Garretson, who significantly enlarged the homestead to almost twice its original size in 1805.\textsuperscript{198}

As a part of a larger Historic Structure Report, architectural conservator Janet Foster, of Acroterion, LLC, performed a paint study of the house. The paint study revealed that in the earliest section of the house, a deep reddish-brown paint was applied to much of the interior woodwork including the vertical bents, wooden partition walls, and door frames. The baseboard, however, was painted black. The next paint layer, a Prussian blue with a glaze layer was applied to various rooms of the house, most probably in conjunction with the renovations and house enlargement which was completed during the second half of the eighteenth century and the beginning of the

\textsuperscript{197} Ibid., 5.
\textsuperscript{198} Ibid., 4 – 5.
nineteenth century. It appears that the earliest historic layer of the exterior main door, which is a bluish gray color, also most probably dates to this same period.\textsuperscript{199}

**Van Cortlandt Manor**  
*Croton-on-Hudson, New York*

The original construction date of the Van Cortlandt Manor has not definitely been determined, however, early histories claim that the earliest portion of the building was constructed by New York Governor Thomas Dongan as a hunting lodge, trading post, and fortress during the seventeenth century.\textsuperscript{200} Stephanus Van Cortlandt purchased the property in 1688 and subsequently made several improvements. It is possible that by 1745 the building’s roof had been raised and the veranda that extends around three sides of the building had already been added. In 1747, the Pierre Van Cortlandt (Stephanus’ grandson) inherited the house, making several improvements to the property, which may have included the installation of interior wood paneling, it may also be possible that the roof line was changed during this period of construction. In the nineteenth century, two wings were added to the house, the east wing (c. 1810-1814) and the west wing (c. 1845-1847).\textsuperscript{201}

From 1953 through 1958, the Van Cortlandt Manor was restored with guidance from the Architects’ Office of Colonial Williamsburg. The building was restored to reflect the time period prior to 1810, which meant the removal of both the east and west wings, as well as roof dormers

\textsuperscript{199} The building’s exterior shingles date to approximately 1900, and therefore have no historic finishes which date to the period of study. Early, possibly original, wood siding laid flush with lapped edges is located below these later shingles. Although two layers of white paint and traces of red paint were found on this siding, it is not conclusive as to whether these layers are original or later paint layers. The architectural conservator, Janet Foster, recommended further paint analysis when selective exterior demolition reveals more of these exterior boards. Janet Foster, “Wyckoff-Garretson House Paint Analysis,” in *Historic Structures Report Wyckoff-Garretson House, Franklin Township, New Jersey: Volume I*, prepared by Mark Alan Hewitt (2001).

\textsuperscript{200} Architects’ Office of Colonial Williamsburg, “Architectural Record of the Restoration of The Van Cortlandt Manor at Croton-on-Hudson, New York for Mr. John D. Rockefeller, Jr.,” (May 1, 1959), 3.

\textsuperscript{201} Ibid., 3 – 4.
and other architectural features. As such, the restored property consists of a two-and-one-half story house built into a hill, so that the ground floor and the first floor are both at grade.\footnote{202}{Ibid.}

The restoration project included an examination of early interior and exterior architectural finishes, completed by the Architects’ Office of Colonial Williamsburg. Although the report does not identify what type of paint investigation was used, the document identifies “original eighteenth-century colors.” Exterior colors include: roof shingles painted red; the verandah wood floor and stair treads painted brown; one door with a gray sill and frame, brown lower door, stiles, and rails, and white upper door panels; all other doors with white frames and brown doors; windows with white frames and sashes and green shutters; and brown weatherboards.\footnote{203}{Ibid., 24 – 25.}

The paint investigation also identified early paint layers on wood elements at the building’s interior. On the ground floor these rooms and early paint layers included: Old Parlour – beige woodwork, white sashes, and red woodwork in closets; Kitchen – gray woodwork, white sashes, and red woodwork in closets; Milk Room – whitewash; and the Equipment Room – whitewash. At the first floor, these rooms and colors included: Second Floor Stair – painted grained mahogany; Rear Hall – painted grained mahogany, and white transom; Parlour and Dining Rooms – amber gray woodwork, white sashes, and red closet woodwork; Passage between Parlour and East Chamber – woodwork gray to match Parlour, floor retained original painted marbleized diagonal pattern of alternating light and dark squares; East Chamber – white sashes, woodwork grained mahogany; and Closet No. 4 – woodwork orange red, and white sashes.\footnote{204}{Ibid., 31 – 58. At the first floor, the Hall had been completely remodeled during the nineteenth century. As such, it appears that no historic paint layers were located in this section of the house. It also appears that paint colors for the first-floor West Chamber were not included in this study. Paint colors for the second-floor Hall are to resemble}
The Dutch Period Room in the Metropolitan Museum of Art’s New American Wing was the larger chamber of the Daniel Peter Winne House. Originally, the house was constructed 1751 in Bethlehem, Albany County, New York, as a two-room residence. Winne’s family emigrated from Flanders to New Netherland in 1652; he was the fourth generation of his family to live in the Upper Hudson River Valley. The one-and-one-half story framed house was built with H-bent construction and featured a steeply pitched roof and casement windows.\textsuperscript{205} In March 2007, The Metropolitan Museum of Art, Sherman Fairchild Center for Objects Conservation drafted the Examination and Treatment Report: Dutch Room, with the intention of identifying the earliest paint layers found on various architectural features within this room.

The color examination identified two paint colors originally used in the interior of the room: yellow and red. Of thirteen extant posts, yellow was the earliest paint layer found on all but three. The yellow paint was topped with a transparent finish layer. This yellow color was also the first paint layer on both the interior door, connecting the large chamber to the small chamber, and the molding along the side of the staircase. Two of the remaining posts appear to have not been finished until a later date, and the last exhibited red as the first layer, a color choice possibly made due to a large piece of furniture having occupied that particular corner. These early yellow and red paint layers were applied on recently shaved or scraped wood, indicating these elements were painted soon after the wood was planed. These early yellow and red paint layers were followed by gray, then those of the first-floor Hall, which appear to have not been provided in the report. The report indicates that the four rooms on the second floor, save the hall, are to have gray woodwork and white sashes, however, the report does not state that these colors were determined by paint investigations. Architects’ Office of Colonial Williamsburg, 38 – 39 & 55.

\textsuperscript{205} Metropolitan Museum of Art, “Peter Winne Exhibit,” January 2011.
These later colors are those that were identified by Stevens and McMillan in their observations.

An additional observation from the Daniel Peter Winne House was that the seven inches located at the bottom of each post “consistently showed multiple layers of yellow paint and sometimes a brown layer, possibly a wax or varnish.” The conservators who completed this project believed this paint scheme was evidence of a baseboard that had been painted around the base of the room, on both the posts and plaster walls. Interestingly, this painted baseboard had actually been covered over by a later, wooden baseboard, which was painted a grey/blue.207

The paint study also yielded information regarding exterior paint colors from the front door. This outer surface featured a very thin, bright red paint layer under a much thicker, red layer.208

**Jan Martense Schenck House**

*Brooklyn Museum*

The Jan Martense Schenck House is located in the Brooklyn Museum’s Exhibitions: Decorative Arts Galleries and Period Rooms. The house was originally constructed by Jan Martense Schenck, an immigrant from the Netherlands. The house was completed in 1675, in an area of Brooklyn now known as Mill Basin. The house, similar to the much newer Winne House, is a one and one half story frame structure of H-bent construction, with a steeply pitched gabled roof and casement windows.209

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207 Ibid., 3.
208 Ibid., 2.
A paint study of the exterior of the Schenck House was completed by Jamie Martin, the Conservator and founder of Orion Analytical, a material analysis and consulting firm. The wood siding is considered to be an eighteenth-century replacement for the original seventeenth century clapboard. Therefore, the earliest paint layer represents a color used in the eighteenth century. The first paint layer identified on the wood clapboard was a red layer, followed by one green layer and many subsequent layers of white. Unfortunately, as mentioned above, the interior of the house has been too severely altered to obtain paint layers from original woodwork.\textsuperscript{210}

\textbf{Abraham Hasbrouck House}

\textit{New Paltz, Ulster County, NY}

The Abraham Hasbrouck House is located in New Paltz, Ulster County, New York. The home was constructed in three stages. The earliest section of the home was a one room, one-and-one-half story section of rubble masonry construction built by Daniel Hasbrouck, Abraham’s son, in 1721. The second, an addition to the northern elevation, was built in 1728 and the last, an addition to the southern elevation, was completed in 1734, creating a linear, three room floor plan. Daniel was a second-generation French Huguenot; his father Abraham immigrated with his brother Jean in the early 1670s.\textsuperscript{211}

A finishes study of the Abraham Hasbrouck House was completed for the Hasbrouck Family Association by Jablonski Building Conservation, Inc. in October 2010. This study examined the interior finishes of the original 1721 house as well as the subsequent 1728 and 1734 additions.


Although many of the house’s wooden elements had been stripped, the architectural conservator was able to remove samples from areas that still maintained their historic finish.\textsuperscript{212}

Early finish layers were found in the 1721 section of the home on several doors, door frames, beams, and a window sill. The majority of the original architectural features in this room, including the doors, door frame, and beams were originally painted with a moderate reddish brown, topped with a dark reddish brown varnish. This same color was found as the earliest paint layer on exterior elements of this portion of the house. A number of the room’s features exhibited additional early paint layers. The door on the east side of the north wall had the most extant paint layers with twelve. The first two red layers were followed by several wood graining campaigns. An investigation of the ceiling planks revealed that they were originally left unpainted.\textsuperscript{213}

The 1728 addition to the Hasbrouck House also yielded evidence of early finish layers. Samples were taken from several wood elements including beams door lintels, a door, door frame, baseboard, window lintel, and window frames. The earliest finish layer one of the room’s window lintels was a yellowish white colored limewash. The earliest baseboard finish was black. The earliest finish at both the beams and ceiling planks was a dark grayish brown stain. The earliest finish found at the door and door frame on the south side of the room, connecting this room to the earliest section of the house, exhibited a moderate reddish brown color.\textsuperscript{214}

In 1734 a final, one room addition was made to the Hasbrouck House. Early finish layers were also found on a number of features within this section of the house, including beams, ceiling

\textsuperscript{212} Ibid., 8.
\textsuperscript{213} Ibid., 7 – 8, 10 – 11, & A-56 – A-59.
\textsuperscript{214} Ibid., 14 – 15.
planks, and baseboards. Samples taken from the ceiling and exposed beams suggest that both of these features were originally left unfinished. The earliest finish found on the sampled section of baseboard was a dark bluish green. The earliest finish found on several window returns was a dark olive brown shellac. And the earliest finish on the window’s frame, sash, and surround was a yellowish white. An encased beam was originally painted white, and an attic beam was originally painted grayish yellow.  

The report also provides a determination for 1750s finishes for the building, however, it acknowledges the difficulty in doing so, mainly due to the number of elements in the house (including windows) that post-date this period, as well as a lack of finishes on doors and door frames. Regardless, the report holds that window lintels were painted a yellowish white, the baseboards were a dark bluish green, the beams, ceilings, and door frames were finished with a dark orange yellow distemper paint, with a brown distemper paint top coat, and window returns, frames, sills, and surrounds in a dark olive brown shellac.  

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215 Ibid., 17 – 19.
216 Ibid., 20 – 21.
CHAPTER 6: PAINT STUDIES IN BERGEN COUNTY

The Westervelt House

The Westervelt House is located in present day Tenafly, New Jersey (Figure 7). The home was constructed in three stages from approximately circa 1745 to 1825. The original, one-room, brownstone home was built by Roelof Westervelt circa 1745. The central and largest section of the home, a brownstone structure featuring a five-bay main façade and symmetrical central hall plan with a gambrel roof, was built by Roelof’s grandson, Daniel Westervelt, circa 1798. The northern wing was the last addition to the home, a one-and-one-half story frame structure with eyebrow windows, completed by Daniel’s son, Peter Westervelt, in 1825.

Roelof Westervelt, the original builder of the homestead, was a second-generation American. His grandfather, Roelof Westervelt, was brought to the New World as a young boy by his parents Lubbert and Gessie Van Westervelt in 1662. After briefly living in Kings County, New Amsterdam, the family settled in Bergen County, East Jersey. In 1695 Roelof, with nine other

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217 Dendrochronology has not been completed at the John Naugle, Isaac Naugle, or Westervelt Houses. Dendrochronology testing, which takes small cores from wood architectural elements with extant bark and uses the annual rings to determine when a tree was felled, can be used to help date early buildings with wood elements. As such, dating for these three houses is somewhat speculative, but is based on primary and secondary documentation, as well as architectural evidence and previous studies. Regarding the Westervelt House, there are conflicting dates of construction. Bailey identifies the earliest date of construction as circa 1745, but the “Individual Structure Survey Form – Westervelt House,” states that the wing is later based on architectural evidence. It is important to note, however, that the Westervelt House has two wings, and the survey form does not identify to which wing it is referencing. The survey form also states that at the time of the survey, the Westervelt House was the only house in Bergen County to have an operable jambless fireplace. Based on the existence of a jambless fireplace, it seems highly improbable that the wing was constructed in the nineteenth century. The physical evidence to which the survey form is referring may be the existence of wood clapboard in the gable of the circa 1798 section of the house, which serves as the north wall of the garret in the circa 1745 section of the house. This may indicate that the circa 1745 section was moved to its current location. As such, the author has retained the dates of construction identified by Bailey, but recognizes that these dates are speculative and future research may uncover a more definitive date of construction. This is also the case for the John and Isaac Naugle Houses.

218 Bailey, Pre-Revolutionary, 327 – 328.


220 Genealogical research of the Westervelt family suggests upon initially immigrating to North America, they lived in Kings County, New Amsterdam. This is evidenced by the couple’s son Jurriaen Van Westervelt’s birth being
men, obtained a patent from the Lord Proprietors of East Jersey for a large tract of land in Bergen County, extending from the Hudson River to Overpeck’s Creek. In the same year, Westervelt purchased an additional tract of land bounded by the east and west branches of the Overpeck, extending northward to the Tiena Kill Brook. With this purchase, Roelof Westervelt amassed one of the largest farms along the Hudson River.

Figure 7: Westervelt House, looking northeast. Taken by the author, April 2017.

As a part of this Master’s thesis, paint samples were obtained from the Westervelt House by Kimberly De Muro and Mary Jablonski, a conservator and adjunct professor at Columbia University, on Friday, March 11, 2011 (Appendix I). Interior paint samples were removed from the circa 1745 and circa 1798 sections of the home. In the circa 1745 section, where a jambless

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222 Wharton Dickinson, ed., Genealogy of the Westervelt Family (1905), 17.
fireplace is still extant, samples were taken from the west wall, including the wood trim of the
transom window above the exterior door, the underside of the window sill adjacent to said door,
and from the baseboard located along the southern wall. In the circa 1798 section, a sample was
taken from the central hall staircase leading from the main level to the second floor. The historic
fabric still extant within the structure was limited, therefore only a small number of paint samples
were taken.

Interior samples were removed from three architectural features in the circa 1745 section of the
house: the window sill, transom window, and baseboard. Sample WV-WT-001, removed from
the underside of the window sill, contained twelve intact paint layers. Sample WV-TW-002, taken
from the west door’s transom window, contained a total of twenty-four painted layers. Sample
WV-BB-003, taken from the room’s baseboard, contained a total of thirty layers. An interior
sample was also removed from a stair riser in the 1798 section of the home. Sample WV-SR-004,
from the stair riser appeared to contain two paint layers.

Sample WV-BB-003, taken from the baseboard, featured the oldest paint layers from the circa
1745 section of the home. This sample featured an intact wood substrate. The first paint layer
was a light gray, followed by a medium gray. Sample WV-TW-002, taken from the transom
window, did not have an intact substrate, so the earliest paint layers from that feature are not
known.

Samples WV-WT-001 and WV-SR-004, taken from the window sill and stair riser, respectively,
appear to contain later paint layers. The first layer appears to be a thin dark brown layer, followed
by a light green. Sample WV-WT-001, did not have an intact substrate and may have therefore
been missing its earliest paint layers.
A 1995 paint study conducted by Acroterion, Historic Preservation Consultants examined paint colors applied to exterior wooden elements of the Westervelt House. Samples were taken from intact clapboard, window frames, and sashes located on each section of the home. From the oldest section of the home, samples were extracted from the gabled end window frame and window sash. Both the window frame and the window sash were left unpainted for some time, evidenced by the weathered wood substrate of the former and the heavy dirt layer on the latter. Whether that occurred at the time of installation of the sash or later is unclear. The first evidence of paint on either element was traces of dark green on the window sash, a similar color of which was not found on the frame. All subsequent layers on both elements were white.

**John Naugle House**

The John Naugle House is located in present day Closter, New Jersey (Figure 8). John Naugle and his wife, Elizabeth Blauvelt, built the earliest section of the home circa 1740. Initially, the house was a one and one half story brownstone structure, featuring two first floor rooms and a gabled roof. Although later frame additions were attached to the west and east elevations of the home in the late eighteenth century and the 1970s, respectively, today the brownstone section of the home remains a rare surviving example of the stone saltbox shape within Bergen County.

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224 Ibid., 4 & 6.
226 Hoglund, Githens, Rothe, and Tholl, “John Naugle House.”
John Naugle, like Roelof Westervelt, was a second generation American. His grandfather, Jan Nagel, immigrated to New Netherland under the employ of the Dutch West India Company. In 1664, Nagel settled in Harlem, marrying Rebecca Waldron in 1670. While living in Harlem, Rebecca gave birth to the couple’s three sons, Jan, Barent, and Resolvert. In 1710, Resolvert and Barent purchased the 1030 acres of land from Lancaster Symes, a merchant and land speculator who had bought the land only one year prior from Bernardus Vervelen. Soon after, Barent Nagel and his wife, Sarah Kiersen, built a stone house on the property, raising their family of seven, which included son John. Once married, John built his own home directly behind his father’s.  

As part of this Master’s thesis, paint samples were obtained from the John Naugle House by Kimberly De Muro on Wednesday, March 30, 2011 (Appendix II). Interior and exterior paint samples were removed from the circa 1740 section of the home. Interior samples extracted from

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Bailey, *Pre-Revolutionary*, 303 – 305.
elements in the main room included those taken from the exposed hewn beam to the north of the fireplace and from the north side of the fireplace adjacent to the same hewn beam. Exterior samples were taken from the wood trim surround of the front door. Due to the small amount of historic fabric still extant, only a limited number of paint samples were taken.

Interior samples were taken from two architectural features, a hewn beam and the side of the fireplace in the main room. From the hewn beam, samples were extracted from the bottom, the west side, and the west side beaded edge. Of these, Sample JN-HB-003, taken from the west side of the hewn beam, was the most intact sample featuring seven paint layers. Sample JN-HB-002, taken from the beaded edge contained five layers, while Sample JN-HB-001 taken from the base of the beam, retained only one layer. The bottom of the hewn beam had previously been stripped, therefore only one layer of paint remained on that portion of the feature.

Each of the paint samples removed from the hewn beam featured an intact wood substrate, which appeared clean upon inspection with paint penetrating into the open grains of the planed wood, indicating the wood was painted soon after installation. All three samples exhibited the same first layer, a light blue. This light blue layer is followed by a thin, dark blue layer (perhaps a glaze layer), followed by light gray.

From the extant portion of the jambless fireplace, two samples were removed from the north trimmer. Of these, Sample JN-FP-001 retained the most historic paint layers with eight. A comparison of sample JN-HB-003 and JN-FP-001 concludes the hewn beam and fireplace surround were historically painted in an identical manner. Based on the size and shape of visible pigment particles through layer eight, it would appear all extant paint layers on both the hewn beam and fireplace trimmer in the John Naugle House are historic, not modern, paints.
Exterior samples were procured from the wood trim surround of the front door. Samples were taken from the upper and lower corners of the left casing and from the upper corner of the right casing. The intact substrate on each sample exhibited an uneven, jagged surface, indicating the wood had previously been stripped. Each of the three samples was comprised of three layers of white paint. When examined under ultraviolet light none of the paint layers fluoresced, indicating the presence of modern, not historic, paints.

**Isaac Naugle House**

The Isaac Naugle House is also located in present day Closter, New Jersey (Figure 9). The one room brownstone structure was originally constructed circa 1745 – 1775 on property owned by Hendrick Naugle and his wife, Catherine Blauvelt. Hendrick Naugle was also a second generation American, another of Barent Naugle’s sons. If this house was constructed during the earliest period of construction, it can be surmised that Hendrick was the original builder of the home, which he built on land just to the south of his brother John’s homestead. Sometime prior to the 1770s, Isaac Naugle inherited his father’s home. During this decade, Isaac significantly expanded his home from a one-room plan to a four-room plan.\(^{228}\) If the building was constructed during the

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\(^{228}\) David J. Hoglund, Herbert J. Githens, Albin H. Rothe, and Claire K. Tholl, “Individual Structure Survey Form – Isaac Naugle House,” in *National Register of Historic Places Inventory – Nomination Form: Stone Houses of Bergen County Thematic Resource* (Washington, DC: National Park Service, National Register of Historic Places, 1979 & 1982). Tim Adriance, a Historic Preservation Specialist practicing in Bergen County, New Jersey, has conducted documentary research and onsite research to come to this original date of construction. Additionally, Mr. Adriance determined the house was originally one room, with the three-room addition constructed at a later date.
later possible period of construction, Isaac Naugle would have constructed the house on land that he had inherited from his father.

As a part of this Master’s thesis, paint samples were obtained from salvaged architectural features taken from the Isaac Naugle House by Kimberly De Muro and Mary Jablonski, on Friday, March 11, 2011 (Appendix III). Interior samples were obtained from the salvaged window’s rail and stile, and a baseboard. Exterior samples were taken from the salvaged window’s rail, stile, and window putty. Due to the limited number of architectural elements salvaged from the Naugle home, only a small number of samples were obtained.
Interior samples were taken from two salvaged architectural features, the upper window sash and a baseboard. From the twelve-pane window sash, samples were extracted from the window’s rail and style. Of the window samples, Samples IN-IN-005 and Sample IN-IN-006, taken from the window rail both featured seventeen paint layers. Sample IN-IN-007, from the stile contained five layers.

Each of the paint samples removed from the interior window sash featured an intact wood substrate, which appeared clean upon inspection with paint penetrating into the open grains of the newly planed wood, indicating the wood was painted soon after installation. All three samples exhibited the same early layers, light gray and gray. Based on the size and shape of visible pigment particles through layer seventeen, all extant paint layers on both the interior and exterior of the window sash taken from the Isaac Naugle House are historic, not modern, paints.

One sample was removed from a salvaged section of baseboard. From the eight-inch high baseboard with one inch beaded edge, a single sample was removed from the face of the board. Sample IN-BB-008 featured a single paint layer, a dark red brown. The paint appeared to have been absorbed into the first few layers of wood grain. Additionally, the layer appeared very dark under ultraviolet light, which suggests this layer may have been either a copper resinate-based glaze or an oil-based paint. However, it is unclear as to what period this layer can be attributed.229

Exterior samples were taken from the upper window sash. Two samples were removed from the rail, one from the window stile, and one from the window putty. Samples IN-EX-001, taken from the rail, IN-EX-002, taken from the rail, and IN-EX-004, taken from the stile, had small pieces of

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wood substrate attached to their base. Sample IN-EX-003, taken from the window putty, had a completely intact putty substrate attached to the base. Each of the samples exhibited the same eight-layer stratigraphy, featuring a very thick, transparent layer with an inner white core, followed by a layer of red brown. Although a wood substrate was attached to these samples, it was difficult to determine whether the wood had been freshly planed or if there was an earlier dirt layer under the first finish layer. However, the putty sample exhibited no such dirt layer, so it may be surmised that this architectural element was initially painted and not left bare.

The thick, transparent layers found within Samples IN-EX-001, IN-EX-002, IN-EX-003, and IN-EX-004 appears to be an oil undercoat based in whiting as opposed to white lead, producing an almost transparent paint layer. According to Bristow, this was a rather common practice in seventeenth century British interiors, encouraged in published works including those by John Evelyn in Sylva or à Discourse of Forest-Trees (Second edition, 1670) and William Leyburn in Architectonice: or, a Compendium of the Art of Building (1700), which was published as an addition to John Brown, The Mirror of Architecture: . . . by Vincent Scamozzi (Fourth edition, 1700).²³⁰

**Additional Bergen County Paint Samples**

The Dey Mansion is located in present day Wayne, New Jersey (Figure 10). Originally, the structure was built in an area of southern Bergen County, which became a portion of Passaic County when the county boundaries were realigned in 1837. The home was constructed between 1740 and 1750 by Dirck Dey and was most probably completed by his son, Theunis Dey.²³¹

²³⁰ Bristow, *Colours and Technology*, 100, 252, & 255.
Dirck Dey was a second generation American. Dey’s grandfather, his namesake, emigrated from Amsterdam, Holland to New Amsterdam as a soldier of the Dutch West India Company prior to 1641. By 1707 or 1708, Dirck had relocated to the Preakness area of Bergen County from New York City. On October 9, 1717, he purchased 600 acres of land on the Singac Brook from the heirs of Thomas Hart, one of the original twelve proprietors of East Jersey, for £120, New York.

Figure 10: Dey Mansion, façade, facing north. Source: Historic American Buildings Survey, Dey Mansion, 199 Totowa Road, Preakness, Passaic County, NJ (circa 1933). Library of Congress.

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233 Labaw, Preakness, 24.
money.” There are conflicting accounts as to whether he purchased an additional 200 acres of land from Peter Sonmans in 1730 for £50.234 Dirck Dey was an extremely prominent citizen of Bergen County, serving as a County Freeholder and a member of the New Jersey General Assembly from 1748 to 1752.235 It appears that after his term was completed in 1752 and prior to April 14, 1753 Dirck had moved to New York; on that date he deeded property as a resident of that city.236

Theunis Dey was the first child of Dirck and his wife Jannetje, born on October 18, 1726 and baptized at the Acquackanonk Dutch Reformed Church.237 Theunis was a third-generation colonist. Like his father, Theunis was a very prominent citizen of Bergen County and the colony of New Jersey. He served as a Colonel of the Bergen County Regiment of Militia in 1776 until the end of the war and as a representative in the New Jersey Assembly from 1761-1765, 1768-1776, 1779, and 1783.238

The Dey Mansion combined a number of traditional Anglo-Dutch and more architecturally fashionable English Georgian style architectural features. Reflecting the homeowner’s wealth and social status, the two-story structure with gambrel roof is symmetrical in form, featuring a five-bay façade, quoins, rusticated window surrounds, water table, and belt course. The façade is finished in brick with brownstone decorative features, while the three other exterior walls are finished in rubble fieldstone and brownstone, with brick header window surrounds. The interior also reflects the English Georgian style, with a central hall flanked by two rooms on either side.

235 Lurie, Encyclopedia of New Jersey, 206.
236 Labaw, Preakness, 26.
238 Labaw, Preakness, 30.
A paint study of the Dey Mansion was completed by Materials Conservation Collaborative, LLC for the Passaic County Parks Department in January 2012. The study included an examination of interior and remaining exterior painted elements of the structure. The Dey Mansion underwent a restoration in the 1930s, during which the four rooms on the west side of the house were completely restored, with all wood elements likely stripped of paint. These rooms include the parlor and library on the first floor, and two bedrooms on the second.\textsuperscript{239} Historic paint samples were therefore obtained from remaining interior rooms including the Central Hall, Sitting Room, and Dining Room on the first floor and the Main Hall and two Bedchambers on the second floor. Limited paint samples were also obtained from the exterior of the structure.

The Central Hall on the first floor was mostly intact. The hall was only partially restored in the 1930s, receiving new doors. According to the study, the plaster walls of the main entryway were originally wallpapered. To determine the original color of the wood paneling, samples were taken from four building elements in the main hall - the north window side panel and surround, the panels below the window, and the door surround. It was determined the paneling in this room was originally a medium gray, followed by a black finish.\textsuperscript{240}

In the first-floor Sitting Room, samples were taken from five elements, the mantle, chair rail, rounded molding above the fireplace, and the exterior and interior of the cupboard to the right of the fireplace. According to these samples, the earliest finish layer in the room was a yellow tan, followed by white. The cupboard in the room originally was painted a bright orange on the interior. In the first-floor Dining Room, samples were taken from the window sash, the chair rail along the

\textsuperscript{240} Ibid.
west wall, and a window frame. According to these samples, it appears the room was originally painted a light tan, followed by a gray blue green.\(^\text{241}\)

In the Main Hall on the second floor, samples were obtained from six elements including two areas of baseboard, two areas from the window sash and window surround, one door and one door surround. According to these samples, it the hall was originally painted gray. Samples were also removed from two bedchambers located on the second floor. In the southeast bedroom, samples were taken from various elements including a window muntin and window, the mantle and adjacent cupboard, chair rail, door, baseboard, window panels and window seat. Two samples, those from the mantle at the east side, and the chair rail had missing substrates. Here, the earliest paint layer appears to be a pinkish tan, followed by layers that may appear to indicate wood graining. In the northeast bedroom, samples were taken from various elements including window muntins, the mantle, and door surround. According to Ms. Myers study, the woodwork featured in this room was originally a light gray.\(^\text{242}\)

Paint samples for this study were also obtained from the exterior of Dey Mansion. Exterior samples were removed from several elements. The earliest finish, a red oxide paint followed by a brown layer, appears to date to the mid-nineteenth century, postdating the period of study.\(^\text{243}\)

\(^{241}\) Ibid.  
\(^{242}\) Ibid.  
\(^{243}\) Ibid.
CHAPTER 7: ANALYSIS: DUTCH PAINT USE IN BERGEN COUNTY

To gain insight into the way in which members of the Dutch community in colonial Bergen County applied paint in their homes, a number of sources were consulted, including: primary and secondary documents exploring the history of Bergen County and the larger Dutch cultural region of New York and New Jersey, paint use and paint availability, cultural artifacts exhibiting decorative paint use, paintings and portraiture of the larger Dutch cultural region, and previously completed color studies of Dutch and Dutch-American architecture from throughout the larger region. Finally, the author completed on-site conservation fieldwork. The compilation of this source material has allowed for a greater understanding of the use of paint in colonial Bergen County, and throughout the larger region.

The John Naugle, Isaac Naugle, and Westervelt Houses: A Comparison

As previously stated, as a part of this Master’s thesis, paint samples were taken from three houses and/or their architectural elements within Bergen County, New Jersey: the John Naugle House, Isaac Naugle House, and Westervelt House. Each house was selected because it met the various parameters set by the author’s thesis requirements: it was within the geographic region of colonial Bergen County; was within ten miles distance of a Reformed Dutch Church; was constructed between 1740 and 1776; and was a Dutch-American stone house. Upon comparison, the John Naugle House, Isaac Naugle House, and Westervelt House share a number of other striking similarities.

The period of study, 1740 to 1776, was chosen because it represents the last period of the colonial era in which a purely Dutch color scheme may be identified. As previously mentioned, each of these houses was constructed within the period of study.
The second criterion was that each was a Dutch-American stone house. Although the builders retained early Dutch floor plans, they incorporated decorative and architectural elements that trace their roots to English architecture, primarily of the Georgian style, in the New World. At the very least, this appears to include the integration of double hung sash windows at all three houses, a possible baseboard at the Isaac Naugle House, and the inclusion of baseboard at the Westervelt House. As such, it appears that prior to building homes with floor plans rooted in the English Georgian architectural style, Dutch homeowners in Bergen County and the surrounding area were incorporating smaller architectural elements from English design. The John Naugle, Isaac Naugle, and Westervelt Houses all exemplify this phenomenon.

The builders of the houses themselves also share a number of similar traits. All of the homebuilders were either second- or third- generation colonials. All of the builders’ descendants also shared similar settlement patterns in New Amsterdam and later in the colonies. Initially, Roelof Westervelt, and his parents Lubbert and Gessie Van Westervelt, lived in Kings County, NY, before moving to Bergen County. The same is the case for the Naugle family. Jan Naugle originally settled in Harlem, NY, before moving to New Jersey. As mentioned earlier, this migration pattern from New York to New Jersey was a common practice.

Further, each home was built on a large parcel of land purchased earlier by ancestors. The Westervelt House was constructed on a large tract of land amassed by Roelof Westervelt’s grandfather, Roelof Westervelt, in 1695. Westervelt was one of nine other men to obtain a patent from the Lord Proprietors of East Jersey for a large tract of land in Bergen County bounded by the Hudson River and Overpeck Creek. Later in the year, he bought additional property bounded by the east and west branches of Overpeck Creek, and extending north to the Tiena Kill Brook. Both
Naugle Houses were built on a sizeable piece of land purchased by Hendrick and John Naugle’s father, Barent, and his brother, Resolvert, in 1710, from Lancaster Symes.

The settlement patterns of the Westervelt and Naugle families are illustrative of the larger trends of the many Dutch families who came to eventually reside in northern New Jersey. As previously mentioned, the Dutch practice of partible inheritance, as opposed to the English practice of primogeniture, led many Dutch families who initially settled in Brooklyn, Manhattan, Harlem, and Long Island, to move to other areas in New York and New Jersey where land was more readily available. Here, Dutch families would acquire large tracts of land as either a shareholder of a large patent, or buying land through land speculators or private sale. By doing so, these Dutch families were able to perpetuate this cultural trend.

The commonalities of the John Naugle, Isaac Naugle and Westervelt Houses and their owners underline the shared cultural traits of the Dutch community in northern New Jersey during the mid-eighteenth century. These like characteristics, coupled with contemporary dates of construction, will allow for a more accurate comparison of the paints used within them.

**The John Naugle, Isaac Naugle, and Westervelt Houses: Paint Study Comparison**

As a part of this Master’s thesis, paint studies were completed for the John Naugle, Isaac Naugle and Westervelt Houses by the author. These studies consisted of both interior and exterior samples being removed from the houses themselves and a number of salvaged architectural elements. In the case of the Westervelt House, this analysis also included a paint study completed at an earlier date by another architectural conservator. The finished studies yielded insightful information of
paint colors and paint use by members of the Dutch community of colonial Bergen County from 1740 to 1776.

**Interior**
An evaluation of the earliest paint layers from interior architectural elements of the John Naugle, Isaac Naugle and Westervelt Houses demonstrates a number of similarities and differences. In the Westervelt House, Sample WV-BB-003 taken from a baseboard located in the circa 1745 section of the home contained 30 paint layers with an intact substrate. From the circa 1740 section of the John Naugle House, Samples JN-HB-003 and JN-FP-001, taken from the hewn beam and fireplace, have 7 and 8 layers, respectively. Samples IN-IN-005 and IN-IN-006, taken from the window stile and window rail of architectural elements salvaged from the Isaac Naugle House, each contain 17 paint layers.

Upon comparison, the earliest finish layers from the Westervelt House and the Isaac Naugle House are almost identical. Sample WV-BB-003, from the Westervelt House, featured an intact wood substrate, with an initial finish layer of light gray, followed by a medium gray. Samples IN-IN-005 and IN-IN-006, from the Isaac Naugle House, also exhibited an intact wood substrate followed by light gray, light gray, and medium gray. These early paint colors employed by both Roelof Westervelt and Hendrick Naugle, were identified as “common colours” by William Salmon in his *Palladio Londinensis*, which included white lead, pearl, lead cream, stone, and wainscot and oak. The lower cost of these pigments, in addition to their availability, appears to signal that a consumer driven decision, as opposed to a cultural one based in Dutch precedents, dictated the paint colors chosen for these houses. In Bergen County, the nature of this consumerism stemmed from the lower cost and availability of these pigments, in addition to the county’s growing exposure to other cultural groups, including the English, due in part to the county’s proximity to New York City.
It is possible; however, that these paint colors may indicate a larger Dutch cultural trend. Both John Stevens and Bill McMillan noted the prevalent use of gray paint in Dutch and Dutch-American houses through their own research. Their observations, though, were based upon visual inspection as opposed to paint studies undertaken by an architectural conservator. As such, it is not possible to conclude when the gray paint layers observed by Stevens and McMillan were applied. This includes whether or not these gray paint layers were applied soon after the wood was planed and if they were the earliest paint layer applied to each observed architectural element. As such, it cannot be clearly deduced as to whether the early light and dark gray paint layers in the Isaac Naugle and the Westervelt Houses were a part of a larger cultural trend or a decision based on consumerism.

The earliest paint finishes from the John Naugle House, on the other hand, starkly contrasted its contemporary counterparts. Whereas the owners of the Westervelt and Isaac Naugle Houses chose to paint their homes with neutral, cheaper, and perhaps more readily available pigments, the first historic paint layer in Samples JN-HB-003 and JN-FP-001 is a light blue, followed by a dark blue (perhaps a glaze later), to be later followed by a light gray. Although a more neutral paint color was used after the earlier painting campaigns, these first two paint layers are unlike the early layers exhibited in either the Westervelt or Isaac Naugle Houses. As identified by Salmon, the use of blue pigment would have been much more expensive than the “common colours” employed in the Westervelt and Isaac Naugle Houses. This color choice more clearly appears to have been motivated by consumerism as opposed to a Dutch cultural trend. The distinctly different paint color employed in the John Naugle House also seems to support the suggestion that the paint colors chosen for both the Westervelt and Isaac Naugle House were a personal choice made by the homeowner as opposed to a more widely spread cultural trend.
Exterior
An evaluation of the earliest paint layers from exterior architectural elements of the John Naugle, Isaac Naugle and Westervelt Houses was less informative than those from interior architectural elements. Samples removed from the exterior door trim of the John Naugle House revealed that the woodwork had previously been stripped, removing all historic paint finishes from the element. The paint study of intact, exterior architectural elements at the oldest section of the Westervelt House (the gable end window frame and sash), revealed that these elements showed a thick dirt layer, with no evidence of early finish layers below the dirt layer. As opposed to the Westervelt House, samples taken from exterior window elements of the Isaac Naugle House (including the rail, window putty, and stile), indicate that this architectural element was originally painted. The first painting campaign consisted of a very thick, transparent layer with an inner white core, followed by red brown layer.

Clearly, the early treatment of exterior wood architectural features at the Westervelt House and the Isaac Naugle House was varied. While it appears that the windows of the Isaac Naugle House were painted immediately after they were installed, the woodwork on the exterior of the Westervelt House was left bare for an extended period of time. Therefore, a comparison of the earliest paint layers found on both elements may not be particularly conclusive. However, it is important to note that the earliest exterior paint layers found were those employed at the Isaac Naugle House, a thick, transparent white layer followed by a red brown layer.

An exciting similarity comes to light when the stratigraphies of interior and exterior samples are compared. An examination beyond the first few paint layers for both the Westervelt House and the Isaac Naugle House signals that the interior elements of these houses were painted at a more frequent rate than their exterior counterparts. This is especially intriguing because paint was
widely known to serve as a protective layer for wood architectural features exposed to the elements, when no such claim appears to have been made for interior features. As such, it appears that these Dutch residents of colonial Bergen County chose to paint the interiors of their homes immediately after wood architectural elements had been installed and at a more frequent rate than exterior wood elements, another choice which appears to signal less emphasis on the practical application of paint and more importance on decorative preferences and the emerging consumerism driven mindset of the Dutch in colonial Bergen County.

**The John Naugle, Isaac Naugle, and Westervelt Houses: A Colonial Bergen County Comparison**

As previously stated, there are very few additional sources that have captured the paint colors employed by the residents of colonial Bergen County from 1740 to 1776. Only one more paint study, that of the Dey Mansion, and one first-hand account, describing the use of paint in the Bergen County Courthouse, have been identified. A comparison of these two documents with those findings from the Naugle and Westervelt Houses will allow for a further analysis of the paint colors used in colonial Bergen County during the period of study.

The Dey Mansion, like the John Naugle, Isaac Naugle, and Westervelt Houses, met the various parameters set by the author’s thesis requirements. The Mansion fell within the confines of colonial Bergen County, was less than five miles away from a Reformed Dutch Church, was constructed between 1740 and 1776, and was a Dutch-American stone house. The John Naugle, Isaac Naugle and Westervelt Houses, like their original owners, share an uncanny number of the same characteristics. Although the Dey Mansion and its owner also share some of these same characteristics, there are a number of things that separate the Dey Mansion from its colonial Bergen County counterparts.
The Dey Mansion was built from 1740 to 1750. A portion of this time frame aligns with the earlier construction of the John Naugle, Isaac Naugle, and Westervelt Houses. The later period, however, slightly post-dates the construction period identified for the three other colonial Bergen County homes.

Dey Mansion is also a Dutch-American stone house, although it was much larger than the one-room and extended one-room dwellings constructed by the Naugle and Westervelt patriarchs. Although a few English stylistic elements were adapted to the Dutch-American stone houses built by John and Hendrick Naugle and Roelof Westervelt, the ten-room Dey Mansion was designed in the Georgian architectural style. In addition to its central hall plan, the dwelling featured corner and window surround quoins, a water table and belt-course, as well as interior features including wainscoting, crown molding, sash windows, baseboards, and chair rails.

Dirck Dey, like Roelof Westervelt, Hendrick Naugle, and John Naugle, was a native born, second-generation colonist. Furthermore, the Dey family’s settlement patterns were somewhat similar to the Naugles and the Westervelts. As was typical for Dutch colonists during the period, the Dey family originally settled in New York before moving to New Jersey. It was Dirck Dey, however, and not an earlier generation of descendants to initially migrate to Bergen County around 1707 to 1708. Comparatively, the immigrant generation of Westervelts migrated to Bergen County in the seventeenth century, while the first generation of Naugles did so in 1710. As such, Dey built his home on a large parcel of land he obtained, rather than the second-generation Naugles and Westervelt, who built on large parcels amassed by earlier descendants.

There are several additional disparities that appear to separate Dey from his contemporaries. The first is that Theunis Dey, Dirck’s son and a third-generation colonist, may have contributed, or
even finished, construction of the original home completed in 1750. Secondly, it appears that by 1752 Dirck had relocated to New York City, presumably leaving his son Theunis at the helm of his lands and newly completed house. Thirdly, Dey spent the first twenty years of his life living in New York City. This is in stark contrast to the lives of John, Hendrick, and Roelof whom spent most, if not all, of their lives in Bergen County. Lastly, Dey was a very prominent and powerful member of the community, having served as both a Bergen County Freeholder and a member of the New Jersey Assembly. Likewise, his son Theunis served as a Colonel of the Bergen County Regiment of Militia and as a New Jersey Assemblyman.

**Interior**

On the first floor of the Dey Mansion, it appears that the architectural elements in each room tended to be the same color, and individual rooms were originally painted in different colors: The Central Hall was originally painted a medium gray, followed with a black finish; the Sitting Room was originally a yellow tan followed by white; and the Dining Room was a light tan followed by a gray blue green. This trend continued on the second floor: the Central Hall was originally painted gray; the southeast bedroom was originally painted pinkish tan, followed by a wood graining campaign; and the northeast bedroom was originally painted light gray. Within the house’s first painting campaign a clear color palette emerges: grays and tans.

Due to the limited amount of historic material present within the Isaac Naugle, John Naugle, and Westervelt Houses, a comparison of the paint colors applied within different rooms was not possible. However, in the John Naugle House and the Westervelt House, where samples were removed from more than one interior architectural element, it also appears that different architectural elements within the same room were painted the same color during each painting campaign.
Comparison of the early paint layers found in the John Naugle, Isaac Naugle, and Westervelt Houses, and the Dey Mansion, clearly illustrates that gray is the most popular paint color for building interiors in the Dutch-American Stone Houses of Bergen County during the period of study. At least one gray painting campaign took place at each of these houses, including: The first two painting campaigns at both the Westervelt and Isaac Naugle House; the third layer at the John Naugle House; and was utilized in three of the six rooms that retained their historic finishes at the Dey Mansion. The only other colors to appear in these paint studies are the early blue and dark blue (possibly glaze) layers at the John Naugle House, and the tan variations (including yellow, light, and pinkish tan), black finish, gray blue green, and possibly wood graining layers at the Dey Mansion.

**Exterior**
Again, the exterior samples removed from the Dey Mansion did not reveal any early paint layers from the period of study. As such, the only historic finish layers from the period are from the Isaac Naugle House, which were an early transparent white layer followed by a red brown layer.
Chapter 8: Colonial Bergen County and Geographic Areas Outside of the County: A Comparison

From 1740 to 1776, it appears that a very limited palette of interior paint colors was employed in the Dutch-American Stone Houses of Bergen County. Dominated by variations of gray, the palette also included the limited use blue (including a dark blue, possible glaze layer) at the John Naugle House and variations of tan (including yellow, light, and pinkish tan), a black finish, gray blue green, and possible wood graining layers at the Dey Mansion. All of these early paint samples, however, indicate that paint was applied soon after the wood was planed and installed.

In comparing these colors with those found in Dutch and Dutch-American homes throughout the larger Dutch cultural region of New York and New Jersey, as well as paint colors employed within the whole of colonial America, it may be questioned whether the evidence identifies a distinctive Bergen County trend. Did the color choices identified in this study extend throughout the larger Dutch cultural region, or was it indicative of a broader fashion spreading throughout the whole of colonial America in the mid-eighteenth century? A few paint studies, as well as first-hand accounts and current scholarship have identified painting colors used within these larger regions before and during the period of study.

The presence of a palette of colors and treatments employed on the exterior of Dutch-American Stone Houses in colonial Bergen County during this period is less clear. Unlike interior architectural features, which appeared to have been painted immediately, exterior architectural features were either left unfinished or were painted some time after installation. Exterior elements, however, are more vulnerable to weathering and deterioration than their interior counterparts, which may partially account for this trend. Unfortunately, only one architectural element sampled by the author contained historic paint layers. As such, it is difficult, if not impossible, to determine
a palette of exterior paint colors for the geographic area based on two historic paint layers from the same architectural element.

**Colonial Bergen County and the Larger Dutch Cultural Region**

In the larger Dutch cultural region, the interior painting colors employed just prior to and during the period of study have similarities and differences to those found in colonial Bergen County. Most of the houses built prior to 1740, including the Ariaantje Coeymans House (c. 1716), Gerrit Van Bergen House (c. 1729), and the Dewitt House (c. 1700), provide information for paint colors that appear to have been applied prior to the period of study. The Abraham Hasbrouck House (1721–1734), meanwhile, gives insight just before and during the period of study. The Wyckoff-Garretson House (c. 1715 – 1730 with later additions), shows paints colors applied just prior to and after the period of study. The Daniel Peter Winne House (1751), constructed within the period of study, identified the house’s original painting scheme. Although the exact period of the Van Cortlandt Manor (seventeenth century with major alterations by 1749) paint scheme is somewhat unclear, it is somewhat reasonable to presume that the colors date to the house’s major renovations from 1747 to 1749.

**Exterior**

Upon examination of the larger Dutch cultural region it is quite evident, based on the comparison of architectural remnants, seventeenth century Dutch genre paintings, and the landscape painting of the Van Bergen farm, that specific color schemes and particular designs were brought from the Netherlands and employed in the exterior painting of houses in the wider Hudson River Valley until, at the very least, the early 1740s. The most pronounced example of which was the Van Bergen House (1729), whose architectural elements and paint schemes including a pantile or painted red roof, dormers with rolled gable pediments, casement windows, and paint use, including
white window and door frames, the main entrance door with dark blue stiles and panels and white trim, and shutters with a solid dark blue exterior and a polychrome interior, with red stiles, white trim, and dark blue panels, were captured by artist John Heaton c.1733. An earlier example of similar shutters was found at the Ariaantje Coeymans House (c.1716), described as either orange, yellowish white, and green or red, dark blue, and white; with a later example at the Juriaan Sharp House (c.1740), with a solid red panel while closed and blue gray, yellow, and orange while open. Each of these houses was located with the Hudson River Valley, the former two within colonial Albany County, and the former within Rensselaer County.

In addition to these Netherlandic color and design schemes, a variety of paint colors were also employed on the exterior of buildings throughout the larger Dutch cultural region. The Abraham Hasbrouck House (1721 – 1734) exhibited the earliest exterior paint layers, a moderate reddish brown with a dark reddish brown varnish. Similar layers were also observed at the Daniel Peter Winne House (1751), with a thin, bright red paint layer (possibly a varnish layer) under a much thicker, red layer. Red was also the earliest paint layer on the eighteenth-century replacement siding on the Jan Martense Schenck House (c. 1675). White was also used on the trim of the Van Bergen House and the casement windows at the Juriaan Sharp House. The Van Cortlandt House (1748) exhibited the most decorative of early paint schemes, with red roof shingles, white porch, railing, and balustrades, light gray door frames, blue gray shutters, and chocolate brown basement doors with white panels.

It appears that by the period of study, exterior paint use in the wider Dutch cultural region, like paint use in colonial Bergen County, was varied. It appears that in Bergen County, some homeowners chose to paint exterior architectural elements while others did not. Due to the scant
evidence of exterior paint in Bergen County, it is difficult to make a conclusive comparison between paint colors in Bergen County and the wider Dutch cultural region during the period of study. It is important to note, however, that both of the exterior paint colors used in Bergen County during the eighteenth century were also employed in the wider Dutch cultural region.

**Interior**
The interior color palette of colonial Bergen County appears to share some similarities with the interior color palettes previously identified by scholars of Dutch-American architecture for the larger Dutch cultural region. Specifically, the color gray, which was identified by both Stevens and McMillan, appears to have been widely used in Bergen County during this period. Other colors identified for the larger Dutch cultural region including blue gray (Meeske and Blackburn), red (Meeske, Stevens, McMillan, and Blackburn), white (Meeske), and yellow ochre (Meeske), were not viewed in early historic paint layers in Bergen County.

A comparison with other paint studies of interior architectural elements in Dutch-American homes throughout the wider Dutch cultural region also reveals some similarities and differences. In both the Wyckoff-Garretson House and the Abraham Hasbrouck House, the earliest finishes were a moderate reddish brown. At the Peter Winne House, the earliest finishes were red and yellow. These colors were not present in the early interior finish layers of the Dutch-American Stone Houses of Bergen County. Prussian blue with a glazing layer, however, appears to have been utilized at both the John Naugle House and the Wyckoff-Garretson House.

Interestingly, the only house to exhibit gray paint besides those houses in Bergen County was the Van Cortlandt Manor. Similar to the Dey Mansion, the Van Cortlandt Manor also employed different paint colors in different rooms, and used both beige paint and variations of gray paint in
several rooms. Red paint was also employed in closets in the Van Cortlandt Mansion, similar to the use of reddish orange paint in the cupboard of the Dey Mansion. Another similarity is the use of a gray blue green paint in the Dey Mansion, and a dark bluish green in the Abraham Hasbrouck House (1750s paint layer), as well as wood graining in the Dey Mansion, Abraham Hasbrouck House, and the Van Cortlandt Manor.

**Comparisons to Colonial America**

In “The Early American Palette, Colonial Paint Colors Revealed,” Frank S. Welsh identified an eighteenth century colonial color palette comprised of eleven colors: Black, Browns, Moderate Reddish Brown, Grays, Yellowish White, White, Greens, Yellows, Red and Reddish Orange, Pink, and Blues. Each category allowed for variations in color, including lighter, darker, and different tinted shades. Welsh developed his palette by compiling and analyzing a database of over one hundred hues from over 175 colonial structures dating from 1715 to 1815, which included paint samples from wood trim as well as plaster walls and ceilings. Welsh held that this palette of eleven colors was not regional, rather, it was noted as being relatively similar throughout the colonies.\(^{244}\)

It is important to note that the palette of paint colors identified by Welsh is based on a “broad cross section of buildings,” however, most of the buildings identified within his article are dwellings for, at the very least, the moderately well-to-do – if not wealthy – members of colonial society. As such, his findings may not be representative of all paint use during the period, but it is the most comprehensive palette of paint colors which has been developed for the American colonies to date.

From his studies, Welsh drew several additional conclusions regarding paint use in colonial America. Perhaps most importantly, Welsh found that no one paint color emerged as the most

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\(^{244}\) Welsh, “American Palette,” 69 – 85.
popular within the colonies. Welsh also offered his views regarding pre- and post-1750 interior and exterior paint colors. Prior to 1750, the most popular color for trim work on the exterior of masonry buildings was Spanish brown; after 1750, the popular color for trim became white with a slightly yellowish tone, due to the yellow cast of the linseed oil binder.\textsuperscript{245} Welsh states that a “guarded generalization might be that in the early or first half of the eighteenth-century exteriors typically were painted in medium to dark tones such as reddish browns and grays and that in the second half of the eighteenth century building exteriors very frequently were painted with light colors such as whites, yellowish whites, very light grays, and sometimes pale blues.”\textsuperscript{246}

Regarding interior colors, Welsh held that in a “vast majority of colonial homes and public buildings is a medium blue made with white lead and Prussian blue…”\textsuperscript{247} The second most used color was varying shades of green, ranging from light to dark, as well as blue-green to yellow-green. The brightest colors of the eighteenth century – reds and reddish oranges – were very rarely used - principally to paint the interior of cupboards. The only color Welsh found to be a “multipurpose shade” was Spanish brown. Welsh concluded that excluding gold leaf, it appeared that no one paint color was the most expensive, used only by the affluent, or exclusively used in the best room of the house. Welsh was of the feeling that rather than a specific paint color, expensive French and Chinese wallpapers, as well as textiles, were employed to express one’s affluence.\textsuperscript{248} Research undertaken as part of this Master’s thesis and detailed in Chapter Two

\textsuperscript{245} Ibid., 70.
\textsuperscript{246} Ibid., 70. Welsh also notes that dark green colors, like that found on the shutters of the Westervelt House, did not come into wide use until the close of the eighteenth century and the beginning of the nineteenth century. Welsh, “American Palette,” 70.
\textsuperscript{247} Ibid.
\textsuperscript{248} Ibid., 71.
contradicts Welsh’s findings, by showing that some pigments and paints were more expensive than others.

All of the early paint colors employed at the Isaac Naugle, John Naugle, and Westervelt Houses, as well as the Dey Mansion, were captured within Welsh’s colonial palette. As described above, the early interior color palette of paints used in colonial Bergen County was primarily comprised of variations of gray. However, other colors also appear to have been employed, including blue and dark blue (possible glaze) layers at the John Naugle House, and variations of tan (including yellow, light, and pinkish tan), a black finish, gray blue green, and possibly wood graining layers at the Dey Mansion. Early exterior colors found in colonial Bergen County are limited and only include single early layers of white and red. A comparison of the individual colors featured in Welsh’s palette and their typical usage with the paint colors identified in colonial Bergen County shows that all of the paint colors employed in Bergen County were also being employed throughout the rest of the colonies. Perhaps the only noted difference is that several paint colors identified by Welsh, including blacks, browns, moderate reddish browns, whites, yellowish whites, greens, and blues, were not as widely employed in Dutch and Dutch-American homes in colonial Bergen County as they appear to have be throughout the rest of the colonies.

**Grays**

Gray colors were observed in the Isaac Naugle, John Naugle, and Westervelt Houses, as well as the Dey Mansion. Welsh identified light gray as a very popular color during the colonial period. Created with a combination of white lead and charcoal black, and sometimes including iron earth pigments, this color was primarily applied to interior wood trim. Exterior use was much more limited, however, a noted example of its use on exterior clapboards, cornice, and windows was at
the late-eighteenth century Morris-Jumel Mansion in New York City. Medium grays, created through the use of a higher proportion of charcoal black and iron earth pigments, added to the white lead, was also applied to interior woodwork.

White
White paint was found as the earliest exterior layer at the Isaac Naugle House. Welsh calls white the “most popular and ubiquitous exterior paint color used in America in the second half of the eighteenth century.” Exterior paint was usually created with white lead and linseed oil, sometimes with a small amount of calcium carbonate, or trace amounts of red iron oxide, charcoal black, or lampblack. It is important to note that these white paints may appear yellowish due to the yellow cast of the linseed oil binder.

Yellows
Some of the tan colors identified in the interiors of colonial Bergen County fall under the yellow family, as described within Welsh’s classification system. Welsh states that variations of yellows were popular as an oil paint for interior trim, the most popular yellow being a moderate orange-yellow, made with yellow ocher, white lead, and calcium carbonate and varying in shade from pale to light to medium.

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249 Ibid., 73.
250 Ibid.
251 Ibid., 74.
252 Ibid.
253 Welsh also identifies yellowish whites as one of the more popular paint colors employed during the colonial period. According to Welsh, yellowish white and yellowed pure whites can only be told apart through polarized light microscopical pigment analysis. Based on his studies, these yellowish whites vary in color, with all containing different proportions of basically the same pigments. Welsh, “American Palette,” 70 & 74.
254 Ibid., 76.
Pinks
A pinkish tan layer was witnessed at the interior of the Dey Mansion. Again, Welsh holds that pinks were used throughout the colonies more often than one might expect. These colors were made with white lead and calcium carbonate that was tinted with one of a number of red pigments including vermilion, haematite or red iron oxide and shaded with a number of other pigments including charcoal black, yellow ocher, and umber. 255

Blues
Blue paint colors were found at the John Naugle House. Welsh holds that both light blues and medium blues were used in interior house painting during this period. Light blue colors were wide-ranging, with white lead and calcium carbonate mixed with Prussian blue serving as the most common pigment to create these colors. As an example of one of the most interesting uses of this color, Welsh cites the vertical face of baseboards at Thomas Jefferson’s Monticello, in Charlottesville, VA. Perhaps more popular than light blues were medium blues, which were “very popular in almost all homes and all types of public buildings.” 256 Although Prussian blue was still relied upon to create this color, it was mixed not only with white lead and calcium carbonate, but also with small amounts of yellow ocher or charcoal black for shading. A variation of blue paint, a pale blue-green, was created by incorporating yellow ocher and red iron oxide with Prussian blue, white lead, and calcium carbonate. 257

Greens
An early layer of gray blue green was found at the interior of the Dey Mansion. As previously stated, this corresponds with Welsh’s finding that green paints are the most varied of all colonial

255 Ibid., 77.
256 Ibid., 78.
257 Ibid., 77-78
paint colors. Green paints were made with a variety of pigments including white lead, calcium carbonate, Prussian blue, verdigris, lampblack, yellow ochre, and red iron oxide.258

**Moderate reddish browns**
Moderate reddish browns were found on a very limited basis in those Dutch-American Stone Houses studied in colonial Bergen County, with only one interior and exterior example, both of which were from architectural remnants from the Isaac Naugle House. Reddish brown paint, often referred to as Spanish Brown, was used as both a primer and finish coat throughout colonial America. Spanish Brown was used on the exterior trim of Independence Hall for the first twenty years of its existence, with additional examples of the paint color being found in Germantown, Pennsylvania and colonial Williamsburg.259

**Black**
Black paint was only exhibited on a very limited basis on the interior of the Dey Mansion, at the first-floor main hall. Welsh explains that the typical use of black paint, black and other dark colors was most often used to hide dirt.260

**Red and reddish orange**
Reddish orange was only found on the interior of a cupboard on the first floor of the Dey Mansion. Welsh described these colors as the “least used of the colonial period,” often only found on cupboard interiors, as is the case with the Dey Mansion.261

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258 Ibid., 75.
259 Ibid., 73.
260 Ibid., 72.
261 Ibid., 70 – 71.
CONCLUSION

At the time the John Naugle, Isaac Naugle, and Westervelt Houses were constructed, each of their builders’ found themselves in the midst of the consumer revolution that had begun in the middle of the eighteenth century. Each resided in an area in which trade networks extending into New York City had been established by the 1730s. Access to these various goods by Bergen County residents increased the ability of each to obtain the pigments, oils, and goods necessary to employ painting in their homes, but also allowed for the purchase of a number of different pigments that became available in this vicinity during the 1730s and 1740s.

As a result of this availability, it is perhaps not surprising that each of these men made the decision to either purchase paint or employ a painter to decorate the interiors of their homes at the time of construction. The overall choice to paint one’s home, as all three men had done, may signal a broader cultural trend for the Dutch in Bergen County during the mid-eighteenth century. However, by this period it appears that the paint color choices show one’s individual tastes and economies more so than as a reflection of the tastes of the Dutch community in colonial Bergen County as a whole.

Although a palette for exterior paint colors could not be established, this thesis has established the presence of a rather limited, and somewhat preliminary, palette of paint colors employed on the interior of Dutch-American Stone Houses in colonial Bergen County from 1740 to 1776. This interior palette primarily includes variations of grays, but also includes the limited use of blue (including a dark blue, possible glazing layer) at the John Naugle House and variations of tan (including yellow, light, and pinkish tan), a black finish, gray blue green, and possible wood
graining layers at the Dey Mansion. The most popular of these colors, gray, was also identified as being widely used in the wider Dutch cultural region, as well as the American colonies.

The popularity of gray is probably due, in part, to the relative cheapness of the pigments needed to produce this color. As identified in Chapter Four, white lead and black pigments, including lampblack, were some of the cheapest pigment colors available during the period. More expensive pigment colors, including blue and green, appear to have been used on a much more limited basis in the Dutch-American Stone Houses of Bergen County during the period of study. As such, the widespread use of variations of gray, as well as the more limited use of several other paint colors, further supports the conclusion that by this period, the residents of Bergen County had moved beyond their purely Dutch cultural origins in terms of paint colors, and had become part of the larger, consumer driven society of colonial America.

**FURTHER AREAS OF STUDY**

The conclusions reached herein can be described as preliminary findings, mainly due to the limited sample size. The findings, however, show the early use of paint in the Dutch-American Stone Houses of Bergen County from 1740 to 1776. Hopefully, this research will be used as a benchmark and stepping stone for the future research of the architectural finishes of this early American building type.

In addition, a greater study should be undertaken to establish a palette of paint colors and design schemes for the larger Dutch cultural region, most notably in the Hudson River Valley of New York. The cursory research undertaken here shows the presence of Netherlandic influences into the 1750s. A further study of Dutch-American houses through the seventeenth century may
uncover paint colors and schemes which are rooted more heavily in Dutch cultural trends than the emerging consumerism of the mid-eighteenth century.
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Hooch, Pieter de. *Cardplayers in a sunlit Room.* Oil on canvas. c. 1658. 77.3 cm x 67.3 cm. Royal Collection Trust.


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APPENDIX I: WESTERVELT HOUSE PAINT STUDY

Westervelt House, Interior Paint Study Samples

HISTORY

The Westervelt House is located at 256 Tenafly Road in Tenafly, New Jersey. The present house was built in three stages from approximately 1745 to 1825. Rosalie Fellows Bailey, in Pre-Revolutionary Dutch Houses and Families, identifies the earliest section of the home as the southern wing, built by Roelof Westervelt circa 1745. The central and largest section of the home, featuring a gambrel roof, was built by Daniel Westervelt, Roelof’s grandson, circa 1798. The northern wing, a one and one half story frame structure was the last addition to the home, completed in 1825 by Peter Westervelt, the son of Daniel. Samples were taken from three architectural elements located in the 1745 section of the home; one was taken from the 1798 section.

FINISH COLOR INVESTIGATION METHODOLOGY

Samples measuring approximately three to five millimeters in diameter were removed from identified areas using a scalpel. Interior paint samples were removed from the 1745 and 1798 sections of the home. In the 1745 section, where a jambless fireplace is still extant, samples were taken from the west wall, including the wood trim of the transom window above the exterior door, the underside of the window sill adjacent to said door, and from the baseboard located along the southern wall. In the 1798 section, a sample was taken from the central hall staircase leading from

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262 Bailey, Pre-Revolutionary, 327 – 328.
the main level to the second floor. The historic fabric still extant within the structure was limited, therefore only a small number of paint samples were taken.

The samples were brought to the laboratory for further examination. To ensure the identification of all historic paint layers, a Leica Zoom 2000 microscope with a Leica 30 WATT Illuminator was used to identify portions of each sample in which the wood substrate was extant. The selected samples were labeled and set in clear casting resin for further microscopic examination. Once the resin had set, each sample was cut using an IsoMetric saw and hand polished using sheets of micromesh with increasing degrees of fineness, from 3,600 to 12,000 grit.

The samples were then examined microscopically using a Bausch and Lomb Stereo Zoom 7 microscope with a 10X – 70X magnification. All identified paint layers were noted on a Paint Chromochronology Sheet using descriptive color names as well as the Munsell standardized color notation system. This was done to document all extant paint layers.

Finally, photomicrographs of each sample were taken using a Nikon Stereo Zoom microscope under magnifications between 10X – 63X under illumination conditions that simulate natural daylight (using a fiber optic illuminator with daylight corrected filters). They were then examined through UV fluorescent light microscopy using a Zeiss Axioskop 40 under 100X magnification, along with Spot Advanced digital imaging software.
INTERIOR PAINT SAMPLE LOCATIONS

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<td>WV-TW-002</td>
<td>Transom Window – Along the west wall, south side of window frame, 1745 Section</td>
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<td>WV-BB-003</td>
<td>Baseboard – Along the south wall, southeast corner, 1745 Section</td>
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<tr>
<td>WV-SR-004</td>
<td>Stair Riser – Central staircase leading from 1st to 2nd floor, 1798 Section</td>
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FLOOR PLAN LOCATIONS

SAMPLE LOCATION PHOTOGRAPHS

WV-TW-002

WV-WT-001

WV-WD-003
**PAINT CHROMOCHRONOLOGY AND PHOTOMICROGRAPHS**

Sample Number: WV-WT-001  
Substrate: Wood

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Simulated Daylight

Sample WV-WT-001  
Ultraviolet Light
Sample Number: WV-TW-002  
Substrate: Wood – Substrate broke off, striations unclear

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Sample WV-TW-002 (Substrate)
Ultraviolet Light

Sample WV-TW-002
Simulated Daylight

Sample WV-TW-002
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<td>Thin</td>
<td></td>
<td>5Y 7/2</td>
</tr>
<tr>
<td>8.</td>
<td>Rose Brown</td>
<td>Thick</td>
<td></td>
<td>10YR 4/2</td>
</tr>
<tr>
<td>9.</td>
<td>Medium Rose Brown</td>
<td>Thick</td>
<td></td>
<td>10YR 6/2</td>
</tr>
<tr>
<td>10.</td>
<td>Olive Green</td>
<td>Thin</td>
<td></td>
<td>10GY 4/1</td>
</tr>
<tr>
<td>11.</td>
<td>Brown Glaze</td>
<td>Very Thin</td>
<td></td>
<td></td>
</tr>
<tr>
<td>12.</td>
<td>Medium Tan</td>
<td>Thin</td>
<td></td>
<td>7.5YR 7/4</td>
</tr>
<tr>
<td>13.</td>
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<td></td>
</tr>
<tr>
<td>14.</td>
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<td>Thin</td>
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<td>10GY 4/2</td>
</tr>
<tr>
<td>15.</td>
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<td></td>
</tr>
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<td>16.</td>
<td>Greenish Blue</td>
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<td>10BG 6/6</td>
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<tr>
<td>17.</td>
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<td></td>
</tr>
<tr>
<td>18.</td>
<td>White</td>
<td>Medium</td>
<td></td>
<td>5BG 9/1</td>
</tr>
<tr>
<td>19.</td>
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<td>10B 6/1</td>
</tr>
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<td>Very Thin</td>
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<td></td>
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<td>21.</td>
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<td>5Y 9/2</td>
</tr>
<tr>
<td>22.</td>
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<td>10R 3/10</td>
</tr>
<tr>
<td>23.</td>
<td>Yellow</td>
<td>Thick</td>
<td></td>
<td>2.5Y 8.5/6</td>
</tr>
<tr>
<td>24.</td>
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<td></td>
<td>10R 3/10</td>
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<tr>
<td>25.</td>
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<td></td>
<td>5Y 9/1</td>
</tr>
<tr>
<td>26.</td>
<td>Tan</td>
<td>Thin</td>
<td></td>
<td>2.5Y 7/4</td>
</tr>
<tr>
<td>27.</td>
<td>Light Gray</td>
<td>Thin</td>
<td></td>
<td>10YR 9/1</td>
</tr>
<tr>
<td>28.</td>
<td>Off White</td>
<td>Thin</td>
<td></td>
<td>10YR 9/2</td>
</tr>
<tr>
<td>29.</td>
<td>White</td>
<td>Very Thick</td>
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<td>White</td>
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<tr>
<td>30.</td>
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<td>Thin</td>
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</table>
Sample WV-BB-003 (Substrate)
Simulated Daylight

Sample WV-BB-003 (Substrate)
Ultraviolet Light

Sample WV-BB-003
Simulated Daylight

Sample WV-BB-003 (1 of 2)
Ultraviolet Light

Sample WV-BB-003 (2 of 2)
Ultraviolet Light
Sample Number: WV-SR-004  
Substrate: Wood  

<table>
<thead>
<tr>
<th>Color</th>
<th>(Thickness)</th>
<th>Coat</th>
<th>Munsell Match</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Dark Brown</td>
<td>Thin</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. Light Green</td>
<td>Medium</td>
<td></td>
<td>10 GY 8/4</td>
</tr>
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</table>

Sample WV-SR-004 Simulated Daylight  
Sample WV-SR-004 Ultraviolet Light
APPENDIX II: JOHN NAUGLE HOUSE PAINT STUDY

John Naugle House, Interior and Exterior Paint Study Samples

HISTORY

The John Naugle House is located at 75 Harvard Street, Closter, New Jersey. The central masonry section of the house was constructed before 1745 by John Naugle and his wife, Elizabeth Blauvelt.263 In addition to this masonry section, a slightly later frame addition was made to the west side of the masonry structure.264 Lastly, there is a post-1936 frame addition to the north side of the masonry structure which presently houses a kitchen.265 All paint samples were taken from the circa 1745 portion of the home.

FINISH COLOR INVESTIGATION METHODOLOGY

Samples measuring approximately three to five millimeters in diameter were removed from identified areas using a scalpel. Interior paint samples were removed from the pre-1745 section of the house, the room into which the main entrance opens. Samples were taken from the west side of the exposed hewn beam closest to the fireplace on the north side and from the north side of the fireplace, adjacent to the hewn beam from which the other interior samples were taken. Exterior samples were taken from the wood trim surround of the front door. Due to the small amount of historic fabric still extant, only a limited number of paint samples were taken.

The samples were brought to the laboratory for further examination. To ensure the identification of all historic paint layers, a Leica Zoom 2000 microscope with a Leica 30 WATT Illuminator was

264 Bailey, 364.
265 The photo of the house Bailey included in her Pre-Revolutionary Houses does not feature this addition, which was seen on a site visit to the home in February and March 2011.
used to identify portions of each sample in which the wood substrate was extant. The selected samples were labeled and set in clear casting resin for further microscopic examination. Once the resin had set, each sample was cut using an IsoMetric saw and hand polished using sheets of micromesh with increasing degrees of fineness, from 3,600 to 12,000 grit.

The samples were then examined microscopically using a Bausch and Lomb Stereo Zoom 7 microscope with a 10X – 70X magnification. All identified paint layers were noted on a Paint Chromochronology Sheet using descriptive color names as well as the Munsell standardized color notation system. This was done to document all extant paint layers.

Finally, photomicrographs of each sample were taken using a Nikon Stereo Zoom microscope under magnifications between 10X – 63X under illumination conditions that simulate natural daylight (using a fiber optic illuminator with daylight corrected filters). They were then examined through UV fluorescent light microscopy using a Zeiss Axioskop 40 under 100X magnification, along with Spot Advanced digital imaging software.
INTERIOR PAINT SAMPLE LOCATIONS

<table>
<thead>
<tr>
<th>Sample #</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>JN-HB-001</td>
<td>Hewn Beam – Bottom of the beam</td>
</tr>
<tr>
<td>JN-HB-002</td>
<td>Hewn Beam – Beading on side of beam adjacent to wall closet</td>
</tr>
<tr>
<td>JN-HB-003</td>
<td>Hewn Beam – Side of beam adjacent to wall closet</td>
</tr>
<tr>
<td>JN-FP-001</td>
<td>Fireplace – Side of fireplace, space between beam and wall closet, lower sample</td>
</tr>
<tr>
<td>JN-FP-002</td>
<td>Fireplace – Side of fireplace, space between beam and wall closet, upper sample</td>
</tr>
</tbody>
</table>

FLOOR PLAN SAMPLE LOCATIONS

SAMPLE LOCATION PHOTOGRAPHS

JN-HB-001

JN-HB-003

JN-HB-002

JN-FP-002

JN-FP-001
EXTERIOR PAINT SAMPLE LOCATIONS

<table>
<thead>
<tr>
<th>Sample #</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>JN-FT-001</td>
<td>Front Door Left Casing – Upper left corner</td>
</tr>
<tr>
<td>JN-FT-002</td>
<td>Front Door Right Casing – Upper right corner</td>
</tr>
<tr>
<td>JN-FT-003</td>
<td>Front Door Left Casing – Lower left corner</td>
</tr>
</tbody>
</table>

FLOOR PLAN SAMPLE LOCATIONS

SAMPLE LOCATION PHOTOGRAPHS

JN-FT-001

JN-FT-002

JN-FT-003
### Paint Chromochronology and Photomicrographs

Sample Number: JN-HB-001  
Substrate: Wood

<table>
<thead>
<tr>
<th>Color</th>
<th>Coat</th>
<th>Munsell Match</th>
</tr>
</thead>
<tbody>
<tr>
<td>Light Blue</td>
<td>Finish</td>
<td>5B 4/4</td>
</tr>
</tbody>
</table>

Sample JN-HB-001  
Simulated Daylight  
Sample JN-HB-001  
Ultraviolet Light
<table>
<thead>
<tr>
<th>Color</th>
<th>(Thickness)</th>
<th>Coat</th>
<th>Munsell Match</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Light Blue</td>
<td>(Medium)</td>
<td></td>
<td>5B 4/4</td>
</tr>
<tr>
<td>2. Off White</td>
<td>(Very Thick)</td>
<td></td>
<td>5Y 9/2</td>
</tr>
<tr>
<td>3. Brown</td>
<td>(Thin)</td>
<td></td>
<td>10R 2/1</td>
</tr>
<tr>
<td>4. White</td>
<td>(Thin)</td>
<td></td>
<td>10YR 9/4</td>
</tr>
<tr>
<td>5. Light Brown</td>
<td>(Medium)</td>
<td></td>
<td>Between 10YR 7/4 &amp; 10YR 8/4</td>
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Sample JN-HB-002
Simulated Daylight
Sample JN-HB-002
Ultraviolet Light
Sample Number: JN-HB-003  
Substrate: Wood

<table>
<thead>
<tr>
<th>Color</th>
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<tbody>
<tr>
<td>Light Blue</td>
<td>Coat</td>
<td>5B 4/4</td>
</tr>
<tr>
<td>Dark Blue</td>
<td>Coat</td>
<td>5B 2/4</td>
</tr>
<tr>
<td>Light Gray</td>
<td>Coat</td>
<td>5Y 6/2</td>
</tr>
<tr>
<td>Brown White</td>
<td>Coat</td>
<td>2.5Y 8.5/4</td>
</tr>
<tr>
<td>Dark Brown</td>
<td>Coat</td>
<td>5YR 2/2</td>
</tr>
<tr>
<td>White</td>
<td>Coat</td>
<td>2.5Y 8.5/4</td>
</tr>
<tr>
<td>Brown</td>
<td>Coat</td>
<td>Dirt</td>
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Sample JN-HB-003  
Simulated Daylight  
Sample JN-HB-003  
Ultraviolet Light
Sample Number: JN-FP-001  
Substrate: Wood

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<th>Munsell Match</th>
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</thead>
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<td>5B 4/4</td>
</tr>
<tr>
<td>2.</td>
<td>Dark Blue (Medium)</td>
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<td>5B 2/4</td>
</tr>
<tr>
<td>3.</td>
<td>Light Gray (Medium)</td>
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<td>5Y 6/2</td>
</tr>
<tr>
<td>4.</td>
<td>Brown White (Thick)</td>
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<td>2.5Y 8.5/4</td>
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<tr>
<td>5.</td>
<td>Medium Brown (Thin)</td>
<td></td>
<td>5YR 2/2</td>
</tr>
<tr>
<td>6.</td>
<td>Very Light Brown (Thin)</td>
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<td>10YR 7/4</td>
</tr>
<tr>
<td>7.</td>
<td>Medium Brown (Thin)</td>
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<td>5YR 2/2</td>
</tr>
<tr>
<td>8.</td>
<td>Brown White (Thick)</td>
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<td>2.5Y 8.5/4</td>
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Sample JN-FP-001  
Simulated Daylight  
Sample JN-FP-001  
Ultraviolet Light
Sample Number: JN-FP-002  
Substrate: Wood

<table>
<thead>
<tr>
<th>Color</th>
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</thead>
<tbody>
<tr>
<td>1. Light Blue</td>
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<td>5B 4/4</td>
</tr>
<tr>
<td>2. Dark Blue</td>
<td>(Medium)</td>
<td></td>
<td>5B 2/4</td>
</tr>
<tr>
<td>3. Light Gray</td>
<td>(Medium)</td>
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<td>5Y 6/2</td>
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Sample JN-FP-002  
Simulated Daylight

Sample JN-FP-002  
Ultraviolet Light
Sample Number: JN-FT-001  
Substrate: Wood

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<th>Munsell Match</th>
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</tr>
<tr>
<td>2. White</td>
<td>(Medium)</td>
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</tr>
<tr>
<td>3. White</td>
<td>(Medium)</td>
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</tr>
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Sample JN-FT-001  
Simulated Daylight  
Sample JN-FT-001  
Ultraviolet Light
Sample Number: JN-FT-002
Substrate: Wood

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<tr>
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<th>Color</th>
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<td>1.</td>
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<td>White</td>
<td>(Medium)</td>
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<td>3.</td>
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Sample JN-FT-002 Simulated Daylight  Sample JN-FT-002 Ultraviolet Light
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<th>Munsell Match</th>
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<tr>
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<td>White</td>
<td>(Medium)</td>
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<td></td>
</tr>
<tr>
<td>2</td>
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<td></td>
</tr>
<tr>
<td>3</td>
<td>White</td>
<td>(Medium)</td>
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Sample JN-FT-003  
Simulated Daylight

Sample JN-FT-003  
Ultraviolet Light
APPENDIX III: ISAAC NAUGLE HOUSE PAINT STUDY

Isaac Naugle House, Interior and Exterior Paint Study Samples

HISTORY

The Isaac Naugle House is located at 80 Hickory Lane in Closter, New Jersey. The earliest portion of the house, the southwest corner of the main house, may have been constructed as early as 1745, appearing as one of three houses owned by Resolvert Nagel on the 1745 survey map of Philip Verplanck.266 Around the time of the American Revolution, Isaac Naugle enlarged the earlier stone structure to its present size with the addition of a gambrel roof.267 Samples were taken from salvaged architectural elements from said home.

FINISH COLOR INVESTIGATION METHODOLOGY

Samples measuring approximately three to five millimeters in diameter were removed from identified areas using a scalpel. Both interior and exterior paint samples were taken from pieces salvaged by Tim Adriance, an Architectural Historian and Historic Restoration Specialist from Bergen County, New Jersey. The pieces are believed to have come from the earliest section of the home, a 20 by 20 foot masonry structure, two walls of which have been incorporated into the larger masonry section as it is seen today. Although the exact location of the baseboard cannot be determined, physical evidence including its size and mullion decorative elements indicate the window sash to be the original which was located next to the structure’s original front door.268

267 Tim Adriance, interview with the author, March 2011.
268 Tim Adriance, interview with the author, March 2011.
Due to the limited amount of historic fabric extant, only a limited number of paint samples were taken.

The samples were brought to the laboratory for further examination. To ensure the identification of all historic paint layers, a Leica Zoom 2000 microscope with a Leica 30 WATT Illuminator was used to identify portions of each sample in which the wood substrate was extant. The selected samples were labeled and set in clear casting resin for further microscopic examination. Once the resin had set, each sample was cut using an IsoMetric saw and hand polished using sheets of micromesh with increasing degrees of fineness, from 3,600 to 12,000 grit.

The samples were then examined microscopically using a Bausch and Lomb Stereo Zoom 7 microscope with a 10X – 70X magnification. All identified paint layers were noted on a Paint Chromochronology Sheet using descriptive color names as well as the Munsell standardized color notation system. This was done to document all extant paint layers.

Finally, photomicrographs of each sample were taken using a Nikon Stereo Zoom microscope under magnifications between 10X – 63X under illumination conditions that simulate natural daylight (using a fiber optic illuminator with daylight corrected filters). They were then examined through UV fluorescent light microscopy using a Zeiss Axioskop 40 under 100X magnification, along with Spot Advanced digital imaging software.
EXTERIOR PAINT SAMPLE LOCATIONS

<table>
<thead>
<tr>
<th>Sample #</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>IN-EX-001</td>
<td>Salvaged Window, Top Sash – Rail</td>
</tr>
<tr>
<td>IN-EX-002</td>
<td>Salvaged Window, Top Sash – Rail</td>
</tr>
<tr>
<td>IN-EX-003</td>
<td>Salvaged Window, Top Sash – Window Putty</td>
</tr>
<tr>
<td>IN-EX-004</td>
<td>Salvaged Window, Top Sash – Stile</td>
</tr>
</tbody>
</table>

FLOOR PLAN LOCATION (WINDOW)

SAMPLE LOCATION PHOTOGRAPHS

Isaac Naugle House, south elevation, looking north.
Courtesy of Tim Adriance.
INTERIOR PAINT SAMPLE LOCATIONS

<table>
<thead>
<tr>
<th>Sample #</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>IN-IN-005</td>
<td>Salvaged Window Sash – Rail</td>
</tr>
<tr>
<td>IN-IN-006</td>
<td>Salvaged Window Sash – Rail</td>
</tr>
<tr>
<td>IN-IN-007</td>
<td>Salvaged Window Sash – Stile</td>
</tr>
<tr>
<td>IN-BB-008</td>
<td>Salvaged Baseboard</td>
</tr>
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</table>

FLOOR PLAN LOCATION (WINDOW)

SAMPLE LOCATION PHOTOGRAPHS
# PAINT CHROMOCHRONOLOGY AND PHOTOMICROGRAPHS

Sample Number: IN-EX-001  
Substrate: Wood

<table>
<thead>
<tr>
<th>Color</th>
<th>(Thickness)</th>
<th>Coat</th>
<th>Munsell Match</th>
</tr>
</thead>
<tbody>
<tr>
<td>Transparent Waxy</td>
<td>Very Thick</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Red Brown</td>
<td>Thin</td>
<td>2.5 YR 2/4</td>
<td></td>
</tr>
<tr>
<td>Yellow White</td>
<td>Medium</td>
<td>Between 2.5 Y 8.5/4 and 2.5 Y 9/4</td>
<td></td>
</tr>
<tr>
<td>Dark Brown</td>
<td>Very Thin</td>
<td>Dirt</td>
<td></td>
</tr>
<tr>
<td>Yellow White</td>
<td>Thin</td>
<td>Between 2.5 Y 8.5/4 and 2.5 Y 9/4</td>
<td></td>
</tr>
<tr>
<td>White</td>
<td>Very Thick</td>
<td>10 Y 9/1</td>
<td></td>
</tr>
<tr>
<td>White</td>
<td>Thick</td>
<td>White</td>
<td></td>
</tr>
<tr>
<td>Very Dark Brown</td>
<td>Thin</td>
<td>Dirt</td>
<td></td>
</tr>
</tbody>
</table>

Sample IN-EX-001  
Simulated Daylight  
Sample IN-EX-001  
Ultraviolet Light

![Sample IN-EX-001 Simulated Daylight](image1)
![Sample IN-EX-001 Ultraviolet Light](image2)
Sample Number: IN-EX-002
Substrate: Wood

<table>
<thead>
<tr>
<th>Color</th>
<th>(Thickness)</th>
<th>Coat</th>
<th>Munsell Match</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Transparent Waxy</td>
<td>Very Thick</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. Red Brow</td>
<td>Thin</td>
<td></td>
<td>2.5 YR 2/4</td>
</tr>
<tr>
<td>3. Yellow white</td>
<td>Medium</td>
<td></td>
<td>Between 2.5 Y 8.5/4 and 2.5 Y 9/4</td>
</tr>
<tr>
<td>4. Dark Brown</td>
<td>Very Thin</td>
<td>Dirt</td>
<td></td>
</tr>
<tr>
<td>5. Yellow white</td>
<td>Thin</td>
<td></td>
<td>Between 2.5 Y 8.5/4 and 2.5 Y 9/4</td>
</tr>
<tr>
<td>6. White</td>
<td>Very Thick</td>
<td></td>
<td>10 Y 9/1</td>
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<tr>
<td>7. White</td>
<td>Medium</td>
<td>White</td>
<td></td>
</tr>
<tr>
<td>8. Dark Brown</td>
<td>Thin</td>
<td>Dirt</td>
<td></td>
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</tbody>
</table>

Sample IN-EX-002
Simulated Daylight
Sample IN-EX-002
Ultraviolet Light

Sample IN-EX-002
Simulated Daylight
Sample IN-EX-002
Ultraviolet Light
Sample Number: IN-EX-003
Substrate: Window Putty

<table>
<thead>
<tr>
<th>Color</th>
<th>Thickness</th>
<th>Coat</th>
<th>Munsell Match</th>
</tr>
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<tbody>
<tr>
<td>1. Transparent Waxy</td>
<td>Very Thick</td>
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<td></td>
</tr>
<tr>
<td>2. Red Brown</td>
<td>Thin</td>
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<td>2.5 YR 2/4</td>
</tr>
<tr>
<td>3. Yellow White</td>
<td>Medium</td>
<td></td>
<td>Between 2.5 Y 8.5/4 and 2.5 Y 9/4</td>
</tr>
<tr>
<td>4. Dark Brown</td>
<td>Very Thin</td>
<td>Dirt</td>
<td></td>
</tr>
<tr>
<td>5. Yellow White</td>
<td>Thin</td>
<td></td>
<td>Between 2.5 Y 8.5/4 and 2.5 Y 9/4</td>
</tr>
<tr>
<td>6. White</td>
<td>Very Thick</td>
<td></td>
<td>10 Y 9/1</td>
</tr>
<tr>
<td>7. White</td>
<td>Thick</td>
<td>White</td>
<td></td>
</tr>
<tr>
<td>8. Very Dark Brown</td>
<td>Thin</td>
<td>Dirt</td>
<td></td>
</tr>
</tbody>
</table>

Sample IN-EX-003
Simulated Daylight

Sample IN-EX-003
Ultraviolet Light

Sample IN-EX-003
Simulated Daylight

Sample IN-EX-003
Ultraviolet Light
Sample Number: IN-EX-004
Substrate: Wood

<table>
<thead>
<tr>
<th></th>
<th>Color</th>
<th>(Thickness)</th>
<th>Coat</th>
<th>Munsell Match</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Transparent Waxy</td>
<td>Very Thick</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2</td>
<td>Red Brown</td>
<td>Thin</td>
<td></td>
<td>2.5 YR 2/4</td>
</tr>
<tr>
<td>3</td>
<td>Yellow White</td>
<td>Medium</td>
<td></td>
<td>Between 2.5 Y 8.5/4 and 2.5 Y 9/4</td>
</tr>
<tr>
<td>4</td>
<td>Dark Brown</td>
<td>Very Thin</td>
<td>Dirt</td>
<td></td>
</tr>
<tr>
<td>5</td>
<td>Yellow White</td>
<td>Thin</td>
<td></td>
<td>Between 2.5 Y 8.5/4 and 2.5 Y 9/4</td>
</tr>
<tr>
<td>6</td>
<td>White</td>
<td>Very Thick</td>
<td></td>
<td>10 Y 9/1</td>
</tr>
<tr>
<td>7</td>
<td>White</td>
<td>Thick</td>
<td></td>
<td>White</td>
</tr>
<tr>
<td>8</td>
<td>Very Dark Brown</td>
<td>Thin</td>
<td>Dirt</td>
<td></td>
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</table>

Sample IN-EX-004
Simulated Daylight

Sample IN-EX-004
Ultraviolet Light
Sample Number: IN-IN-005
Substrate: Wood

<table>
<thead>
<tr>
<th>No.</th>
<th>Color</th>
<th>Thickness</th>
<th>Coat</th>
<th>Munsell Match</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>Light Gray</td>
<td>Medium</td>
<td></td>
<td>5Y 6/2</td>
</tr>
<tr>
<td>2.</td>
<td>Light Gray</td>
<td>Thin</td>
<td></td>
<td>5Y 7/2</td>
</tr>
<tr>
<td>3.</td>
<td>Medium Gray</td>
<td>Medium</td>
<td></td>
<td>2.5Y 5/2</td>
</tr>
<tr>
<td>4.</td>
<td>Off white</td>
<td>Thin</td>
<td></td>
<td>2.5Y 9/4</td>
</tr>
<tr>
<td>5.</td>
<td>Light Yellow</td>
<td>Thin</td>
<td></td>
<td>2.5Y 8.5/4</td>
</tr>
<tr>
<td>6.</td>
<td>Brown</td>
<td>Very Thin</td>
<td>Dirt</td>
<td></td>
</tr>
<tr>
<td>7.</td>
<td>Tan</td>
<td></td>
<td></td>
<td>5Y 7/2</td>
</tr>
<tr>
<td>8.</td>
<td>Off white</td>
<td></td>
<td></td>
<td>5Y 8.5/2</td>
</tr>
<tr>
<td>9.</td>
<td>Dark Brown</td>
<td>Very Thin</td>
<td>Dirt</td>
<td></td>
</tr>
<tr>
<td>10.</td>
<td>Off white</td>
<td>Medium</td>
<td></td>
<td>5Y 8.5/2</td>
</tr>
<tr>
<td>11.</td>
<td>Light Yellow</td>
<td>Thin</td>
<td></td>
<td>5Y 7/2</td>
</tr>
<tr>
<td>12.</td>
<td>Light Yellow</td>
<td>Thin</td>
<td></td>
<td>2.5Y 7/4</td>
</tr>
<tr>
<td>13.</td>
<td>Dark Brown</td>
<td>Very Thin</td>
<td>Dirt</td>
<td></td>
</tr>
<tr>
<td>14.</td>
<td>Off white</td>
<td>Medium</td>
<td></td>
<td>5Y 8.5/1</td>
</tr>
<tr>
<td>15.</td>
<td>Dark Brown</td>
<td>Very Thin</td>
<td>Dirt</td>
<td></td>
</tr>
<tr>
<td>16.</td>
<td>Off white</td>
<td>Thin</td>
<td></td>
<td>5Y 8.5/1</td>
</tr>
<tr>
<td>17.</td>
<td>White</td>
<td>Thin</td>
<td></td>
<td>5Y 9/2</td>
</tr>
</tbody>
</table>
Sample IN-IN-005
Simulated Daylight

Sample IN-IN-005
Ultraviolet Light
Sample Number: IN-IN-006
Substrate: Wood

<table>
<thead>
<tr>
<th>Color</th>
<th>(Thickness)</th>
<th>Coat</th>
<th>Munsell Match</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Light Gray</td>
<td>Medium</td>
<td></td>
<td>5Y 6/2</td>
</tr>
<tr>
<td>2. Light Gray</td>
<td>Thin</td>
<td></td>
<td>5Y 7/2</td>
</tr>
<tr>
<td>3. Medium Gray</td>
<td>Medium</td>
<td></td>
<td>2.5Y 5/2</td>
</tr>
<tr>
<td>4. Off white</td>
<td>Thin</td>
<td></td>
<td>2.5 Y 9/4</td>
</tr>
<tr>
<td>5. Light Yellow</td>
<td>Thin</td>
<td></td>
<td>2.5Y 8.5/4</td>
</tr>
<tr>
<td>6. Tan</td>
<td>Thin</td>
<td></td>
<td>5Y 7/2</td>
</tr>
<tr>
<td>7. Off white</td>
<td>Thin</td>
<td></td>
<td>5Y 8.5/2</td>
</tr>
<tr>
<td>8. Brown</td>
<td>Very Thin</td>
<td>Dirt</td>
<td></td>
</tr>
<tr>
<td>9. Off white</td>
<td>Medium</td>
<td></td>
<td>5Y 8.5/2</td>
</tr>
<tr>
<td>10. Light Yellow</td>
<td>Medium</td>
<td></td>
<td>5Y 7/2</td>
</tr>
<tr>
<td>11. Brown</td>
<td>Very Thin</td>
<td>Dirt</td>
<td></td>
</tr>
<tr>
<td>12. Light Yellow</td>
<td>Medium</td>
<td></td>
<td>2.5Y 7/4</td>
</tr>
<tr>
<td>13. Brown</td>
<td>Very Thin</td>
<td>Dirt</td>
<td></td>
</tr>
<tr>
<td>14. Off white</td>
<td>Medium</td>
<td></td>
<td>5Y 8.5/1</td>
</tr>
<tr>
<td>15. Brown</td>
<td>Very Thin</td>
<td>Dirt</td>
<td></td>
</tr>
<tr>
<td>16. Off White</td>
<td>Thin</td>
<td></td>
<td>5Y 8.5/1</td>
</tr>
<tr>
<td>17. White</td>
<td>Thick</td>
<td></td>
<td>5Y 9/2</td>
</tr>
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</table>
Sample IN-IN-006
Simulated Daylight

Sample IN-IN-006
Ultraviolet Light
Sample Number: IN-IN-007
Substrate: Wood

<table>
<thead>
<tr>
<th>Color (Thickness)</th>
<th>Coat</th>
<th>Munsell Match</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Light Gray Medium</td>
<td>5Y 6/2</td>
<td></td>
</tr>
<tr>
<td>2. Light Gray Very Thin</td>
<td>5Y 7/2</td>
<td></td>
</tr>
<tr>
<td>3. Medium Gray Medium</td>
<td>2.5Y 5/2</td>
<td></td>
</tr>
<tr>
<td>4. Off white Thin</td>
<td>2.5Y 9/2</td>
<td></td>
</tr>
<tr>
<td>5. Light Yellow Medium</td>
<td>2.5Y 8.5/4</td>
<td></td>
</tr>
</tbody>
</table>

Sample IN-IN-007
Simulated Daylight

Sample IN-IN-007
Ultraviolet Light

Sample Number: IN-BB-008
Substrate: Wood

<table>
<thead>
<tr>
<th>Color (Thickness)</th>
<th>Coat</th>
<th>Munsell Match</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Red Brown</td>
<td></td>
<td>10R 2/4</td>
</tr>
</tbody>
</table>

Sample IN-BB-008
Simulated Daylight

Sample IN-BB-008
Ultraviolet Light