INTRODUCTION

The Aesthetic Guidelines for Campus Development supplement the Facilities Master Plan 2001-2020 (FMP) by providing information regarding process, evaluation, and direction implied in the plan as well as recommendations for its implementation. These guidelines are segregated into sections covering the entire University of Maryland College Park (UMCP) Campus and each of the nine districts or neighborhoods into which it is subdivided. Topics are addressed verbally and graphically to assist University administrators, faculty and staff in discerning issues and formulating decisions in cooperation with colleagues and collaborators in local, state and regional governmental and professional organizations. Details and specifications of materials, means and methods to implement the guidelines are included in a separate volume entitled: Design Criteria / Facilities Standards Manual. Preservation issues are addressed in the Nomination of the University of Maryland at College Park to the National Register of Historic Places, 1991.

AESTHETIC GUIDELINES FOR CAMPUS DEVELOPMENT

In 10 volumes:
- Campus
  - East District
  - Golf Course District
  - Historic Core District
  - North District
  - Northeast District
  - Northwest District
  - Outlying Properties
  - Southwest District
  - West District

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SUMMARY

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- Analytical Campus Diagrams
- Architectural Periods & Principles
- Credits
OVERVIEW

The Campus section of these guidelines provides the context for considering general campus development and modification: description of the University’s physical and historical character supplemented by FMP obligations, goals and objectives. The exterior physical environment is examined in three areas: plantings and extra-building features in Landscape Architecture, structures in Architecture, and the interface and space-creation formed by the union of landscape and building in Urban Design. Specific articles delve into campus-wide issues, define situations, and propose unified strategies/solutions. The physical character of the campus and individual buildings are investigated in greater depth related to individual conditions in the District documents.

DIRECTIVE: AUTUMN, 1995

The Architectural Design Standards Board (ADSB) is charged to develop exterior architectural design guidelines and standards and to assist in development of a UMCP Architectural Review Board (ARB). The ADSB also would be charged to improve the aesthetic quality and design coherence for the Campus as well as to review and approve external design of new facilities and renovation projects until the ARB is established. The ADSB would meet as needed and would report to the Cabinet through the Vice President for Administrative Affairs.

RESPONSIBILITIES:

a. To develop and review architectural design guidelines
b. To develop and review building (exterior) standards
c. To work in concert with major building committees and review the exterior appearance of construction / renovation projects
d. To seek guidance and comment from Long-range Facilities Planning Committee (LFPC) and provide recommendations to the Cabinet
e. To work with the State of Maryland to create the UMCP Architectural Review Board and establish its membership to replace the role currently performed by the State Architectural Review Board.

GOALS & OBJECTIVES

These Aesthetic Guidelines for Campus Development:

- articulate the principles embodied in the Facilities Master Plan 2001-2020 and establish a policy and visioning instrument for Campus decision-makers at all levels
- examine and express how the UMCP community views ourselves and our relationship with the region and State
  - what are our values and how are they promoted?
  - what is our understanding of the various components that comprise the UMCP community and how they inter-relate?
  - how do the myths, traditions and heritage of UMCP shape our views and affect our future: how do we balance preservation and change?
  - how can we engage in fruitful dialogue to facilitate positive and desired change?
- codify and clarify standards of appropriate project response which enable entities outside of the UMCP community to participate with us in framing the proposed growth of the Campus
- identify important issues and concerns on project, district and campus-wide levels and assist in the constituent review process
- contribute to the efficient and effective stewardship of Campus resources in the natural and built environment
- advance and improve the quality of routine maintenance and repairs in light of proposed Campus development
The University fulfills a State mandate by preparing a Facilities Master Plan for the College Park facility every ten years, and updating it at mid-term. The current Board of Regents-approved plan builds upon the 1991 plan and the 1996 update (Fig. C-2e) and is divided into three phases: 2001-2005, 2006-2010, and 2011-2020 (Fig. C-2a-d). The FMP covers both Landscape Architectural and Architectural modifications to the Campus during each of these phases; implementation will be adjusted by the availability of capital expenditures during each phase.

As addressed in the Plan’s Executive Summary, the FMP has four principles or goals:

1) to plan the built and natural environment in a way that preserves the beauty of the Campus and protects the environment
d2) to reduce the number of automobiles on Campus and eliminate vehicular congestion to the extent possible while promoting unimpeded movement across Campus

3) to reinforce the Campus’ role as a good neighbor in the larger community by the careful development of sites on the Campus periphery or in outlying areas that link us to the community, and
4) to preserve the architectural heritage of the Campus and enhance it through open spaces, gathering places, vistas of green lawns and trees, and groupings of buildings that promote a sense of community.

The Facilities Master Plan lays the foundation for a first-class physical campus appropriate for a world-class university through thoughtful stewardship of both the built and natural environment. The FMP supports the University’s mission:

1) to provide educational programs of the highest quality
2) to produce cutting-edge research, scholarship, and performing arts, and
3) to promote connections and partnerships that contribute to the economic and social well-being of the citizenry of Maryland.

These design guidelines are intended to expound upon the FMP and elucidate the rationale behind decisions indicated on the Plan. Additionally, they provide guidance for the implementation of the various Campus projects and enable the designer to adapt to existing and proposed conditions which impact the site.

ARTICLE FORMAT

These Aesthetic Guidelines for Campus Development are organized into a series of articles or sections discussing a variety of topics in a consistent manner. The topic is introduced and described, and the significance of each topic is stated. Terms and Common Themes are defined, and Issues, Proposals and Remedies are identified. Each section or article is concluded with a generalized Summary.

In the District sections, the boundaries, adjacent major features, and an overview of building use typologies are included in the description discussion. The Urban Design, Landscape Architecture and Architecture sub-sections speak to specific elements of the District. Spaces, features and buildings are catalogued in a system developed from the US Secretary of the Interior’s Guidelines for Historic Preservation. Items are segregated into those which contribute to the quality or historic understanding of the district in an actual, symbolic, or iconic manner and those which do not. The Contributing category is sub-divided into:

- Significant: seminal places or objects which are historic remnants of previous conditions (some no longer extant), or that create or define a district, or possess major landmark features, or without which, the memorable image of the Campus would be substantially altered
- Important: less valuable or fundamental elements than those in the significant category, which contributes in a major way to the quality of the district

The Non-Contributing category includes those places or objects that either fail to add to or actually detract from the understanding of an area:

- Neutral: elements that neither add to or detract from the surroundings, and are without major historic merit
- Unsympathetic: features that are not in keeping with the remainder of the area and do not contribute to the urban, landscape architectural or architectural dialogue / understanding of the Campus.
THE CAMPUS

PROLOGUE

Flagship of Maryland’s 11-institution system of higher education (fig. c-3a), the University of Maryland College Park is the most comprehensive institution of higher education, research, and service in the state. The University offers 98 undergraduate majors, 87 master’s programs and 68 doctoral programs in 13 colleges and schools. It aspires to be one of the finest public universities in the Nation.

The campus is located on 1,500 rolling acres within the City of College Park municipal boundaries, and is strategically located in the thriving Washington-Baltimore corridor, one of the most prosperous and fast-growing technological areas in the United States (fig. c-3b). Nine miles from Washington, DC, forty minutes from Baltimore’s industrial and trade center, and thirty minutes from Annapolis, the state capital, the UMC campus community enjoys close liaisons between government, business and industry which enrich the student experience through applied research, internships, and career opportunities.

College Park (incorporated in 1890), a suburban college town with a diverse population of 24,000 short-term and long-term residents, completely encircles the Campus. Commercial areas line Baltimore Avenue / US Route 1 north and south of the Campus; the remainder of the City is primarily residential (fig. c-3c). UMCP has a daytime population approaching 55,000 (24,500 undergraduate and 8,500 graduate students, 22,000 faculty and staff) and a student on-campus resident population of 8,000. The University and the City of College Park regularly communicate and co-operate on mutual issues, problems and opportunities as one community.

UMCP maintains over 350 buildings and structures to serve its mission. Colonial Revival buildings grace the inner core of the Campus, while a collection of contemporary-style structures accent the perimeter. Campus life is enhanced by the Mall, plazas, walkways, and courtyards which connect academic buildings and residence halls; restricted public access provides a secure, attractive environment for the city-sized population of students, faculty and staff.

BOUNDARIES / SURROUNDINGS

The central portion of the University of Maryland College Park is bounded by University Boulevard / Maryland Route 193 on the northwest, Paint Branch Creek and Baltimore Avenue / US Route 1 on the east, and the sinuous Knox Road - Mowatt Lane - Campus Drive connection on the south (fig. c-3d). The University of Maryland University College, an independent continuing education institution and part of the University System of Maryland, is located adjacent to the Campus at the intersection of Adelphi Road and University Boulevard. Major adjacent additional parcels include the Golf Course, Metzerott Corridor, and East districts. The GOLF COURSE DISTRICT, bounded by Metzerott Road on the north, University Boulevard on the east, and Adelphi Road on the south and west, includes the National Archives II and University Grounds Maintenance facilities in addition to the Golf Course. The headquarters for the University System of Maryland is located across Metzerott Road from the Archives. The METZEROTT CORRIDOR property is located north of Metzerott Road at the intersection of University Boulevard and is bounded by the Beltsville Agricultural Research Center (BARC) / US Department of Agriculture property on the north, Paint Branch Creek on the east, University Boulevard and Metzerott Road on the south, and the City of College Park District 4 on the west. The EAST DISTRICT stretches from US Route 1 to Paint Branch Parkway on the north and east, and to the City of College Park on the south. Smaller properties are described in the OUTLYING PROPERTIES DISTRICT section of these Guidelines.

DISTRICTS

The natural terrain and regional road system partitions the central UMCPC Campus into eight districts or neighborhoods (fig. c-3d, -4a). At the heart of Campus, the HISTORIC CORE DISTRICT is organized by a series of ridges and valleys containing the oldest structures forming landscaped fields and quadrangles. The University originated here, and spent the majority of its first century confined to this area. Expansion to the north commenced with the construction of Byrd Stadium and the Campus Farm during the 1930s; recreational, residential and academic structures have extended the NORTHWEST and NORTHWEST districts to Campus and Paint Branch Creek.
The College Park campus of the University of Maryland is located just east of the fall line, in the westernmost portion of the Coastal Plain province. The gently rolling landscapes are underlain by unconsolidated sediments deposited during the early portion of the Cretaceous period, which extended from approximately 65 to 140 M years ago, and are the oldest sediments of the Coastal Plain. These Cretaceous materials were probably derived from highly weathered soils eroded from the Piedmont and the Blue Ridge provinces to the west, and subsequently deposited under fluviodeltaic environments. The primary formations include the Patuxent formation which is dominated by brown and light colored sands, and the Arundel formation which is comprised mainly of dark red and variagated red and gray clays. Although the geological materials were deposited during the Cretaceous period, the landscapes and soils (though difficult to date) are much younger – probably on the order of tens to hundreds of thousands of years old. Soils formed in the parent sediments of the Patuxent formation include the Sassafras, Sunnyside, and associated soil series. These are strongly developed sandy and loamy soils which have subsoils enriched with iron oxides and clay. In areas underlain by the Arundel formation, Christiana, Keyport and associated soil series are mapped. These also are strongly developed soils but are much higher in clay throughout the profile. Only along the flood plain areas of the Paint Branch creek and its tributaries, are found relatively weakly developed soils of the Codorus and associated series. Many of the soils in the vicinity of the campus have impeded internal drainage and seasonally high water tables perched on slowly permeable subsoll horizons or strata (fig. c-4a).

Baltimore College of Dental Surgery, the first dental school in America, became a part of the University in 1840, awarding the first Doctor of Dental Surgery (D.D.S.) Degree in 1841. The School of Law, founded by the renowned David Hoffman in 1823 as the first university law school in the US and restored in 1869, and the Nurses Training School, begun in 1889, round out Maryland's original professional degree programs.

Turnpike roads were the nation's first highways, serving travelers in horse-drawn carriages. In 1813, the first turnpike company in Maryland was chartered to construct a route between Baltimore and Washington. Travelers along the corridor were served by inns and road houses, of which, the Rossborough Inn, built in 1804, was the first stage stop after leaving Washington. Today, Rossborough Inn is the University of Maryland Faculty/Alumni Club (fig. c-10g).
The State of Maryland chartered the Maryland Agricultural College in 1856 “in which the youthful student could especially be instructed in those arts and sciences indispensable to successful agricultural pursuits”, in other words, a practical education for the sons of farmers. In addition to spending one hour each day hoeing or plowing on the college farm, students took a broad range of courses in ancient and modern languages, English, natural sciences, and mathematics, and received military instruction.

The original site of the College consisted of 428 acres and was part of the Rossborough Farms (fig. c-6e), then owned by Charles Benedict Calvert, (his wife Charlotte, and his brother George H. and Elizabeth Calvert), a prime mover in planning and securing the college. The Morrill Land Grant College Act of 1862, and sale of nearly half the original tract in 1864 (205 acres which have since become the business district of College Park), enabled the College to be resurrected following the Civil War, growth throughout the late-half of the 19th Century was slow but steady, and reflected changes in programs and the mission of the institution. The Experimental Station for the study of agricultural processes and the Extension Service were developed during this period.

In 1920 the state legislature combined the College Park institution with the professional schools in Baltimore to form an expanded University of Maryland. The University System of Maryland was created in 1973 (fig. c-3a); this entity eventually grew to include campuses in Baltimore County, on the Eastern Shore and the Panhandle. The System also has a worldwide component: University of Maryland University College, a continuing education institution introduced in 1947 which is sited adjacent to the western border of the Campus.

Note: Data for this section was gleaned from a variety of sources: primary information derives from George H. Callcott’s, A History of the University of Maryland, Maryland Historical Society, 1966.
Throughout the past century and a half, the University of Maryland College Park (UMCP) has grown from a small cluster of buildings atop a low knoll to a diverse and widespread community of nearly 50,000 people (fig. c-3c). Located on farmland originally owned by Charles Benedict Calvert, and situated astride Baltimore Avenue / US Route 1, the Campus has developed into a town comprised of academic, administrative, public, recreational, residential, and utility facilities. Buildings, predominantly multi-story red brick with gray pitched roofs emanating from the Colonial Revival style adopted during the 1920's, have been sited according to a variety of Landscape Architectural traditions. The result is a Campus that generally feels park-like, where neither buildings nor landscape predominate.

Portions of the Campus were developed following a plurality of Urban Planning theories. Spaces range from intimately-scaled landscape-focused quadrangles (Washington, Calvert) to the expansive lawns of McKeldin Mall, to building-centered complexes (Cambridge, Denton & Ellicott communities) to the downtown-like urbanity of the Engineering and Science schools (figs. x through x). Parking lots litter the Campus, and attest to its development as a post-WWII commuter school: they are scheduled to be replaced as part of the FACILITIES MASTER PLAN 2000-2020 (FMP).

Some places are iconic, time-enhanced and meaningful and fulfill their design mandates: they should be sustained. Others should be modified to improve their character.

The urban environment is composed of both architectural and landscape architectural elements, and these are discussed in detail in sections relating to both subjects as well as those dedicated to the individual Districts into which these guidelines are divided. This URBAN DESIGN section addresses campus / urban planning issues involving and uniting landscape and environmental elements and buildings, and focuses on space creation and place making.
**URBAN DESIGN MODELS**

Kevin Lynch, in *The Image of the City*, proposes three historic urban models: Cosmic (expressing symbolic theory, either spiritual or governmental), Practical (based on functional considerations, usually gridded) and Organic (following natural forms, as does an organism). An additional model, proposed by X in X, developed during the Twentieth Century and is based on the automobile: flexibility and distance traveled by car are far greater than by foot or other vehicles and encourage the separation of community elements. Organization of structures within the urban fabric can be as individual units or concentrated / interconnected. Examples are illustrated in figs. c-7a through 7p:

<table>
<thead>
<tr>
<th>Model</th>
<th>INDIVIDUAL</th>
<th>CONCENTRATED</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cosmic (symbolic)</td>
<td>Beijing, China (Central sector)</td>
<td>Williamsburg, Va</td>
</tr>
<tr>
<td></td>
<td>Annapolis, Md</td>
<td>Washington, DC</td>
</tr>
<tr>
<td></td>
<td>Leptis Major, Africa</td>
<td></td>
</tr>
<tr>
<td>Practical (functional)</td>
<td>Philadelphia, Pa (original plan)</td>
<td>Cascina, Italy</td>
</tr>
<tr>
<td></td>
<td>Savannah, Ga (original plan)</td>
<td>New York City, NY</td>
</tr>
<tr>
<td></td>
<td>Chicago, Il</td>
<td>Alexandria, Va</td>
</tr>
<tr>
<td></td>
<td>San Agostin, Fl</td>
<td></td>
</tr>
<tr>
<td>Organic (natural)</td>
<td>Delphi, Greece</td>
<td>Coreglia, Italy</td>
</tr>
<tr>
<td></td>
<td>New Orleans, Lo</td>
<td>Venice or Siena, Italy</td>
</tr>
<tr>
<td></td>
<td>London, England</td>
<td>Los Angeles, Ca</td>
</tr>
<tr>
<td></td>
<td>London, England</td>
<td>Venice or Siena, Italy</td>
</tr>
<tr>
<td>AUTOMOBILE</td>
<td>Columbia, Md</td>
<td>Houston, Tx</td>
</tr>
<tr>
<td></td>
<td>Reston, Va</td>
<td>Reston, Va</td>
</tr>
</tbody>
</table>

Examples illustrated include:
- Cosmic: Forbidden City, Beijing, China
- Practical: Savannah, Ga (original plan), New York City, NY, Chicago, Il, Alexandria, Va, San Agostin, Fl
- Organic: Coreglia, Italy, Venice or Siena, Italy
- Automobile: Columbia, Md, Reston, Va, Houston, Tx, Reston, Va

*Figures c-7a through 7p:*

- c-7a: Cosmic individual - Forbidden City, Beijing, China
- c-7b: Practical individual - Savanna, Ga (original plan)
- c-7c: Organic individual - Coreglia, Italy
- c-7d: Cosmic concentrated - Proposed West Mall
- c-7e: Organic concentrated - Proposed West Mall
- c-7f: Practical concentrated - East District Housing
- c-7g: Organic concentrated - TDOZ Plan by ASG
- c-7h: Practical concentrated - East District Housing
- c-7i: Cosmic individual - Columbia, Maryland
- c-7j: Organic individual - East District at Parkway
- c-7k: Practical individual - East District
- c-7l: Place Creation - Campus Luigi, Rome, Italy
- c-7m: Organic concentrated - Coreglia, Italy
- c-7n: Practical concentrated - Cascina, Italy
- c-7o: Organic individual - East District at Parkway
- c-7p: Cosmic concentrated - Proposed West Mall

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*aesthetic guidelines for campus development*
Boundary: Any three points inscribe an area, lines connecting these form boundaries, which can be extrapolated into edges (fig. c-10g).

Edge / Entry: In addition to the amorphous, universal condition, both landscape and buildings have the capacity to describe area or define place. The perception of edge, which both forms the space and lines it, is fundamental to discerning one area from another, and range from transparent to opaque. Passage through an edge affords entry, and can be restricted or open (figs. c-9, 10a,c).

District: A readily comprehensible area, discernable by unifying features such as common function, materials, style, location (acropolis, island), or by separation from adjacent homogeneous items (figs. c-8j,o).

Place making: Whether appearing to be sculpted (carved out of surrounding fabric) or fabricated (agglomeration of elements to create a whole), “place” is more than a resultant or remnant. Skillfully designed and detailed space elicits an array of emotions, supports a variety of activities, and contributes to the well-being of those who occupy it.

Inter-relationships: As with humans, spaces, and the elements of which they are comprised, are inter-related. An edge of a space may be part of the fabric of the structure or plantings forming the edge. Landmarks can form the end-point of an axis or be part of an edge (figs. c-8d,h,l,p,q).

Orientation / Way-finding: The ability, through use of auditory, tactile, olfactory, graphic and other visual clues, to discern the direction and distance required to traverse a space and attain one’s destination. Landmarks and other structures, spatial qualities, signage, and solar / lunar orientation add to the discernment process (fig. 10d).

Common Themes

• Place making
• Inter-relationships
• Orientation / Way-finding

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- **Movement, Path, and Traffic**: Repetitive traversal of space tends to develop and follow certain common ways, based on ease of use, familiarity, and proximity. Movement, frequency, and quantity equal traffic, subdivided on the Campus into pedestrian (including portage of objects or persons by foot, wheelchair, or human-powered machines, such as dollies or scooters) and vehicular (bicycle, auto, public conveyance). Emergency and delivery vehicles contribute regularly but less frequently to congestion on-campus. Development of additional or expanded circulation options is discussed in the Transportation article.

- **Scale**: Height, perimeter, size, and materials are among the available elements that contribute to the perception of space and the relation of places and buildings to each other. Inappropriate choices adversely affect the community and the environment, and should be carefully avoided (fig. 24).

- **Urban Models**: There is a plurality of Urban Models on the campus. The historic portion of the Campus, North Hill, and the NORTH, NORTHWEST AND SOUTHWEST districts are primarily organized along the Individual Cosmic model: separate building units arranged hierarchically around rectangular open spaces. The NORTHEAST DISTRICT evidences the Concentrated Practical model, similar to a downtown urban area. Proposed projects in the EAST and WEST districts will develop into the form of the Concentrated Cosmic model (fig. 9a). Structures of the OUTLYING PROPERTIES should relate to immediate conditions while expressing affinity to the Campus. Variety, a part of the human condition, adds vitality to the campus environment, and should be encouraged.

- **Precedents**: The pre-WWII Campus evidences mixed-use of facilities (figs. c-21b, f, g); after the war, development segregated buildings into regions based upon use: residential complexes along North Hill, the Engineering and Science Schools in the NORTH EAST DISTRICT, for example (fig. c-20). The FMP proposes additions to the campus fabric that will serve to interconnect separated functions and improve the sense of continuous habitation of the entire Campus.

- **Place creation, enhancement, and completion**: The proposed development of the Southwestern and Western quadrangles and the expansion of the NORTHEAST and NORTH districts offer many opportunities to add to the quality and variety of the Campus urban condition. Even in the HISTORIC CORE, there are gaps in the urban fabric whose completion would improve both local conditions and the whole Campus.
Expression of Campus boundaries / edges: Currently, the Campus edge is ill-defined, especially along the Campus Drive-Mowatt Lane-Knox Road southern border, University Boulevard, and the roadways surrounding the East and Golf Course districts (fig. c-14a). The streetscapes are abysmal, neither the landscape nor the buildings create a consistent edge and there is no perceptible security framework. There is little relationship with neighbors across the street; often service areas front neighbors’ primary entries. Although there are symbolic low walls and gateways along Baltimore Avenue / US Route 1, these are open in character and are not extended to other campus areas and entries.

Interconnection across boundaries within the Campus and with the adjacent community: districts bleed into each other rather than being defined; discrete edge conditions, such as along Campus Drive at the center of campus, are composed of remnant areas, not linked and co-ordinated spaces. Landmark elements and buildings are often ignored by neighboring spaces and buildings; axial connections regularly are not respected and built-upon, even at formally-designed conditions such as McKeldin Mall. Connections with College Park are sparse, and the City is divided along Baltimore Avenue: the creation of strong physical relationships should be fostered (figs. c-10k, -13m).

Entry to Campus: There are four major gateways to the Campus that are marked with ceremonial gates. Three occur along Baltimore Avenue: South Gate at the end of College Avenue (the original entry to the Campus), the Class of 1910 Gate at Rosstown Inn (fig. c10c), the Founders’ Gate (sometimes called North Gate) at intersection of Campus Drive; and one along University Boulevard: the West Gate at Stadium Drive. Entrances from Adelphi Road, University Boulevard, and along the Campus Drive-Mowatt Lane-Knox Road corridor are not well indicated, even when they are signed.

Fronts and Backs: There is no consistent treatment of building entries, either at the front or main door or at side and rear access points. Differentiation of pedestrian and loading dock access is often missing, and way-finding for those in wheelchairs or with limited mobility is obscure. This topic is explored further in the Yurus article (fig. c17a).

Differentiation / variety is acceptable, and should be encouraged. The Campus was not developed as a unified whole; it grew as an expression of ideas and concepts relevant to each era. Therefore, buildings and districts can vary from each other as long as inter-relationships are strong. Even areas which appear at first glance to be identical vary in the details, as evidenced in the earliest buildings forming the Eastern edges of McKeldin Mall (figs. c-19b, -22i). The Classical nature of the Mall does not contradict or cheapen the Romantic expression of the Memorial Chapel and Engineering Intramural fields: they work together to create lasting, unified images of the University. Proposed structures and spaces can adhere to traditional or contemporary ideologies, express individually, and contribute to the community without falling to the twin temptations of sloavishly copying / applying styles or overwhelming neighbors in an attempt to draw undue attention at the expense of the whole.

Discernment and preservation of landmark spaces: There are spaces on campus which should be recognized for the quality environment they express, such as Washington Quadrangle and Memorial Chapel Field (figs. c-10k, -12a). These are identified as Contributing in the individual district sections. Every effort should be made to retain these areas and their landscape and building elements. However, even the better examples could bear subtle improvements or refinements; these are identified in the district sections.

Remnant space reclamation and development: There are also many spaces on the Campus which are clearly remnants: little design effort has been applied to them (figs. c-13p). In the process of improving neighboring facilities, they should be modified as required to raise the quality of the entire campus.

Summary

The Campus is a hierarchy of spaces formed by building clusters and planting groups; continue this pattern of development. Link individual open spaces through an integrated network of landscaped corridors and spaces. Express thresholds between spaces as gateways or portals.

Use building and planting features and artwork to invite students, faculty, staff, and visitors into and lead them through the Campus, districts, and spaces. Improve the entry and arrival sequences to the Campus, conceal or relocate service functions along the University borders, and enhance indicators of the Campus edge which define, welcome, and form a positive inter-relationship with neighboring groups and communities.

Preserve unique vistas from the Campus to the surrounding countryside and discern opportunities to frame or create new views. Enhance special views to important or landmark features of the Campus and respect important internal sightlines / visual axes. Develop appropriate additional axes as opportunities arise.

Buildings, in their design and placement, should contribute to the life, structure and identity of the Campus. Individuality can be expressed without overwhelming other facilities or compromising the space-making qualities of existing or proposed structures.

Urban Design: Issues / Summary
Since Charles Benedict Calvert's initial sale of 428 acres of farmland to found the Maryland Agricultural College (predecessor of the UNIVERSITY OF MARYLAND), the Campus topography and vegetation have been greatly altered. There are no remnants of the "wild" or native condition of the site; indeed, most had been removed for agricultural purposes prior to the foundation of the school. College buildings were initially developed as a small cluster atop a knoll at the end of College Avenue: the Morrill Quadrangle approximates this site. Development of the campus used each of the Landscape Typologies / Styles listed below, and the landscape condition of the University echoes past decisions. (fig. c-11a)

A general description of the Campus is contained in the Geographie / Topology article, and specific Landscape / Environmental conditions are included within each District section.

Due to the limited quantity and nature of small-scale built structures on the Campus, free-standing walls / screens and attached items such as porches and staircases are included in the Architecture article. Paving and retaining features are included here. Exterior furnishings, signage and streetlights are covered in other sections.

Western Landscape Architecture can be segregated into different types or styles which developed in cyclical periods and for various reasons. Each affects the original geography, flora and fauna of the site, and evidences the extent of human intervention in enhancing or modifying these features. What people call "natural" can be divided into "Wild" or pristine (ie: the Grand Canyon or the Monterey, CA shoreline) and "Rural" or rustic (countryside along farms or CCC-improved forests or in the National Park System). As the "wild" or native condition has not been apparent since the foundation of UMCP, it has not been included in these generalized descriptions.

**Rural**

Areas disturbed by human intervention, but retaining sense of "native" / original condition; UMCP example: Campus Creek.

- Natural topography and geography present
- Replanted vegetation, irregular or non-patterned replacement of "native" species lost to disease, deforestation, or disaster
- Native fauna present; selective removal limited to diseased or dead animals or limited habitat
- Re-creation or repair of water sources, such as at a creek-bed to repair effects of erosion and rechannelization by adverse drainage patterns; restoration of water quality to allow replenishment of native water creatures
- Limited hardscape or other recreational amenities; stabilized paths and access to natural features

**Agrarian**

Areas cleared of natural vegetation and fenced / developed for environmental research and agricultural purposes, such as pastureland, fields, crops, or animal husbandry; UMCP example: Campus Farm.

- Natural topography usually present; geographic features realigned, such as the formation of terraces or the erection of walls and fences from materials in adjacent fields
- Native vegetation replaced by open fields for pasturing animals or planting crops
- Native fauna supplanted by domesticated breeds of livestock
- Development of ponds and stored-water features; regularization of water resources for flood-prevention and irrigation
- Few, usually small-scale, structures, primarily limited to those for sheltering people, livestock and equipment; density of structures usually sparse, but grouped in clusters; organization of structures can be ordered or haphazard
- Layout of fields and structures may be influenced by architectonic / geometric principles (grids, circles) or follow natural terrain or features

**Features**
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LANDSCAPE ARCHITECTURE : TYPOLORIES

Classical
Areas cleared of natural vegetation and developed along linear axial progressions, indicating subordinance of nature to rational thought. Western / European examples segregate into smaller-scale Renaissance (usually Italian) and expansive Mannerist or Baroque (following the Versailles model) periods. Asian cultures created similar expressions; UMCP example: McKeldin Mall.

Features
- Natural topography usually transformed; geographic features realigned into regularized planes to manipulate space, to provide serial progression of movement or view, and to observe or accentuate the principles of perspective
- Native vegetation replaced by arrangements of specimen plants (parterres, allées) or sculpted to form borders of spaces; rows of plantings emphasize perspectival views
- Native fauna removed / restricted for habitation by humans
- Water sources rechanneled to form fountains, ponds and other features for appearance and experience; dynamic or placid as desired for effect
- Structures subordinate to overall composition, form edges or axial node-points, define figural spatial volumes, and may occupy primary locations
- Idealism, order, rational, refinement, precision equate to power and authority of human thought; readily comprehensible concepts determine schema

Romantic or Picturesque
Areas of altered natural vegetation, developed to enhance the perceived 'natural' aesthetic quality of the space. Historically, this was a reaction to the Classical movement as a response to the "re-discovery" of nature, and sought to re-introduce humans as part of the natural system, in lieu of superior to or removed from it. Classical East Asian (ie: Japanese) garden design profoundly influenced the development of the Romantic Style; UMCP example: Memorial Chapel Field.

Features
- Natural topography usually present; geographic features re-aligned to enhance "natural" appearance
- Native vegetation usually replaced, although noteworthy specimens may be retained to form nucleus of planting feature; native plants relocated to accomplish landscape objectives; planting in groups in lieu of rows or geometric shapes
- Native fauna often relocated or replaced by domesticated livestock
- Water sources rechanneled to form features for appearance and experience
- Structures subordinate to overall composition, but may occupy primary locations; access to structures not direct or linear, but discrete: the journey of discovery leads to various portions of the composition and is a primary purpose of the design; creation of "ruins" or other features to enhance picturesque quality of space
- Although as idealized as the Classical, the Romantic Typology supports a mythical narrative of place, revealing a story as the individual experiences the environment. Romantic concepts and spaces are meant to be understood only after considerable scrutiny while appearing "natural"
Contemporary
Areas of altered natural vegetation, developed to express ideas inherent in contemporary Architectural and Landscape Architectural thought; UMCP example: Hornbake Plaza.

Features
- Natural topography usually transformed; geographic features modified to emphasize buildings or to express ideology
- Native vegetation replaced by arrangements of specimen plants
- Native fauna removed for habitation by humans
- Water sources rechanneled to form fountains and other features for appearance and experience; dynamic or placid as desired for effect
- Structures dominate or surround landscape features
- Conscious break with Classical or Romantic traditions; use of elements from earlier traditions as well as Twentieth Century painting, sculptural, art, or architectonic theories to express ideology; multiple design strategies / influences often employed; ecological science processes may be incorporated
- Native fauna virtually eliminated; limited small domesticated species cohabitate with humans
- Construction of structures and roads encloses defined areas of vegetation; landscape is in the usual condition; high-density of construction
- Landscape organized into limited areas, and can be designed according to Classical, Romantic or Contemporary theories

Urban
Areas cleared of natural vegetation where the increased density of structures reduces the realm of nature to yards, gardens or courts enclosed by landscape. Egyptian or Mesopotamian gardens, Roman or Mughal courts and athena, Medieval monastery cloisters or Renaissance / Baroque plazas / piazzas are early precursors, which developed in response to climatic and development conditions; UMCP example: C-SIC Plaza.

Features
- Natural topography greatly transformed, sometimes as to be indistinguishable from original condition
- Native vegetation removed; specimens planting in managed gardens; gardens are contained, and are usually small in proportion to paved areas
- Native fauna virtually eliminated; limited small domesticated species cohabitate with humans
- Construction of structures and roads encloses defined areas of vegetation; landscape is in the usual condition; high-density of construction
- Landscape organized into limited areas, and can be designed according to Classical, Romantic or Contemporary theories

Remnant / Residual
Areas cleared of natural vegetation that fall between developed parcels, but not clearly belonging to any of the styles listed above, usually indicating a blighted condition; UMCP example: western / curved portion of Campus Drive.

Features
- Natural topography usually transformed for utilitarian purposes
- Native vegetation removed; may be replaced with scrub or planned infill of plant materials, usually without pattern
- Native fauna virtually eliminated
- Surrounded by structures, roads and other construction
- Distinguished by lack of design intent, but clearly not rural or "natural" condition.
LANDSCAPE ARCHITECTURE : FEATURES

Places
- Field: a large open area set aside for pastoral, recreation or athletic uses
- Mall: the large open quadrangle bounded primarily by academic buildings, and capable of containing the entire University population
- Quadrangle: a roughly square or rectangular area bounded by multiple structures or plantings; may be developed as either park or plaza
- Park: a primarily vegetation-filled exterior area set aside for recreation
- Plaza: a solid-surfaced area for larger gatherings, usually in conjunction with building entries or expanded passage intersections; character varies from quiet, semi-private, enclosed, protected spaces to vibrant, public, open exterior rooms; may have vegetation as an integral component
- Court: an enclosed landscaped area, usually solid-surfaced, with specimen plantings
- Node: a small, usually quiet area, adjacent to a passage / way, set aside for gathering, reflection and similar low-key activities
- Additional built features, such as terraces, colonades, pergolas, are discussed further in the Yards and Places article.

Passage / Way
- Stepping stone: an infrequently-traveled way characterized by limited separated surface elements, such as stones in a stream or pavers in a garden
- Path: a stabilized earth or gravel way, usually of limited travel
- Walk: a solid-surfaced way meant primarily for pedestrian traffic
- Road: an improved, stabilized way, usually solid-surfaced, accessible for multi-modal traffic; often with shoulders, but without curbs or drainage system
- Street: an improved, solid-surface public way for vehicular traffic; usually within towns or cities; with curbs and integral drainage system
- Avenue / Boulevard: wider streets; boulevards are often tree-lined broad avenues with separated lanes of traffic
- Bikeway: a dedicated passage, usually solid-surfaced, for bicycle and non-motorized transportation; can be segregated from or combined with pedestrian traffic.

Water
- Fountain: a source of water or a spring; or a mechanized water course or jet and its container
- Wetlands: naturally-occurring areas where the grade-level water-table allows prolonged damp or standing water conditions favoring certain flora and fauna
- Swale: a natural channel which diverts stormwater, usually dry
- Rivulet / run: a small stream, a small natural channel having water present at all times
- Creek: a small river
- River: a natural flow of water, usually of large size, flowing in a direct course, often non-tidal
- Basin: a small, sheltered, shallow body of water, man-made or along a shore
- Pond: an inland body of water, smaller than a lake
- Retention Pond: a depressed, enclosed area capable of receiving stormwater and discharging it into the ground or adjacent watercourses in a controlled manner, may be wet (water present nearly full-time) or dry (water present only subsequent to storms)
- Lake: an inland body of water, usually of large size and constant shape

LANDSCAPE FEATURES / TERMS

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Plantings

- Specimen: individual plant selected for aesthetic reasons (ie: color, shape, size) or to create focal interest, mark an event or determine a point of reference

- Bosk / grove / mass: non-directional groups of plants (bosks are usually restricted to the same species) distinguishable from adjacent surroundings; can be uniform or random of character / shape, and can function individually as a specimen feature or in combination to define space

- Allee / row: directional (linear or curvilinear) groups of plants, often of similar species of trees, that channel views, form edges of spaces, or designate a passage or way, the rhythm helps viewers sense perspective, scale and order across long distances

- Barrier: groups of plants arranged to form edges, protectives, or screens, or to contain, channel or interrupt views or traffic

  Heights: Knee (1’ – 2’), planting beds / borders are also part of this category

  Hip / table (3’ – 4’)

  Head (6’ – 12’)

- Foundation plants and ground covers: provide scale transitions, embellish the base of adjacent structures, and control access and erosion; lawns are included in ground covers

- Canopy: a covering or enclosure, usually formed by branches and leaves, above head-height; arbors and pergolas are built-and-planted subsets to this category; high canopy begins at 30’ above grade

- Sculpt: the effect of creating space by removing vegetation from a non-distinguishable mass, such as a clearing in a forest
COMMON THEMES

- As part of an Urban Design strategy, Landscape Architecture serves to define spaces through place creation, place completion and place enhancement. A plurality of space types and styles adds to the vitality of the Campus, and contributes to the pedagogical mission, both for students involved in Landscape, ecological and urban studies and for the general populace.

- The Landscape serves as a unifying feature of Campus design. Planting should be conceived in context with the entire Campus and surrounding areas. Plantings should enhance Campus spatial qualities, and they should be expressive of the University of Maryland’s regional culture and natural history.

  • Locate new plantings with reference to District or Campus-wide Comprehensive Landscape Plans

  • Trees are more than simple, single objects to be randomly placed in the Landscape: when used as specimens, bosks, or other features listed in Planting Terms, they define the spatial character of the Campus

  • Shrub, flowers and herbaceous materials also contribute to the three-dimensional character of the Campus and are informative in the space-making process

  • Diligence should be exercised in the selection of plant species, and should contribute to the arboretum / botanical garden approach of the Campus

- Balance use of plantings as barriers with goal of maintaining sense of open space throughout the Campus.

- Maryland’s location affords seasonal changes: a profusion of flowers and the rich greens heralding Spring, lush tree canopy and lawns of Summer providing comfortable places to enjoy the Sun’s heat, the return of extravagant color in Autumn leaves, and Winter’s barren branches permitting limitless vistas and bemused evergreens promising the return of life following the snows.

  Each space should be planned to seasonally stimulate the senses, encourage appropriate participation with the environment, and enable interaction of the community.

  • Seen from above, the Campus reveals its urban density; traveling through it, one appreciates its filtration, and containment of the headwaters of Campus Creek and Guilford Run, both of which contribute to Paint Branch Creek, the Anacostia and Potomac rivers, and Chesapeake Bay. Restoration and protection of the streams and adjacent woodlands, and the reduction of pollution, and control of non-point sources of waterborne contaminants, is required to allow the University to complete its mission.

  • History has shown that reliance on a plant monoculture (single species, such as Elm or Chestnut trees) throughout the Campus leaves the design vulnerable to devastation by blight or disease. Balance design intent for bosks, allées, or barriers, and consider alternative species in planning major space-making efforts.

  • Preserve: Maintain important stands of vegetation, especially extant large specimen trees

- Minimize unplanned loss of trees or other vegetation by construction activities: prior to commencement of construction, consult with Facilities. Management agents and arborist to determine if the planting should be removed (if it is a liability or near the end of its lifespan), replaced by a similar specimen, relocated, or saved in situ

- Provide and maintain protective for plants (which are to be retained) throughout the construction period; prevent parking of vehicles and compression of soils above root systems

- Restoration: The Campus is located at the headwaters of Campus Creek and Guilford Run, both of which contribute to Paint Branch Creek, the Anacostia and Potomac rivers, and Chesapeake Bay. Restoration and protection of the streams and adjacent woodlands, and the reduction of pollution, and control of non-point sources of waterborne contaminants, is required to allow the University to complete its mission. Often, weekly or seasonal maintenance is deferred due to cost or time issues. Litter, pollutants without water, damage to tree roots and lawns due to inappropriate snow-plowing and parking of utility and maintenance vehicles, graffiti, or dead plant limbs and specimens are more than just unsightly: they communicate a lack of respect for both the environment and the people using it. Removal of tornado-damaged trees along Campus Creek and University Boulevard has yet to be accomplished, contributing to fire danger and the spread of intrusive species in the watershed. The current system should be expanded into a regular, funded Campus-wide maintenance program capable of solving emergency or infrequent situations.

- Utilities: Reconcile surface landscape elements with sub-surface utility conditions

- Locate planting with consideration of the effects of the utility involved: heat from steam lines can be deleterious to the root system, as can excavation for repairs or replacement. Since plants seek water sources, roots can invade water and sewer lines.

- Locate utility lines where they will not interfere with extant planting, or planned garden or building areas

- Maintenance: the general upkeep and repair or replacement of damaged elements. is required to allow the University to complete its mission. Often, weekly or seasonal maintenance is deferred due to cost or time issues. Litter, pollutants without water, damage to tree roots and lawns due to inappropriate snow-plowing and parking of utility and maintenance vehicles, graffiti, or dead plant limbs and specimens are more than just unsightly: they communicate a lack of respect for both the environment and the people using it. Removal of tornado-damaged trees along Campus Creek and University Boulevard has yet to be accomplished, contributing to fire danger and the spread of intrusive species in the watershed. The current system should be expanded into a regular, funded Campus-wide maintenance program capable of solving emergency or infrequent situations.

- Urban soil amendments (expand)
PROPOSALS & REMEDIES

The Campus suffers from a confusion of elements that form spaces: neither plantings nor buildings predominate. In the ample spacing of individual buildings, enclosure is denied; in the lack of density of planting, structures are not concealed. Options include:

- Increase the density of planting at all levels to provide adequate enclosure of spaces.
- Raise the tree canopy to enable the buildings to assert their presence; this could be very effective on McKeldin Mall.
- Develop small-scale landscaped spaces through the use of low Barrier plantings (Knee, Table, and Head-height), borders, and structural elements to break up over-scaled and remnant areas.
- Provide Front-, Back- and Court-yards for each facility with gardens and artwork as described in subsequent articles.

- Streetscapes regularly occur without the benefit of landscaped areas (parkways) separating sidewalks and pedestrians from roadways and vehicles; parkways should be provided, especially in high-traffic volume areas (either pedestrian or vehicular). Shaded walks and seating areas should be provided, especially at bus stops.

- There is a profusion of passageways through the Campus, but processional routes and other hierarchical systems that inform the traveler of secure, direct and populated walks are underdeveloped. Physical conditions (width, material, condition, design) are not consistent within districts or throughout the Campus. Plazas and gardens are not linked, and way-finding devices are confusing or missing. Rare is the passage through natural areas adjacent to Campus. Individual proposals are discussed in the District sections, but fig. 17A indicates the proposed overall campus processional route system.

- Although most surface parking lots are scheduled to be relocated to garages, some will remain and these should be modified with planting beds and borders to screen vehicles.

SUMMARY

UMCP is fortunate to have been constructed as a park-like campus, where landscape moderates the built environment and assists in the formation of a variety of exterior spaces. The primary images of the University (ie. Memorial Chapel Field and McKeldin Mall) represent a diversity of Landscape Architectural approach and communicate a sense of refinement, order and serious pursuit of ideals consistent with the academic mission. Plazas provide gathering areas for functions as well as meeting places for students, faculty and staff. The 1920’s decision to create a campus botanical garden has brought many striking species, both native and foreign, to the attention of the community, added beauty and diversity, and contributed to the pedagogical nature of the University.

The FMP proposes the addition of new quadrangles and pedestrian corridors replacing surface parking lots, as well as the enhancement of underdeveloped plazas and spaces. Processional routes linking popular and important destinations should link public spaces, and yards appropriate to each facility should be created. The natural stream environment, ravaged by repeated flash storms and last year’s tornado, should be rejuvenated, native species of flora and fauna returned. Damage to micro- and macro- ecosystems should be corrected and causes remedied.
ARCHITECTURE : DESCRIPTIONS

GENERAL DESCRIPTION / CHARACTER

With the exception of the oft-modified Rossborough Inn, nothing remains of the University’s Post-Revolution thru Civil War period. Morrill Hall, a Second Empire style structure and part of the late-Nineteenth Century expansion, survived the Thanksgiving, 1912 conflagration that consumed the Administration and Barracks buildings, and helps locate the Northern-most edge of the earlier campus. The construction of Calvert Hall (1913) initiated the transformation of the Campus according to Colonial Revival and Classical Landscape principles, pre-WWII-era buildings surrounding McKeldin Mall being the chief example. A material palate of red brick with white trim, simple massed buildings capped by gray pitched roofs has become synonymous with the University, and continue to influence the character of new construction.

As the student body and faculty composition today represent the polyglot of nationalities and races which inhabit the US (very different from pre-WWII Maryland), so the Campus evidences a wide range of architectural traditions. While the University’s Colonial Revival style demonstrates incorporation of many elements from the Tidewater’s past, including the Georgian, Adam / Federal, Early Classical, and Greek Revival periods in a uniquely Maryland blend, post-WWII construction has contributed less-detailed versions of earlier styles and “completed” McKeldin Mall. The 1960’s added the high rise-surrounding-community building complexes that emphasize the heights of the Northwest District. The Engineering and Science schools occupy the most densely built portion of Campus with non-traditional and utilitarian styles: the Northeast District has a distinctly “downtown” dense urban feel. Commonality of materials and a differentiated, simple massing strategy have enabled the various portions of the Campus to appear related: Contemporary and Traditional compliment each other.
A partial list of commercial architectural styles practiced in the United States since its founding: those indicated in capital letters are represented on the UMCP campus:

<table>
<thead>
<tr>
<th>PERIOD / STYLE</th>
<th>DATES CONSTRUCTED</th>
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<tbody>
<tr>
<td>Georgian</td>
<td>1700-1780</td>
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<td>Adam</td>
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<td>Early Classical Revival (Jeffersonian)</td>
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<td>Greek Revival</td>
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<tr>
<td>Eclectic / Exotic Revivals</td>
<td>1835-1890</td>
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<tr>
<td>Gothic Revival</td>
<td>1840-1880</td>
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<td>Italianate</td>
<td>1840-1885</td>
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<tr>
<td>SECOND EMPIRE</td>
<td>1855-1885</td>
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<td>FOLK VICTORIAN</td>
<td>1870-1910</td>
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<td>Richardsonian Romanesque</td>
<td>1880-1910</td>
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<td>Beaux Arts</td>
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<td>NEO-CLASSICAL / NEO-CLASSIC – GREEK</td>
<td>1895-1950</td>
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<tr>
<td>Prairie / Arts &amp; Crafts</td>
<td>1890-1930</td>
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<td>Post Modernism Classic</td>
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<td>CONTEMPORARY / MINIMALIST</td>
<td>1980-present</td>
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ARCHITECTURE: PERIODS, THEMES & ELEMENTS

COMMON THEMES
- Simple, multi-story block massing (low-rise predominates)
- Additive (porches) and recessive (wings) elements in relation to main building block
- Tri-partite base-middle-top organization (fig. c-20m)
- Non-structural red brick façade: various bonding patterns, predominantly Flemish (fig. c-20h) and Common (Running bond with a Flemish or header row every 5th, 6th, or 7th course) (fig. c-20o) bonds; bands of brick or stone to indicate intermediate floors; base often of stone or other contrasting material
- Hierarchy of figurative elements set within a "field" or grid, often white or light color in contrast with masonry
- Emphasized main entry, often with porch or richly ornamented features; entry regularly occurs above the building base (fig. c-20m)
- Primarily vertical rectangular openings punched in masonry walls; groupings of windows emphasize the vertical over horizontal, often with intermediate ornamental panels contrasting with red brick walls; arched openings not uncommon (fig. c-20i)
- Slightly-recessed or co-planer windows with white trim, mullions, and muntins; muntins usually are thinner than mullions which are thinner than frames and trim
- Gray gable or hip roofs, sometimes set back from or concealed by a parapet or balustrade, predominate (figs. c-20i,j); low-slope (flat) roofs (fig. c-20l) with mansard screening by a parapet or balustrade, predominate (figs. c-20i,j); low-slope (flat) roofs (fig. c-20l)
- Architectural elements are applied or incorporated into the building massing
- Iconographic elements (cupolas, dome, steeple) on primary edifices express axial conditions

BUILDING ELEMENTS
Common types of architectural elements and conditions existing on Campus include:

MASSING

A. Simple Block Massing (fig. c-20i)
- Rectangular block, long rather than high, easily-recognizable shape
- Generally three stories in height, although single through six-story variations exist on Campus
- Primary entrance usually at the center of the block; secondary and service entries at the sides or rear

B. Additive Massing (fig. c-20j)
- Simple rectangular primary block with projecting or recessed wings; appendages may be minor or of equal size

C. Composite Massing (fig. c-20k)
- Composed of a number of blocks arranged in an orderly or haphazard manner around a core; complex shapes or arrangements
- Heights range from single to three-story
- Generally the primary function has a height higher than others in the composition

D. Vertical Massing (fig. c-20l)
- Similar to Simple Block Massing, but height, far exceeds length or width
- Architectural elements are employed to break down the appearance of the mass
- The base should relate to the pedestrian scale
A. Primary roof forms on campus are pitched (gable, hip, shed, and mansard) vaulted and flat.

1. Pitched (figs. c-21a-d)
   • Gable, hip, shed, and mansard roofs may have projecting open or encased cornices, eaves and overhangs
   • Gable ends may have windows or ornamentation in the tympanum
   • 4-in-12 to 12-in-12 slope

2. Vaulted (figs. c-21e,f)
   • Shallow vaults appear infrequently throughout the campus, usually over long-span sports complexes; there are few domes on campus, and these are shallow

3. Flat (fig. 21g)
   • Flat or low-slope (less than 4 in 12) roofs usually have parapets or balustrades and minimal cornices.
   • Structures requiring mechanical equipment to be roof-mounted often have flat roofs with mansards or other screening devices; use of flat roofs for exterior social or recreational space should be considered for facilities with little available ground area (fig. c-21h)

B. Materials and colors

1. Slate: usually gray, though darker hues of purple, red, blue, green and black occur (figs. c-21a-d,f)
   • Composition Shingles: usually gray to match slate

2. Metal: copper, patina (verdigris) or coated (gray or natural reddish color with transparent finish to prevent oxidation) (fig. c-21i)
   • Steel or aluminum: red and gray prefinished materials preferred; blue or green examples should be replaced or repainted when resurfacing is required (fig. c-21j)

3. Gray is the predominant color of campus roofs; other colors are reserved for special buildings or elements (the Main Administration Building or cupolas, for example)

C. Features

1. Iconographic elements include steeples, chimneys, cupolas, domes, and pyramids appropriate to program, design and siting (figs. c-21i,j)
   • Skylights may take the form of an iconic element or be a part of the roof massing (figs. c-21k)

2. Skylights: may take the form of an iconic element or be a part of the roof massing (figs. c-21k)

3. Penthouses should be recessed within the building mass or concealed by screening or roof-forms (figs. c-21n)

4. Exhaust stacks should be grouped, screened or incorporated as a part of the building composition (figs. c-21p)

5. Minor elements and accessories such as dormers, vents and chimneys enliven the roof surface, enhance the roof profile, and assist in establishing scale (figs. c-21k,n)

6. The materials used may contrast or complement the façade or roof materials
ARCHITECTURE : ELEMENTS

PORCHES AND ENTRANCES

A. Entrances should be clearly defined and articulated. They should clearly relate interior functions to immediate exterior surroundings, respond to context and axes, and incorporate elements of transparency to encourage welcome.

B. Design to accommodate access for those permanently or temporarily disabled (figs. 22b, e, g, h, i, m).

C. Design per appropriate human scale relating to the building program.

D. Maintain proportion with the façade and integrate with the overall building form.

E. Provide weather protection, create shade, form a transition between exterior and interior public spaces.

F. Energy saving features, such as vestibules, should be incorporated (fig. 22p).

G. Further information is presented in the FRONT AND BACK YARD article.
Both traditional and contemporary architectural styles provide for punched openings that are hierarchically arranged on the façade to express the function of the spaces within. Openings in most Campus structures have vertically-oriented rectangular shapes. Often, windows and doors are grouped to form larger compositions, and these are subdivided to emphasize vertically. Windows and doors are set near the surface of the brick façade and not deeply recessed; sunshades are not used.

A. Doors (figs. c-22a-s, -23a-u)
1. Size per ADA and code requirements; provide automatic opening and closing devices as required
2. Provide vision panels, if not full-glazed
3. Sidelights, transoms may be incorporated
4. Emergency exits should be marked by signs; size and operation of door leaf should be per code
5. Common materials include wood, metal (steel or aluminum), and glass; colors match white trim or use red, black or gray

B. Windows (figs. c-22a-p)
1. Frames and sash are usually wider than interior elements (mullions and muntins), and along with building trim are predominantly white in color. True-divided lites or expressed interior and exterior grates are preferred when creating a small-paned appearance
2. Window materials should be wood, metal- or vinyl-clad wood or metal (steel or aluminum)
3. Glazing shall be clear. Tinting, if present, should be light gray. No reflective glazing should be used. Colored or stained glass should be reserved for special functions. Etched or fritted glass may convey building names, symbols, and icons.
C. Louvers
1. Exhaust or intake vents located on building façades should conform to other openings in size, shape, color, and arrangement (fig. c-24a).
2. Sight-restricting blades should be scaled to match or be less than frame dimensions.
3. Louvers should completely fill existing openings in retrofit conditions; use of remnant panels or other devices should be avoided (fig. c-24b).

D. Portals
1. Large-scale openings in building masses that connect two exterior spaces allow the building to function as a gateway or portal; the openings may be single- or multi-story (fig. c-24d, -24c).
2. When the building mass fails to continue the encasement of the opening, a bridge is created. Breezeways (fig. c-24g,f), or ground-level porch connectors, are discussed in the YARDS article.

MISCELLANEOUS ELEMENTS
Railings, balustrades, grilles, gates, and similar items are often metallic elements, but may be formed of wood or vinyl products, depending on location. Usually, they should be high gloss painted or prefinished black or bronze. Balustrades and some screening devices may be painted white to match adjacent trim. Window grilles should match pane patterns, and painted black or to match frame color. Grilles should meet emergency egress requirements for sleeping areas and classrooms. Cross-sections are detailed in the DESIGN STANDARDS manual (figs. c24i-l).

Bridges occur infrequently on campus, and usually highlight an axial condition connecting two or more areas. (figs. c-24d). Single and double story examples exhibit similar transparent qualities, with large expanses of glazing above railing-height on each floor. Their bases are cambered to form an arch with the walls that support them. Materials and styles vary greatly. Roadway and pedestrian bridges, likewise, vary in material and style: core-ten (rusting) steel, concrete, and wood are common.

C-24
New construction that is not located on or blocks the understanding/appreciation of established axes [ie: Talbot Hall is situated slightly off-axes with Biology Zoology, the addition to the Health Center may block visual connection with HJ Patterson cupola from proposed western mall (fig. c-9e)].

New structures should draw upon an architectural vocabulary that works towards visual harmony and consistency, both on the district and campus level. Design strategies, using either traditional or contemporary approaches that adequately express the function and character of the facility, are equally appropriate. Buildings can express individuality without slavishly copying the past or garishly disrupting the whole. (figs. c-21a).

Entances are often not provided with coverings to shield building occupants from adverse weather; stairs are unprotected from accumulations of snow or ice (fig. c-22a-d).

Develop bridges in concert with destinations; prevent filling spaces beneath or adjacent to the bridge with mechanical or other equipment (fig. c-25b).

Unsympathetic design on the University of Maryland Campus has contributed:

- Undifferentiated massing and large building footprints (fig. c-25a).
- Dark-colored window trim (fig. c-19f).
- Mullions of similar thickness as frame (fig. c-25g).
- Non-rectangular, non-vertical opening proportions (fig. c-25f).
- Horizontal bands of windows (“Ribbon windows”) (fig. c-25g).
- Vertical striping composed of windows with light-colored brick panels of nearly-equal proportion with red brick wall panels (fig. c-25b).
- Over-scaled window elements [ie: large arched window at Manufacturing Building 148 (fig. c-25h)].
- Inappropriate roof color [ie: blue roofs of Byrd Stadium additions, green roof of Animal Sciences (fig. c-25i)].
- Expansion of the bleachers of Byrd Stadium that are out of proportion with surrounding structures (fig. c-25k).
- New construction that is not located on or blocks the understanding/appreciation of established axes [ie: Talbot Hall is situated slightly off-axes with Biology Zoology, the addition to the Health Center may block visual connection with HJ Patterson cupola from proposed western mall (fig. c-9e)].

Continuity of material, color and size have created visual harmony throughout the Campus. Quality Colonial Revival structures representing Maryland’s architectural history that were constructed between the World Wars have yielded to buildings of simplified or contrasting styles, but simple-shape buildings continue to form grass lawn quadrangles bordered by trees. Siting and relationships between buildings and the spaces they create should be considered with care. Preservation of the University’s historic and pedagogical cultures, nationally and internationally prominent practitioners in the Urban Design, Landscape Architectural and Architectural fields could contribute spaces, landscapes and structures that advance the University’s historic and pedagogical objectives, and become quality attractions for Maryland tourists.

Additions and renovations should reference and respond to the original building (figs. c-25c).

Connect the Campus to adjacent communities and the region; incorporate architectural elements and features to enhance visual, historical, and physical connections.

Major iconographic buildings in and around the McKeldin Mall form the Historic Core of UMCP built in the Colonial Revival style adopted in the 1920’s. They establish a context and express a campus image in a traditional architectural language. These structures should be preserved, restored, and maintained.

Additions and renovations should reference and respond to the original building (figs. c-25c).

ARCHITECTURE : ISSUES & SUMMARY

ISSUES

- As evidenced in the list of Architectural Periods that began this article, the Campus evidences a dearth of styles and lacks the richness of architectural discussion and understanding that contributions by major practitioners and proponents of alternate theories provide (ie: Thornton, Ranwick, Richardson, M’Kim Mead and White, Burnham, Wright, the Saarans, or Khan are a few architects who produced similar-sized masonry structures to those erected at UMCP contemporaneously with the Campus development). Hiring nationally and internationally prominent clinicians in the Urban Design, Landscape Architectural and Architectural fields could contribute spaces, landscapes and structures that advance the University’s historic and pedagogical objectives, and become quality attractions for Maryland visitors.

- Relate buildings to the human scale and design sensitive interactive façades at pedestrian level. Respect size, massing, height, material, color and opening standards.

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SUMMARY

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