Oklahoma Health Center
MASTER PLAN
2007 - 2022

A VISION FOR GROWTH

Prepared by

MILES ASSOCIATES / HOK PLANNING GROUP

January 2007

Acknowledgements

The Oklahoma Health Center (OHC), one of the largest medical campuses in the United States, is a unique collection of federal, state and private agencies and institutions. As an Academic Health Center (AHC), it is one of only four in the country to have seven accredited professional colleges.

Many of these institutions and agencies are either undergoing, or are planning, major expansions to modernize, stay competitive and increase capacity. While the OHC's growth is expected to continue for years to come, the core institutions are confronting new challenges, particularly land availability, parking requirements and growth pressures from adjacent facilities and surrounding neighborhoods.

In February 2006, Miles Associates and the HOK Planning Group were engaged to develop a comprehensive Master Plan to address the immediate and future growth of the Health Center including the many academic and research, clinical and hospital functions. This plan proposes strategic redevelopment of the OHC infrastructure, land use, facility re-use and new facilities development phased over the next 15 years.

The Planning Team conducted more than 60 interviews and follow up meetings with 39 agencies and institutions, which included more than 140 individuals. Several groups, such as the College of Medicine, the University of Oklahoma Health Sciences Center (OUHSC) and City Planning were interviewed more than once.

Purpose:
Develop a Master Plan to address the future growth of the Oklahoma Health Center, including academic, research, clinical and hospital functions.

Summary of the Master Plan Scope of Work:

- Interview key stakeholders
- Meet with representatives of City Planning and Public Works
- Integrate key stakeholder's strategic plans
- Review and integrate previous planning studies
- Integrate the OU Health Sciences Center facility plans
- Include approved capital projects
- Review existing facilities for re-use
- Review site utility information
- List proposed projects for the 5, 10 and 15 year planning horizons
- Recommend changes to campus access, circulation and parking
- Recommend land use and zoning related to expansion

Stanton L. Young Walkway Fountain

Oklahoma Health Center Stakeholders

Project Funding Institutions

College of Medicine, University of Oklahoma Health Sciences Center
Oklahoma City Urban Renewal Authority
Oklahoma Health Center Foundation
OU MEDICAL CENTER
Presbyterian Health Foundation
University Hospitals Authority and Trust
University of Oklahoma Health Sciences Center

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Chapter 1 – Introduction

A. Introduction

The Oklahoma Health Center (OHC) in Oklahoma City has grown over the last 40 years to become a recognized national leader in patient care, research and academics. Today, the OHC faces the challenge and opportunity for continued dramatic growth by many of the present institutions and the introduction of new institutions onto the campus.

Many institutions of the OHC are on the verge of exciting building programs, the scope of which has not been seen since the 1970's when the core of the Health Center underwent a dramatic expansion with construction of such facilities as University Hospital, Presbyterian Hospital, the College of Dentistry, and expansions of Children's Hospital and the VA Medical Center.

Now is the time for a bold new vision of the Oklahoma Health Center Campus. The Master Plan vision, described herein, establishes a clear framework to guide institutional growth, improve the physical environment and strengthen the community.

This plan serves as the framework for future change as well as the guide for long-term growth. It presents design ideas, addresses key developmental issues, and offers ways to credibly resolve them. The plan is the product of the collaborative efforts among the OHC institutions and their neighbors.

Tree-lined Walk Behind College of Nursing

Oklahoma Health Center and Downtown Oklahoma City (Photo 2005)

Planning Goals

Overall, the goal of the OHC Master Plan is to develop a comprehensive framework to guide future growth of the Health Center. The plan will direct redevelopment in the district to achieve a campus environment, which accommodates the broad missions of the OHC. Implementation of the plan is phased by 5, 10 and 15-year benchmarks.

The master planning process and stakeholder interviews identified additional goals for the OHC. These goals, listed below, provide direction for development of concept alternatives, their evaluation and the final plan.

- Establish the OHC as the primary destination in Oklahoma for health care and education
- Achieve a campus environment that supports the missions and strategic goals of the OHC
- Develop distinct zones of use for the campus
- Identify options for facility re-use and areas of future growth
- Integrate connections to the Central Business District, Bricktown and the 10th Street Corridor
- Increase the OHC's status as a major economic engine for the region
- Reinforce the position of the Cancer and Diabetes Institutes as world-class facilities

B. Site Location

Oklahoma City is at the crossroads of I-35, I-40 and I-44, and less than 200 miles from Wichita, Tulsa and Dallas-Ft. Worth. Oklahoma Health Center institutions are central to the Oklahoma City's metropolitan areas population of more than 1,000,000, and conveniently located east of downtown and south of the State Capitol Complex.

The OHC campus draws patients and visitors from all parts of the state as well as from neighboring states as far away as Amarillo, Texas and Wichita, Kansas. Generally, statewide access to the OHC is provided by the Interstate Highway system and state toll roads (limited access highways) from all directions except the northwest, which has a combination of two-lane and four-lane highways.

It is surrounded by some of the City's most vibrant and historic urban areas, which include Bricktown (entertainment district), Deep Deuce (urban neighborhood), Automobile Alley, Lincoln Terrace (historical preservation neighborhood), and the Oklahoma State Capitol Complex.

Within Oklahoma City, the OHC is served well by the interstate highways and major streets. I-40 runs east-west just south of the campus; I-235 runs north-south at the western edge and becomes I-35 South at the I-40 interchange; about one-mile east, I-35 turns north to Edmond and Guthrie while I-40 continues east to Shawnee; I-44 interconnects with both I-235 and Lincoln Blvd. about 3 miles north of the campus.

Oklahoma Regional Location

Metropolitan Oklahoma City Context

OHC / Downtown Location

C. Today's Context

The Oklahoma Health Center (OHC) is the epicenter of research, health care, education, technology, and community services organizations, which do not exist elsewhere in the State of Oklahoma. The 300 acre complex, located just south of the State Capitol and east of downtown Oklahoma City, serves as home to over thirty organizations ranging from cutting-edge biotechnology companies to private and government sponsored patient care, education, research, and community support institutions.

The OHC Campus and its member organizations represent over a $2.5 billion dollar capital investment. As a whole, the OHC represents the second largest concentration of employees in the State of Oklahoma - more than 12,500 - and produces an annual economic impact of almost $2 billion dollars to the greater Oklahoma City community.

The University of Oklahoma Health Sciences Center (OUHSC) is located in the center of the OHC campus and, within its seven colleges, affiliated teaching hospitals, and other partners, provides health education and training programs, patient care services, and research for the community, state, and nation. Within the OUHSC, the OU College of Medicine is not only responsible for medical undergraduate and graduate education in the State, but it's faculty and residents also provide the physician staffing for the OU MEDICAL CENTER (Presbyterian Tower, Everett Tower, and Children's Hospital), the Veterans Affairs Medical Center, and the Dean A. McGee Eye Institute, all located on the OHC campus.

The Oklahoma Medical Research Foundation (OMRF) is located on the north side of the OHC. It is one of the oldest, most respected independent research institutes in the nation. OMRF scientists, who have clinical faculty appointments in the OU College of Medicine, rank nationally among the top recipients of competitive research grants to keep the institute on the cutting edge of biomedical science.

The mission of the Presbyterian Health Foundation (PHF), is to support medical research in Oklahoma and research scientists at the OHC. The PHF Research Park, located on 27 acres in the southwest part of the OHC campus, is the biotechnology transfer center for the State of

Aerial Photograph of the Oklahoma Health Center (Photo 2005)

C. Today's Context, cont'd

Oklahoma. Its biotechnology transfer programs bring the discoveries of Oklahoma scientists to the commercial arena for use by the worldwide health community.

The interaction of the many doctors, scientists, educators, and health providers within the OHC produces many synergies and outcomes all due to the capabilities of multi-disciplinary collaboration on a single campus. These synergies create a dynamic and vibrant environment for enhanced patient care, research, and education to better serve the community, the State of Oklahoma, and the Nation.

Todays Campus:

The Oklahoma Health Center has grown to 325 acres and 30 instiitiutions with various land holdings having a complicated patchwork of site ownership.

Map of Principal Users

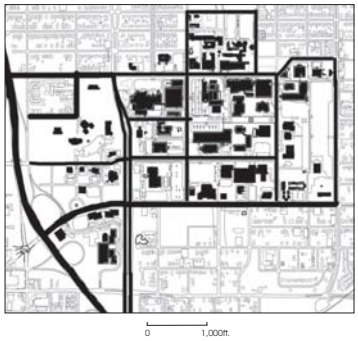
Legend:

- OU Health Sciences Center (OUHSC)
- OU MEDICAL CENTER (OUMC)
- Veterans Affairs Medical Center (VAMC)
- State of Oklahoma
- Oklahoma Medical Research Foundation (OMRF)
- Presbyterian Health Foundation (PHF)
- Private Institutions
- Parking Garages

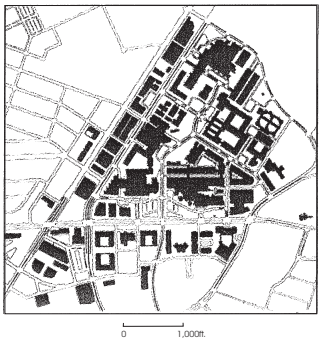
Scale Comparisons

- The OHC is larger in land size than the Mayo Clinic and Texas Medical Center Main campus.
- As the OHC continues to grow, it approaches the size of major urban downtown centers.
- Future OHC planning must face all the issues at the scale of a city.

Mayo Clinic
Rochester, Minnesota



Oklahoma Health Center
Oklahoma City, Oklahoma

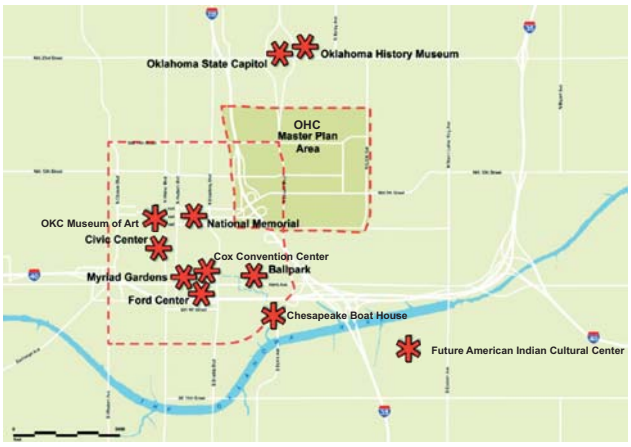


Texas Medical Center Main Campus
Houston, Texas

D. Regional Context

Downtown Context

Downtown Context. The Oklahoma Health Center district occupies an area nearly as large as downtown Oklahoma City. Recent neighborhood revitalization efforts, downtown's revival and the impact of major redevelopment, have established a precedent for the OHC, signifying the feasibility of redevelopment at such a large scale as well as its potential impact on Oklahoma City.



Cultural Context

Cultural Context. Many of Oklahoma City's most notable landmarks are located near the OHC. These landmarks include traditional monumental architecture such as the State Capitol and the Civic Center; significant landscapes such as the Oklahoma City National Memorial & Museum and the Myriad Gardens; and entertainment complexes such as the Ford Center, AT&T Bricktown Ballpark and the Chesapeake Boat House. Although the OHC has a tradition of high-quality architecture, it does not have an individual landmark building or coordinated architectural ensemble of landmark status that reinforces its image and importance.

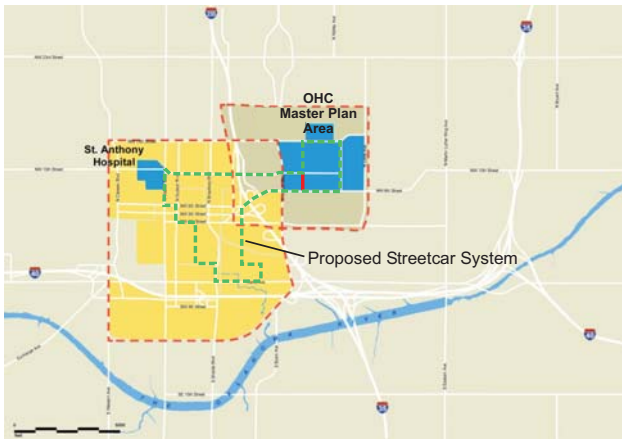
Health Care in Central Oklahoma City

Health Care in Central Oklahoma City. The Oklahoma Health Center is complemented by St. Anthony Hospital, located in the City's Midtown neighborhood. Currently, opportunities are being sought to strengthen the connection between these two major health care destinations via the 10th Street corridor.

D. Regional Context, con'd.

Open Spaces

Open Space. Large areas of open space exist throughout the neighborhoods surrounding Oklahoma City. The majority of open space, connected as a network, consists of rights-of-way following highways and the riparian landscape and numerous parks along the Oklahoma River. A recently completed public landscape, the Bricktown Canal links a dense, vibrant neighborhood to the Oklahoma River open space network.



Public Transportation

Public Transportation. As Oklahoma grew and spread over the prairie, it became dependent upon the automobile as the principal means of travel and the public transportation system evaporated. Today, the revitalization of the City's core areas is leading to re-emergence of public transportation through Metro Transit; rubber-tired trolleys serving the core city and Bricktown; commuter bus routes serving outlying areas such as Midwest City, Edmond, Yukon, Moore and Norman. A recent study contracted by Central Oklahoma Transportation and Parking Authority has shown the need and feasibility of a new streetcar system, and a light rail commuter system from Edmond and Norman to downtown Oklahoma City using the BNSF rails, and the Santa Fe Depot as the downtown station.

E. Vision

Academic Health Centers (AHC) across the country are undergoing rapid change brought about by advances in science and technology and changes in population growth and mix. These advances, while positive for our society, have placed new demands on educators, scientists, health providers, and administrators. Every major AHC in the United States has made major investments in new and improved facilities, technology, and human resources. In many cases, they have been required to expand the size of the campus footprint to meet their needs.

OUHSC Biomedical Sciences Building

The OHC Master Plan Project is very timely. Most all the member organizations are experiencing increasing needs to meet new growth demands and challenges in health care services, research, and/or education. Many projects are in process or in the planning stage. More have been identified for the future. The integration of this planning to the campus as a whole and connecting such planning to the community becomes a vital requirement.

The overall vision for the OHC is to build upon its outstanding reputation to become a world-class leader and site for medical research, health science education, and high quality patient care services. This vision and the strategic plans of the member organizations, will demand future investments in human resources, technology, capital projects, and critical infrastructure such as transportation and parking.

The unique role of the OHC and the OUHSC will continue to be important to the State and the greater OKC area. The latest example is the OU Cancer Institute. This project will not only provide state of the art diagnostic and treatment capabilities for the citizens of Oklahoma but will enhance important research for treatment modalities in the future. The project is critical to the OUHSC goal of being designated a Comprehensive Cancer Center by the National Institutes of Health. Only thirty-nine such designations now exist in the United States.

The OUHSC strategic plan identifies growth in every academic College in order to meet the health education needs of the State. These colleges are: Allied Health, Dentistry, Graduate, Medicine, Nursing, Pharmacy, and Public Health. In almost every College, class sizes are increasing and new teaching methods are required due to new technologies and changing accreditation requirements. This requires new and/or re-purposed facilities. For example, clinical simulation labs, that use highly sophisticated computer controlled mannequins, are now part of the future for training medical, nursing, and other health professional students. Undergraduate and graduate students now come to the OUHSC from all over the nation and the world. New campus amenities such as student housing, parking, an expanded student union, and retail facilities are in immediate demand.

The College of Medicine has experienced growth in all facets of its mission and will continue to expand and develop its programs in the future. The College has and is expanding its full-time faculty in almost every clinical department to meet the increasing demands for adult and pediatric health services, in collaboration with the OU MEDICAL CENTER and the Veterans Affairs Medical Center. This demand has placed an extraordinary stress on the need for new and expanded in-patient facilities, ambulatory care facilities, office space, and parking. These requirements are immediate and will continue to expand into the future. New undertakings such as the OU Cancer Institute, the new Oklahoma Diabetes Center, and expanded clinical and basic research activities will also impact future College faculty and facility requirements. It is projected that the size of the College of Medicine faculty will need to grow over forty percent during the next ten to fifteen years to meet the College's mission.

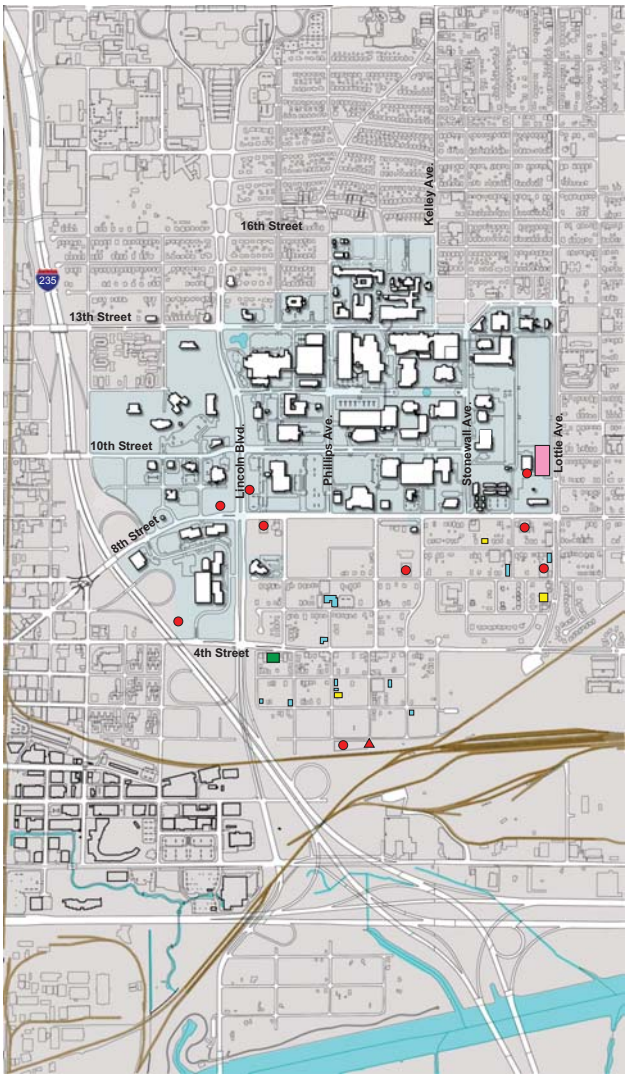
The OUHSC has experienced a high degree of success in its research programs over the last five years. Awards have more than doubled, exceeding $62.3 million for 2006. The OUHSC Research Strategic Plan calls for a doubling of Federal and total biomedical research funding over the next four to five years. This vision, in conjunction with the OUHSC Research Strategic Partners, establishes focal areas and strategies for growth and drives the resource needs and funding priorities. This plan will require a significant expansion in research personnel, facilities, and parking.

By leveraging the collective resources of the campus's numerous institutions and organizations combined with financial resources from public and private entities, the OHC will be positioned to achieve its vision in the future: to become a world-class leader and site for medical research, health science education, and high quality patient care services.

F. Critical Issues

Key Findings from Stakeholder Interviews.
The following key issues and current/future requirements came from multiple interviews. A number of critical issues were named by more than one entity, but parking was identified as an issue in every stakeholder interview. All of these issues are deemed important to the future viability of the OHC and the University of Oklahoma Health Sciences Center. All are current and future needs, and most all are critical to the missions of the various entities.

- *Expand faculty office, teaching and research capacity in all the OUHSC Colleges, which is especially critical in the College of Medicine due to its rapid clinical and academic growth requirements and new program development*
- *Expand ambulatory clinical facilities*
- *Expand in-patient beds and in-patient clinical teaching support space at the hospitals*
- *Ambulatory surgical center*
- *Additional research facilities for basic research*
- *Expand clinical research capacity and facilities*
- *Requirement for expanded Continued Medical Education (CME) and conferencing facilities on campus*
- *Colleges and hospitals need additional space for new teaching technologies and changing accreditation requirements*
- *Need for extended care facilities to relieve acute care beds*
- *Need for affordable short-term living facilites for patients and families*
- *Need more space for ambulatory services, infusions, one-day stay, rehab, skilled nursing facility, teaching space and simulation labs*
- *Need space for off-site faculty practice, simulation labs, research, classsroom and CME*
- *Relocate Neurology*
- *Relocate Admissions & Records out of the Basic Sciences Education Building*
- *Need for Central Records storage facility*
- *Move Psych from 3rd floor, Williams Pavilion (22,000 sq. ft.), for a separate identity*
- *Relocate the Child Study Center*
- *Need additional student housing and accommodations for visiting faculty*



Critical Issues: Internal Constraints to Expansion

Legend
- Active Oil or Gas Well
- Cell Tower
- OG+E Sub-Station
- Active Church
- Community Center
- Day Care / Head Start

Wayfinding
The best system is to make the destination as visible and obvious as possible and that signage systems are there only to reinforce and help.

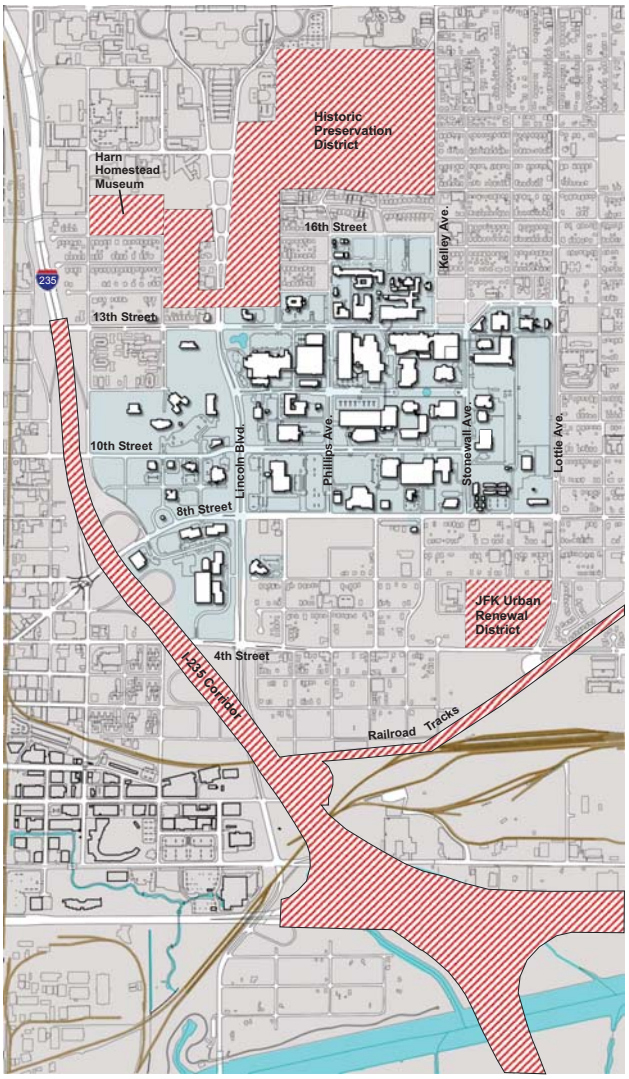
F. Critical Issues, cont'd

- *Need for expansion of Student Union including food service and student activities*
- *Need for an OUHSC Administration Building*
- *Quality of life improvements for students, faculty, and visitors, i.e., restaurants, hotel, retail stores, and campus parks and walking trails*
- *Maintenance of as much green space as possible*
- *Significant expansion of parking for patients, students, faculty, and visitors*
- *Improved traffic management and signage on campus*
- *Better identification & "branding" of OHC and "wayfinding" to the campus and to the entities on campus*
- *Better connections to Bricktown and downtown OKC*
- *Expanded infrastructure on campus to support development and growth*
- *Many buildings need evaluation relative to future viability, i.e., replacement, repurposing or decommissioning*

Ability to Expand. Land availability is among the most critical issues facing growth at the Oklahoma Health Center. Most of the existing institutions are currently planning expansions and/or renovations. Additionally, many institutions are requiring more or different kinds of space to support new technology, new education methods and research. Larger buildings with structured parking have helped accommodate growing demands for more space.

Infrastructure. Health care services and research are both critical services that require dependable utility infrastructure and backup systems to maintain operations in the event of an emergency that results in the loss of normal utility services.

Steam and chilled water are provided from the OUHSC central plant and distributed throughout most of the campus via service tunnels and buried utility lines. Any growth of the campus area would anticipate the extension of these utility lines and eventually additional plant capacity.



Critical Issues: External Constraints

Constraints

- *I-235 visually separates OUHSC from downtown CBD and Bricktown*
- *A strong neighborhood and Historical Preservation District*
- *The Harn Homestead Museum to the northwest*
- *The JFK Urban Renewal District to the southeast*
- *Existing/active churches, daycares and community centers to the south*
- *Active oil and gas wells both north and south of 8th Street*
- *Page Woodson School, currently unoccupied*
- *Railroad tracks at the far south act as barrier*

F. Critical Issues, cont'd

Parking. Access to conveniently located parking that serves the various institutions and individual buildings was the most consistent issue discussed in all of the stakeholder interviews. Oklahoma City is a car oriented city and this is a critical issue for the success and growth of the Health Center. That being said, in the future, public transportation, biking and walking should be encouraged. The revitalization of adjacent residential areas should allow more people to live nearby.

Existing Conditions:

- *Most parkers are assigned to specific facilities; some with reserved spaces*
- *Dark garages, poor signage and wayfinding, not intuitive - elderly have trouble navigating*

Issues:

- *Perceived parking deficiencies (at front door); actual parking surpluses on periphery of campus*

Neighborhood. The OHC has a broad variety of neighbors from upscale and historical residential, commercial, multi-family residential, single-family residential, vacant buildings, lots and blighted areas. It is most important to the success of the Health Center to have viable neighborhoods around it.

This plan will address strategies to both revitalize and stabilize the adjacent neighborhood balance with a plan for responsible growth.

Lottie is a boulevard which has effectively identified the eastern edge of the Health Center since it expanded in the mid 1970's.

This strong expression of the OHC edge has allowed the adjacent residential neighborhood to stabilize and revitalize without the fear that the OHC will expand in that direction.

Neighborhoods to the north of campus have no such border identity and they have a history that shows substantial infringement along NE 13th and NE 14th Streets when OUHSC acquired and occupied many houses during the 1970's and 1980's. OUHSC eventually moved out of these properties, but left indelible and lasting concerns among residents that the neighborhood is vulnerable to encroachment just as it has been in the past.

More recently, the entire block of housing between McMecham and Kelley, from 15th to 16th Streets, was converted to surface parking for the VA Medical Center.

The neighborhoods to the north of campus, between Lindsay and Kelley, and east of Kelley, continue to deteriorate even though portions are designated as a historical district. Some pockets are in a near-blight state. The multi-family housing on Culbertson Drive is currently experiencing another cycle of renewal as they have done in the past.

Identity and Wayfinding. The most effective system of wayfinding should be based on the ability to make a visitor's destination as visible and obvious as possible and that signage systems are there only to reinforce and help. To this end, it is recommended that new development be approached differently from the existing; that new buildings should be located closer to streets and generally occupy the corners of blocks so the building destination is highly visible. The vehicular access to the building should be the front door and parking should then be provided as close as possible to this door but to the side and not in front of the building.

Opportunities for new gateways through iconic buildings, sculptures, arches, etc., should be explored with the campus expansion. Landscaping, lighting and signage systems will be used to establish a distinct "look" to the OHC.

Local Area Roadway Network Issues:

- *Heavy traffic during traditional peak hours, exacerbated by through-traffic on Lincoln Blvd. to/from the State Capitol Complex to the north*
- *Off-peak period traffic signal timing may not be optimized*
- *Existing Phillips and NE 16th Streets are inadequate access/egress routes for the OMRF parking lots and the expanded VA parking lot causing many drivers to use alternate routes thru residential areas*
- *OMRF will double its parking capacity in 2007 with construction of a parking structure*
- *Standing shuttle buses in major traffic lanes impede traffic flow and creates a hazard particularly during peak periods*

Property Access Issues:

- *Many driveways are located in heavy traffic areas and do not have full median access (i.e., left-turn access)*

Wayfinding Issues:

- *No consistent signage / wayfinding scheme*
- *Lack of signage / wayfinding contributes to driver frustration and is not user-friendly*

Access and Circulation. As the appearance of the campus changes over time, a hierarchy of streets will be established utilizing setback lines so the more important and monumental streets have deep setbacks with significant landscaping while buildings on other streets will be located closer to the street. Additional roads and entry points will be necessary as the campus expands. Sufficient and convenient parking will be considered a requirement of every building development. Opportunities for pedestrian connections at grade or in bridges and tunnels will be considered where necessary. Connections to regional bicycle and walking paths will be pursued. Improvements to the public transportation system will be investigated including design recommendations for the future Oklahoma City streetcar line.

Regional Accessibility Issues:

- *Heavy traffic flow to/from freeways during peak hours*
- *Confusing ramping network to/from I-235*
- *Minimal traffic arriving from the east*

G. Guiding Principles

Supporting this vision for the OHC, the Design Team identified six guiding principles that commonly represent attributes of good health care campus design. These principles are universally applicable and provide direction for the OHC Master Plan.

Buffalo Doc

Distinct Identity

- *Creation of a sense of place*
- *More than a collection of buildings*
- *Clear entries and gateways*
- *Identifiable center(s)*
- *Controlled edges*
- *Focused on patient care and healing*
- *Education and teaching*
- *Attracting leading physicians*
- *Contributing to building a great city*
- *Biomedical Research Development*

Encourage Compactness

- *Building massing defines the public realm*
- *Build to the edges*
- *Intuitive front door/parking*
- *Architectural expression at corners*
- *Mid-block garages and connections*

Clear Arrival and Access

- *Gracious and welcoming*
- *Convenient to find and inviting to enter*
- *Gateways that simplify decisions*
- *Vehicular access and parking*
- *Separations of dissimilar traffic*
- *Supports patient and staff needs*
- *Flexible to new opportunities*

Strategic Mix of Uses

- *Leverage the location*
- *Compatible adjacencies*
- *Shared interdependency*
- *Good neighbor*
- *Linked to the region*
- *Reinforce the campus*
- *Enhance the medical community*

Excellent Connectivity

- *Clear hierarchy of flows*
- *Easy access and convenient connections*
- *Intuitive way finding*
- *Multi-level linkages*
- *Service and support not seen*
- *Circulation is intuitive, safe and secure*

Meaningful Open Space

- *Open space and buildings are of equal importance in the design*
- *Contributes to the identity*
- *Public, semi-public and private*
- *Contemplative and communal*
- *Destinations and corridors*
- *Safe, secure and inviting*

Flexibility to Adapt

- *Built on a framework*
- *Allows flexibility of use, flows and open space*
- *Facilitates growth and construction without disruption*
- *Provides an invisible robust infrastructure*
- *Accommodates today's needs and anticipates future development*

Guiding Principles

- Distinct Identity
- Encourage Compactness
- Clear Arrival and Access
- Strategic Mix of Uses
- Excellent Connectivity
- Meaningful Open Space
- Flexibility to Adapt

Chapter 2 – Research and Analysis

A. Overview

The Oklahoma Health Center (OHC) covers more than 325 acres and is one of the largest concentrations of health related services, education and research in the nation, containing 30 federal, state and private entities. It is one of only four academic medical centers in the nation to have seven colleges.

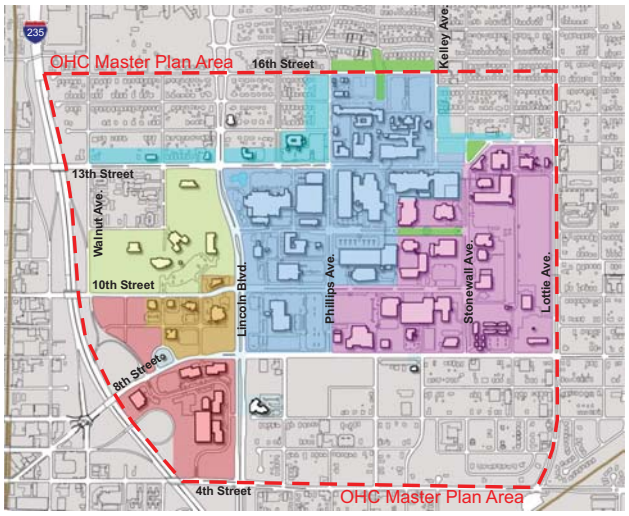
The OHC has almost 8 million square feet of building space, more than 12,500 employees, and 2,950 full-time students. As an economic engine in Oklahoma, the Health Center is second only to Tinker Air Force Base.

As a leading center for advanced health care, the OHC draws patients not only from the entire state of Oklahoma but also from the surrounding six-state region and beyond.

The present Health Center is bounded by I-235 on the west, Lottie Avenue on the east, NE 8th Street on the south, and a stepped boundary on the north ranging from NE 13th Street to NE 16th Street. The Master Plan study area is bounded by I-235 on the west, Lottie Avenue on the east, NE 4th Street on the south, and NE 16th Street on the north.

The campus can be generally characterized as a suburban grid with substantial variety and inconsistency in architecture, density, land use, age and value. It has wide streets with deep setbacks, except in a few locations, and has some significant green spaces, most notably, the Stanton L. Young Walk in the center of the campus.

Site investigations and analyses performed by the design team served as the basis for the master planning process. These analyses help to establish the context and framework to develop planning options.



OHC Location Map

Seed Sower Statue

The design team investigated 12 physical conditions:

- Topography
- Land Use and Ownership
- Zoning Patterns
- Identification of Subdistricts
- Existing Facilities
- Access and Circulation
- Parking Supply
- Infrastructure
- Green Space
- Pedestrian and Bicycle Paths
- Public Transportation
- Demand Factors and Statistical Data

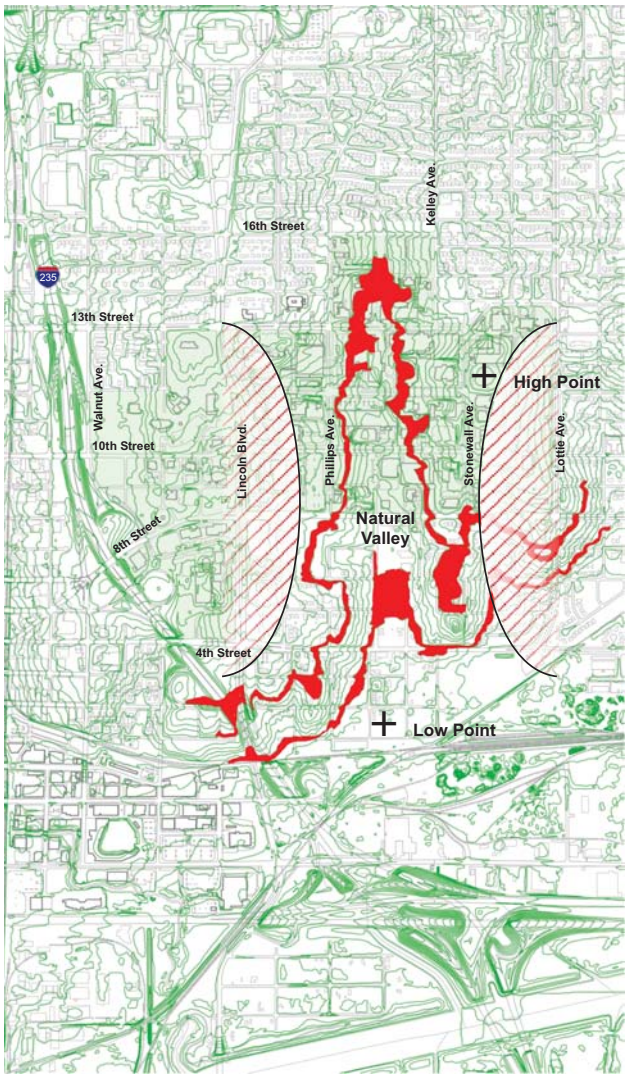
Analyses, drawings and diagrams were created to show the Health Center's existing conditions and those of adjacent areas. Each drawing contains specific information that will influence how the district will be developed. The analyses serve as a basis for the development of conceptual design options presented later in this document.

B. Topography

The topography of the region is characterized as gently sloping, with ridges on the east and west that generally run along Phillips and Stonewall Avenues. Between the ridges is a natural depression providing drainage of the area southward to the Oklahoma River. A difference in elevation of 92-feet exists from the low point at 1st Street and Laird Avenue to the high point near 10th Street and Stonewall Avenue.

Drainage of the watershed runs through the center of the existing OHC campus. Surface water is collected into large box culverts located roughly along the line of Laird Avenue and discharged into an open ditch which drains to the Oklahoma River south of I-40. The drainage system generally works well except during extreme storm events, when surface water overwhelms storm sewer capacity. As a result, the low areas can be subject to flooding.

The natural depression south of 8th Street provides an excellent opportunity to extend the open space and trails from the Oklahoma River Park and highway right-of-way northward into the heart of the campus expansion.



Topographic Map of the Region

C. Land Use and Ownership

Most of the existing campus, along with the State Capitol Complex and the residential neighborhoods between these areas, lie within a special zoning district controlled by the Capitol Medical Center Improvement & Zoning Commission (CMZ) established by state law in 1970. The Oklahoma Health Center campus east of Lincoln Boulevard is zoned HC, Health Center, a special zoning district similar to Central Business District zoning, which allows mixed use facilities, high-rise structures, and has no setback requirements.

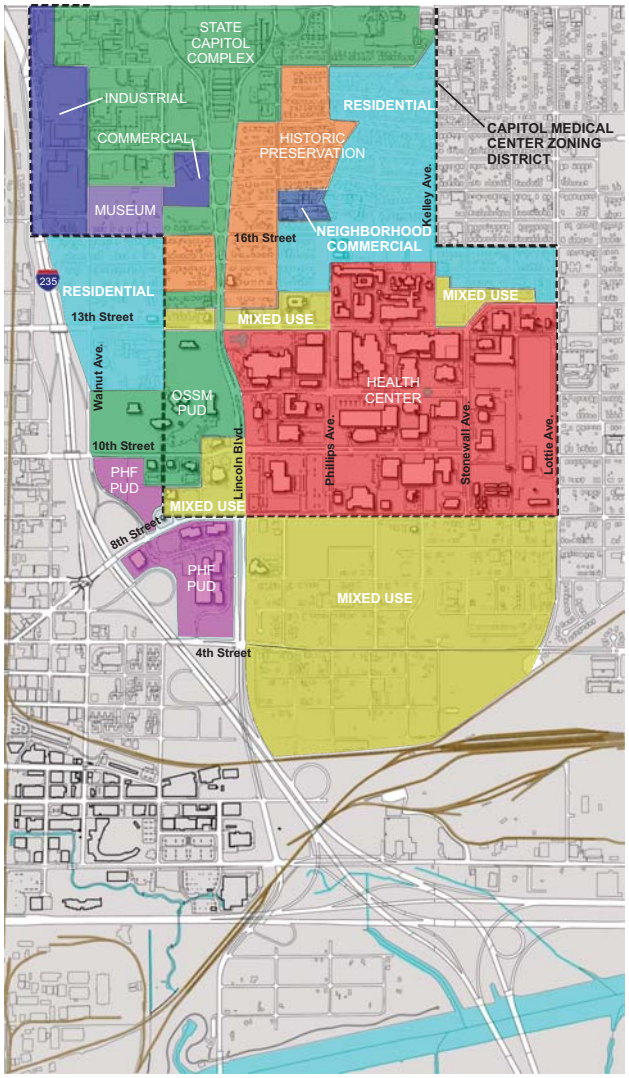
Along the north edges of the OHC, the first half-block residential area is zoned Health Center Commercial or Multi-Family Residential that provides a buffer zone to the adjacent residences. The south half-block along NE 16th from Phillips Avenue to Kelley Avenue is currently zoned Park/Open Space. Much of the residential area along Lincoln Boulevard to the north is designated as a Historical Preservation District which forms a natural boundary that limits growth into that area.

The far northwest corner of the study area contains multi-family residential south of 13th Street and single-family residences to the north, some of which are quite deteriorated. This study uncovered no need or pressure to expand into this district.

Some transition spaces at the Health Center borders remain undefined; one side of a street being multi-story health care structures, and the other side being single-family residences. The narrow, residential street network dates to the 1920's when the area was originally developed.

The eastern edge of the OHC is defined by Lottie Avenue, a landscaped boulevard with medians which forms a good barrier to the adjoining residential neighborhood, constraining the eastward expansion of the Health Center.

The southern edge of the Health Center is NE 8th Street. The area south of NE 8th contains a variety of uses in addition to large tracts of vacant land, most of which is owned by the Urban Renewal. OHC institutions have already extended south of 8th Street with the campus police station, the Red Cross and other land acquisitions.



Existing Conditions: Ownership Categories

Land use and ownership concerns include the following:

- *There is a substantial need for the expansion and growth of the OHC*
- *Large surface parking areas produce inefficient land use patterns*
- *A lower density development pattern than is typical of major urban health centers causes a deficiency in land available for growth*
- *Vacant land south of the Health Center is critical for expansion of the Health Center*

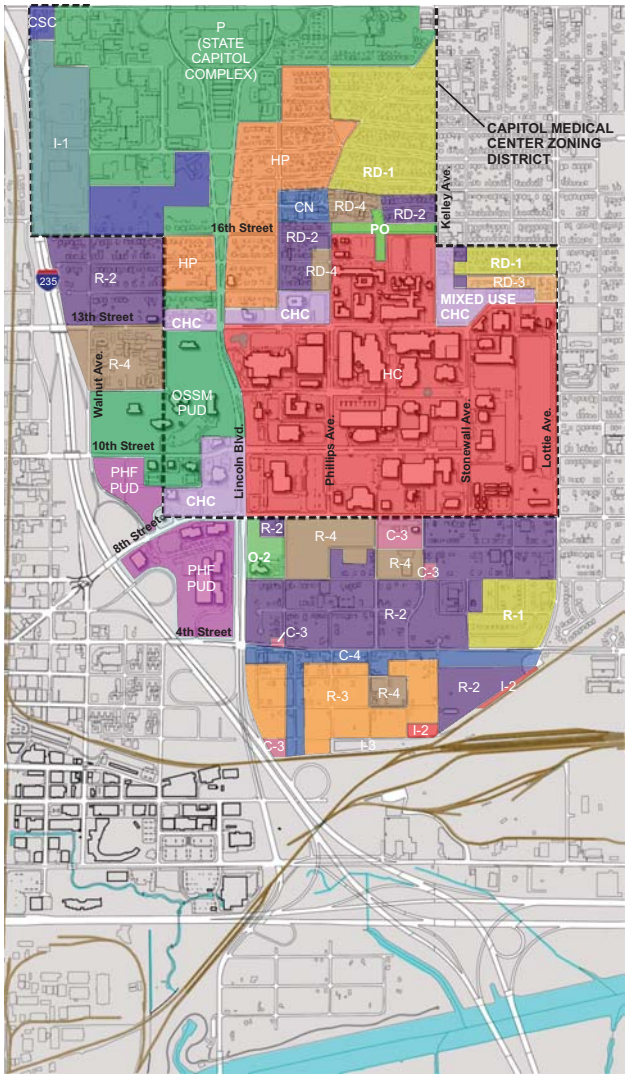
D. Zoning

The State Capitol and Medical Center areas benefit from the dedicated, comprehensive oversight of the Capitol Medical Center Improvement and Zoning District (CMZ). The CMZ is intimately familiar with the unique context, activities, needs and potential of the Oklahoma State Capitol Complex, the Oklahoma Health Center and their neighbors.

The CMZ is a special zoning district established for the Capitol and Medical Center areas by Oklahoma State Law and is administered by a Commission composed of representatives from the Capitol Complex, the Medical Center and the neighboring residential community. CMZ jurisdiction includes all of the current Health Center north of 8th Street and east of Stiles Avenue.

The CMZ is currently in the process of developing new and refined zoning types to accommodate responsible, optimized development in the Medical Center and the surrounding areas.

Zoning for the areas surrounding the CMZ District fall under the Oklahoma City's zoning ordinances. Current Oklahoma City zoning for these areas is predominantly residential, from single-family to medium density, multi-family, with a band of commercial to the south and industrial to the far south and southeast.



Existing Conditions: Zoning

CMZ Zoning Legend

P	Public
PO	Public Open Space
HC	Health Center
HP-1	Historic Preservation
HP-2	Historic Preservation
RD-1	Single-Family Residential
RD-2	Low Density General Residence
RD-3	Low-Rise General Residence
RD-4	General Residential
MXD-1	Mixed Use Overlay Dist. 1 (Health Center Related)
MXD-2	Mixed Use Overlay Dist. 2 (Residential Related)
MXD-3	Mixed Use PUD (Planned Unit Development)
CN	Neighborhood Commercial
CHC	Health Center Commercial
I-1	Industrial
OSSM-PUD	Oklahoma School for Science and Math PUD

PUD = Planned Unit Development Zoning Overlay

OKC Zoning Legend

CMZ	Capitol Medical Center Zoning District
R-1	Single-Family Residential
R-2	Medium Low Density Residential
R-3	Medium Density Residential
R-4	General Residential
C-3	Community Commercial
C-4	General Business (PUD)
O-2	Limited Office
I-1	Light Industrial
I-3	Heavy Industrial
PHF-PUD	Presbyterian Health Foundation PUD
OSSM-PUD	Oklahoma School for Science and Math PUD

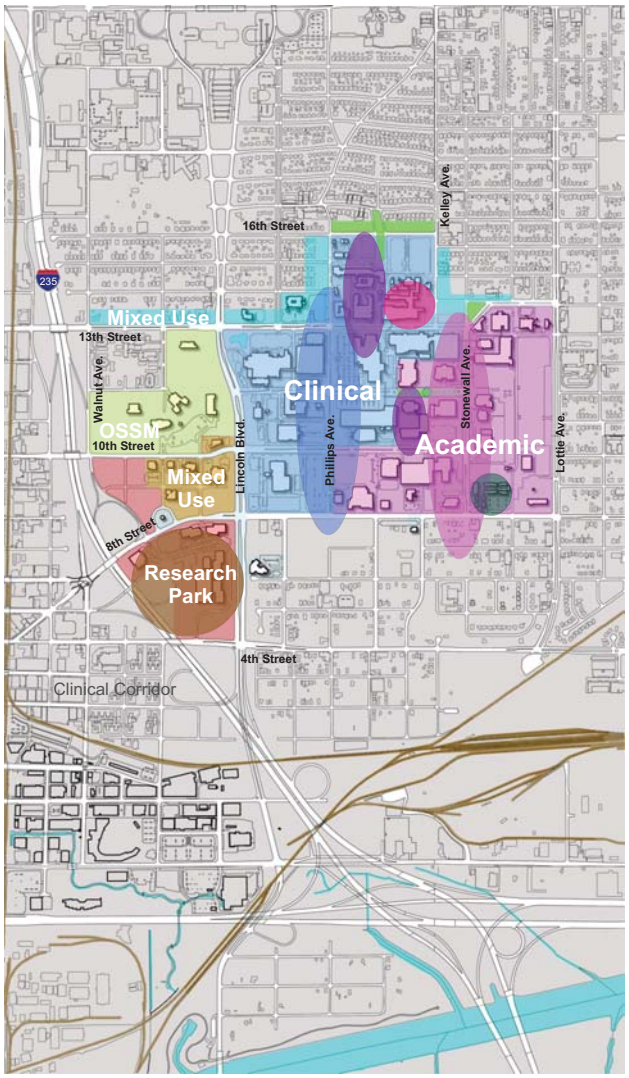
E. Identification of Subdistricts

Clinical Corridor:

Internally, Phillips Avenue is becoming the "Healthcare or Clinical Corridor" with most of the clinical facilities being located on this street. Several facilities provide patients with front door access off Phillips, such as the new Women's and Children's entrances to Everett Tower and the new Pediatric MOB, Oklahoma Cancer Institute and the Oklahoma Diabetes Center. Focusing future clinical development along Phillips is a planning objective of the Master Plan.

Academic Corridor:

Similarly, Stonewall Avenue is emerging as the "Academic Corridor" with the Colleges of Dentistry, Pharmacy, and Nursing; the Library, the Student Union, and the soon-to-be constructed College of Allied Health. Only the College of Public Health will be located off the Academic Corridor after Allied Health occupies their new facility. Interview responses identified this separation from student services and recreation as a real burden to students because walking distances are too great in student's limited time blocks and availability of convenient parking is unreliable.

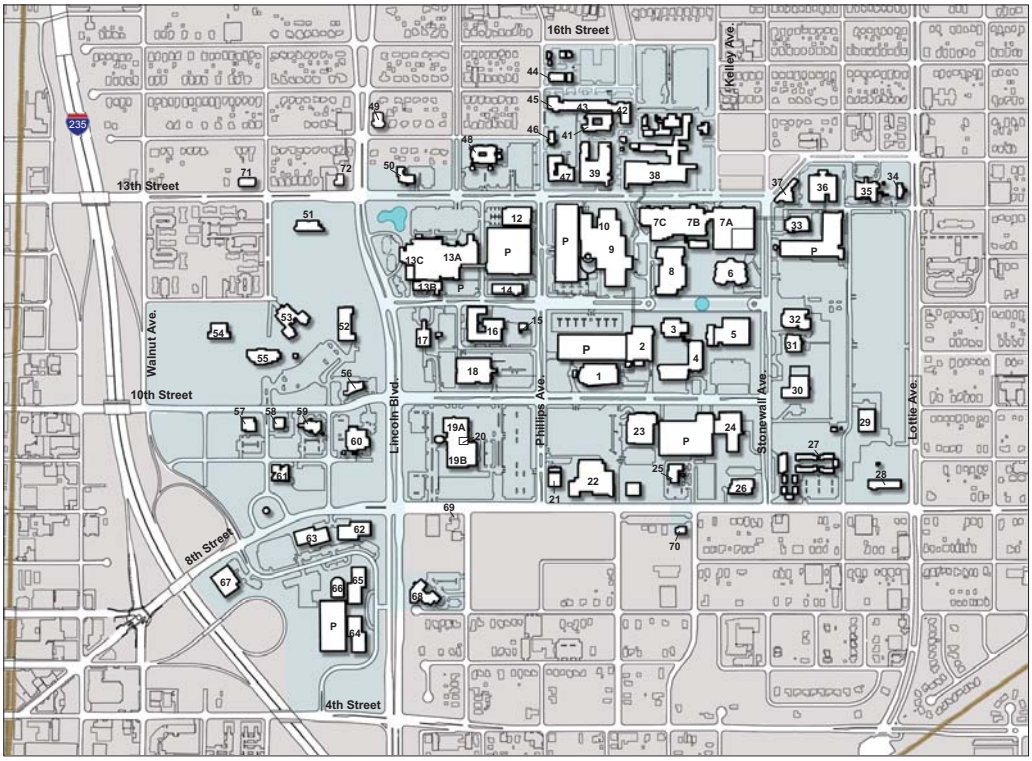


Existing Conditions: Sub-districts

Principal Sub-districts Legend

- Clinical Corridor
- Academic Corridor
- Basic Research District
- Translational Research District
- Veterans Affairs District
- Student Housing

F. Existing Facilities



Map of Existing Facilities

Building Legend

1. OU Physicians Building - OUHSC
2. Williams Pavilion - OUHSC
3. Biomedical Sciences Building - OUHSC
4. Stanton L. Young Biomedical Research Center - OUHSC
5. Robert M. Bird Health Sciences Library - OUHSC
6. Dental Clinical Sciences Building - OUHSC

7A. Nicholson Tower - OUMC
7B. Bielstein Tower - OUMC
7C. Garrison Tower - OUMC

8. Basic Sciences Education Building - OUHSC
9. Everett Tower - OUMC
10. North Pavilion - OUMC
11. Not Used
12. Oklahoma Allergy Clinic

13A. Presbyterian Tower - OUMC
13B. Presbyterian Ambulatory Surgery - OUMC
13C. Trauma Center - OUMC

14. Presbyterian Professional Office Building - OUMC
15. Motor Pool - OUHSC
16. Service Center Building - OUHSC
17. Dean A. McGee Eye Institute
18. Oklahoma City Clinic

19A. Center for Healthy Living, Medical Office Building - OUMC
19B. Center for Healthy Living, Fitness Center - OUMC

20. McGee Eye Surgery Center - DMEI
21. Don E. Hogg Greenhouse - OUHSC
22. Steam & Chilled Water Plant - OUHSC
23. Family Medicine Center - OUHSC
24. Oklahoma State Department of Health
25. DAVITA - Dialysis Center
26. Oklahoma State Medical Examiner
27. University Village - OUHSC
28. DHS Service Center
29. Resource Annex - OUHSC
30. College of Nursing - OUHSC
31. Student Union - OUHSC
32. College of Pharmacy - OUHSC
33. M.I.D. Building - DHS
34. Pauline Mayor Group Home - DHS
35. Oklahoma State Department of Mental Health and Substance Abuse
36. O'Donoghue Research Building - OUHSC
37. Child Study Center - OUHSC
38. Veterans Affairs Medical Center
39. Chapman Building - OMRF
40. Not Used
41. John W. Keys Speech & Hearing Center - OUHSC
42. William H. Bell Building - OMRF
43. Acree-Woodworth-Massman Building - OMRF
44. Allied Health Practice Center / OATC - OUHSC
45. Rogers Office Building - OUHSC
46. Televised Instruction Facility - OSRHE
47. College of Health Building - OUHSC
48. Easter Seals Adult & Child Care
49. Faculty House - OUHSC
50. Dermatology Clinic - OUHSC
51. The Samson Science and Discovery Center - OSSM
52. Academic Center - OSSM
53. Dan Little Residence Hall - OSSM
54. Physical Education Building - OSSM
55. Senator Bernice Shedrick Library - OSSM
56. First Bank
57. Oklahoma State Chamber of Commerce
58. Ratcliffe's Bookstore
59. Focus Federal Credit Union
60. Sylvan N. Goldman Oklahoma Blood Institute
61. Oklahoma Department of Commerce
62. PHF Research Park Building 1
63. PHF Research Park Building 2
64. PHF Research Park Building 3
65. PHF Research Park Building 4
66. PHF Research Park Building 5
67. PHF Research Park Building 6
68. American Red Cross
69. Fire Station
70. Campus Police Facility - OUHSC
71. Oklahoma Dental Association
72. Oklahoma Council for Public Affairs

P Parking Structure

Summary: (Ref. Appendix A)	**Existing Buildings & Parking Supply**
Surface Parking Spaces	9,027
Structured Parking Spaces	8,197
Parking Total	17,224
Building Area, GSF	7,760,985

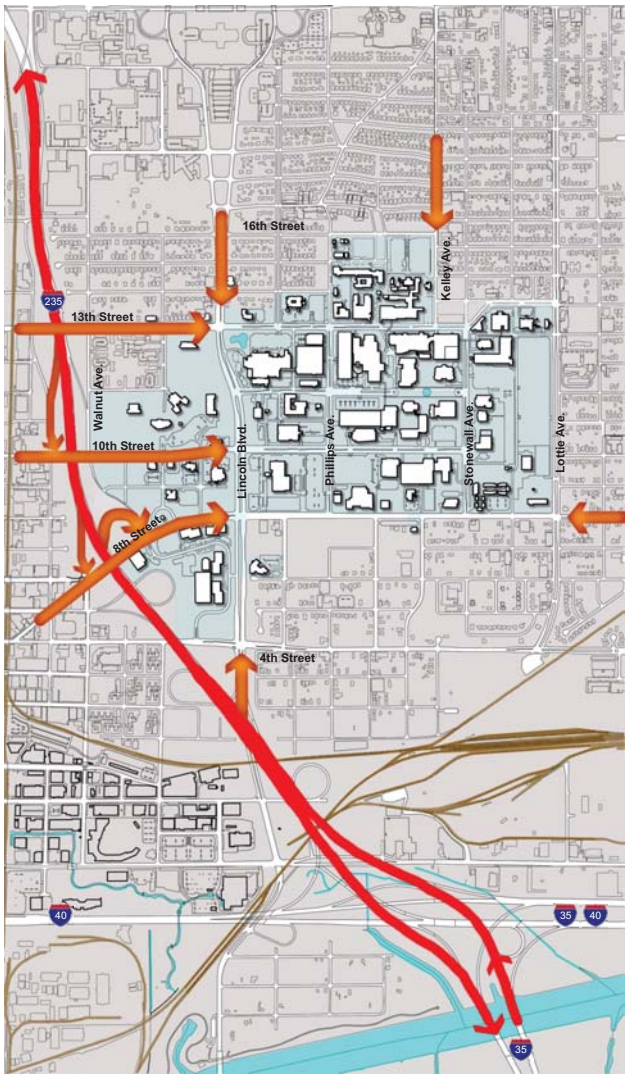
G. Access / Circulation

The street system functions with relatively manageable traffic volumes, however there is congestion at peak times because Lincoln Blvd is also the route for northbound and southbound State Capitol traffic. This traffic adds a substantial burden through the Health Center Campus and is the principal source of slowdowns and delays that are experienced today.

The vast majority of vehicles arriving and leaving the Health Center utilize the I-235 and Lincoln Boulevard corridors on the west and feed into the campus interior via the east-west arterial streets, NE 13th, NE 10th, and NE 8th streets. As OHC expands southward, NE 4th Street will become more important east-west access route serving the campus. Direct I-235 access is provided via NE 10th and NE 8th streets; while NE 13th and NE 4th streets do not directly access the freeway, they are still major thoroughfares providing important connections to downtown Oklahoma City and other regional areas. NE 10th Street terminates in the campus at Stonewall Avenue but continues east of Lottie Avenue. East of the campus, NE 8th Street merges with NE 10th Street and intersects I-35, approximately 1 ½ miles to the east. The design team recommends that this corridor be strengthened as an access route. Negotiation with the ODOT is also recommended to improve the freeway signage at this and other surrounding freeway access points that are underutilized as access point to the campus.

As OHC expands southward, NE 4th Street will become more important as an access to the campus, both to and from downtown, and to and from the east. Interconnecting 4th Street to the west I-35 frontage road south of 10th Street will enhance the use of NE 4th to access the Health Center.

Access from the north and near northwest is primarily via I-235, however, Lincoln Boulevard carries a significant share. Until recently, the I-235 exit to NE 10th Street carried the entire Health Center burden. The newly expanded and now opened southbound I-235 exit to Harrison-Walnut provides new access to the Health Center via Harrison-8th Street. This will relieve some of the pressure on 10th Street, particularly as the campus grows to the south.



Existing Conditions: Access and Circulation

Principal streets within OHC

- Lincoln is a 6-lane boulevard (US Highway 77 and State Highway 107)
- Stonewall Avenue and Lottie Avenue are 4-lane boulevards
- Phillips is a 4-lane boulevard from NE 8th Street to NE 13th Street, and a 2-lane street north of 13th Street
- Kelley Avenue is a 2-lane street north of 13th Street
- Walnut is a 2-lane frontage road on the east side of I-235 and is one-way northbound
- NE 10th Street is a 6-lane boulevard from Lincoln Boulevard to Stonewall Avenue and a 4-lane street elsewhere
- Stanton L. Young and NE 13th Street are 4-lane boulevards
- NE 8th Street is a 4-lane boulevard from Lincoln Boulevard to Phillips Avenue, and a 4-lane street elsewhere
- NE 4th Street to the south is a 4-lane arterial street

G. Access / Circulation, cont'd.

Existing Conditions: Stanton L. Young Blvd. at Lincoln Blvd.

Each day, large volumes of northbound commuters exit I-235 to northbound Lincoln Boulevard accessing the Health Center or traveling through to the State Capitol offices to the north. Likewise, southbound Lincoln Boulevard traffic from the Health Center and Capitol Complex accessing southbound I-235 south of 4th Street is substantial, even in the middle of the day. As the OHC campus grows with a near doubling of the number of vehicles accessing the Health Center, the Design Team believes Lincoln Boulevard may be heading for gridlock unless opportunities to reduce the through-traffic to and from the Capitol Complex are found and adopted. One such opportunity is opening a new entrance and exit in the vicinity of NE 16th Street that serves the Capitol Complex more directly and conveniently than the current 23rd Street entrance/exit, or the Lincoln/southbound entrance ramp at NE 4th Street.

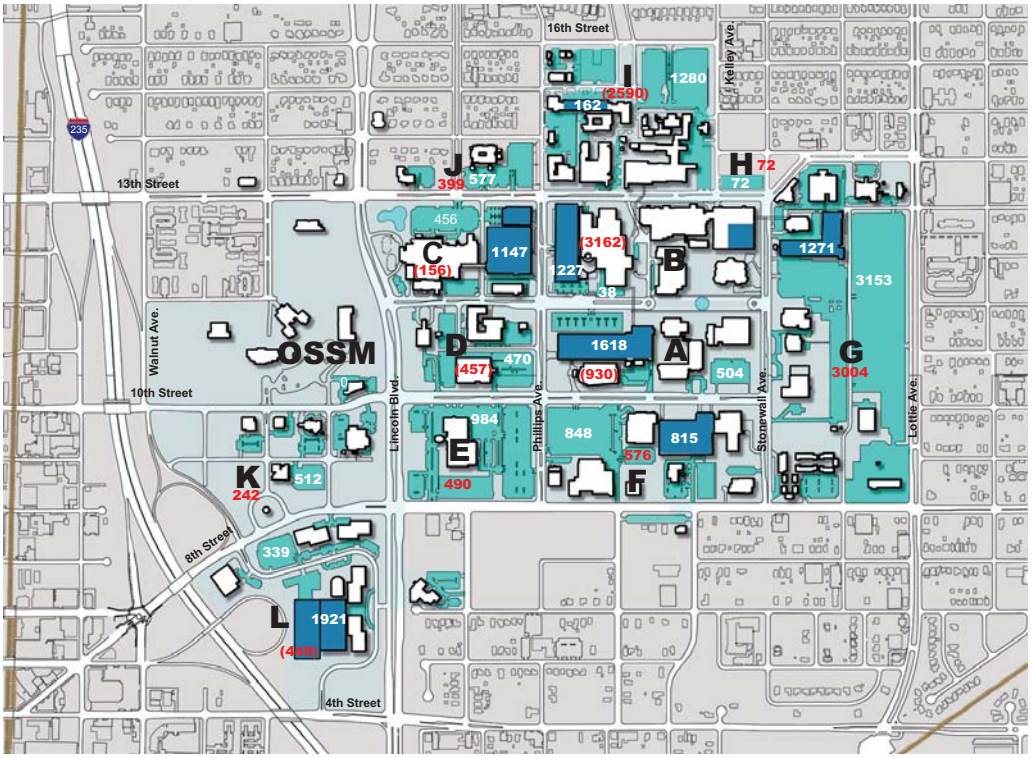
Lottie Avenue on the eastern edge of campus also provides an important north-south route, however this roadway is generally underutilized by campus traffic since it currently does not connect directly to the I-235 corridor. Lottie will become far more important as an access route when the two 150 car garages are completed, one in the next 5 years and the other within 10 years. OHC should support local long-range planning opportunities to extend Lottie Avenue to the south to interface with other major thoroughfares to improve accessibility of the campus.

Conflicts and concerns with regard to access and circulation include:

- *While the I-235 expressway provides major access pathways to the Health Center, certain ramp systems remain limited in their service to the Health Center and Capitol Complex, particularly the southbound ramp at 4th Street, the northbound ramp to Harrison/Walnut, and the lack of northbound access to 10th Street.*
- *Inability of Capitol Complex traffic to effectively and efficiently access the interstate system without having to travel through the Health Center via Lincoln Boulevard. Lincoln may be heading for gridlock during rush-hours unless opportunities to reduce the through-traffic to and from the Capitol Complex are created and implemented.*
- *East-west movement between I-235 and the Health Center and Capitol Complex, is less than optimal due to interchange location and design.*
- *East-west circulation on the east side of the Health Center is discontinuous except for 8th Street, which connects with 10th Street just east of campus and eventually to I-35 further east.*
- *Connections to Bricktown are limited, especially from the east side of the campus.*
- *Connection of Lincoln Boulevard to the new I-40 Boulevard is circuitous and counter-intuitive as currently planned.*
- *Way-finding within the internal street system is confusing for the new or occasional visitor and particularly for the elderly; building entrances are often not visible from a distance nor are visitor parking areas; and the current directional signage system is inadequate adding to the chaos.*
- *Congestion on Lincoln Boulevard occurs not only during rush-hour periods but also at other times such as the noon hour and mid-afternoon on the southbound lane exiting to the I-235 ramp. Campus Police report the highest incidence of accidents occur on Lincoln Boulevard between 4th and 8th Streets, in both directions.*
- *Access from I-235 to Lottie Avenue and the east side of campus is limited to NE 8th Street.*

Existing Conditions: NE 8th Street Looking East

H. Parking Supply



Existing Parking Supply

With 30 entities on campus and no central management strategy, the state of OHC parking can be generally described as uncoordinated, inconvenient, inconsistant, and widely considered inadequate. It leaves a poor first impression to campus patients and visitors at more than a few locations.

The most common and consistent comments from the interview sessions were related to parking, i.e., insufficient parking at the times needed, not convenient to the destination, a shuttle service that does not run on a time schedule, and a shuttle driver policy that does not maintain a schedule. Some comments may indicate a lack of knowledge of the shuttle routes and schedules in place.

At various times in the past, efforts to unify campus parking have been unsuccessful because of the positions taken by individual agencies and institutions. Facing major growth as identified in this plan, now is the time to focus new energies toward cooperative, pro-active resolution of parking issues on a campus-wide basis with all entities participating.

Legend: (All figures are superblock totals)

000 Surface Parking Supply
000 Structured Parking Supply
(000) Shortfall of Spaces
000 Excess of Spaces

Summary: Existing Buildings & Parking Supply

		PARKING SUPPLY		PARKING TARGET	
BLOCK	EXISTING BUILDING GSF	EXISTING SURFACE PARKING Spaces	EXISTING STRUCT'RD PARKING Spaces	PARKING TARGET @ 2.5 sp per 1000 gsf *	PARKING EXCESS (SHORTFALL)
A	1,220,798	504	1,618	3,052	(930)
B	1,770,810	38	1,227	4,427	(3,162)
C	703,700	456	1,147	1,759	(156)
D	370,752	470	-	927	(457)
E	197,605	984	-	494	490
F	434,861	848	815	1,087	576
G	546,225	3,153	1,271	1,420	3,004
H	-	72	-	-	72
I	1,612,658	1,280	162	4,032	(2,590)
J	71,040	577	-	178	399
OSSM	-	-			
K	108,000	512	-	270	242
L	724,536	339	1,921	1,811	449
	7,760,985	**9,197**	**8,197**	**19,457**	**(2,063)**
		Total Existing Parking Supply	**17,394**		

Notes:

1. Parking ratios used for computing the Target Parking Requirements are established by the Parking Consultant at the rate of 2.5 spaces per 1,000 square feet of building area.
2. Negative values for Target Parking indicate a shortfall of spaces and positive values indicate an excess of spaces.

H. Parking Supply, cont'd.

As seen in the map on the previous page, a huge proportion of the campus is devoted to surface parking. This is a luxury of the past when sufficient land was available nearby and was relatively inexpensive. This era has passed and OHC can no longer afford to retain large expanses of surface parking, nor can they afford a parking place for everyone near the front door. This land is far more valuable for building sites or structured high-density parking facilities. Today, there are no more large blocks of land nearby, therefore structured parking will be a principal strategy for providing the required parking capacity as OHC continues to grow.

The interview process has identified some 2,700,000 square feet of new facility development which needs to occur within the core campus area east of Phillips Avenue. Almost all of these new buildings will be constructed on existing surface lots. This both displaces the parking for the short-term during construction and requires permanent replacement parking for the long-term, resulting in the need for another 800,000 square feet of structured parking in the same vicinity.

As the density of buildings grow, it will be impossible to provide all needed parking at or adjacent to each building. Consequently, use of perimeter parking structures and shuttle services for large numbers of students, employees and staff is a necessary strategy.

The Late Schedule Syndrome: In large clinical settings, delays that commonly occur in the patient appointment schedule typically have a cumulative and devastating impact on parking. Early appointments have not vacated parking spaces needed by later appointments; and early arrivals of later appointments inadvertently compound the impact even further. Additional patient parking spaces are necessary to accommodate late-running schedules and peak use periods.

Target Parking Requirements.

Due to the constant changes in the field of medicine, the parking needs of an academic medical center are very complex on a microscopic level. However, from the master planning perspective, parking needs can and should be simplified.

Currently, the campus as a whole has a parking supply of 17,300 spaces. With a total of 7,782,861 square feet (SF) of building area, this computes to 2.24 spaces per 1,000 SF of building area. For purposes of this analysis, given the feedback received during the interview process and knowing the automobile-oriented nature of the region, the Design Team recommends that the overall parking supply be increased to provide 2.5 spaces per 1,000 square feet of building area. For the existing campus, this computes to a target parking supply of 19,400 spaces, or a campus-wide deficiency of 2,100 parking spaces. More significantly, the theoretical parking deficiency for the districts east of Lincoln Boulevard is 2,700 parking spaces.

On a more detailed level, the Design Team's Parking Consultant recommends parking rates for certain general land uses as described in the table "Recommended Parking Rates for OHC".

While it may not be possible to provide parking for each individual development on the same (or immediately adjacent) site, it is highly recommended that parking facilities be provided within a convenient walking distance to the most feasible degree possible. When parking for a development cannot be provided in close proximity, various strategies should be implemented to reduce the effective walking distance. Providing a visual line-of-sight between parking facilities and the corresponding destination, enhancing landscape and hardscape, minimizing the need for stairs and street crossings are some of these strategies. Constructing pedestrian bridges and tunnels may also be warranted in some cases.

Selective joint-use, e.g., staff and students, etc., and institutionally-shared parking facilities will increase efficiency; and, a coordinated/consolidated (inter-institution) parking fee structure is also an effective way to manage parking demands and facilities. Reduced-rate remote parking (for staff and students) is an ideal strategy in a large, institutional environment.

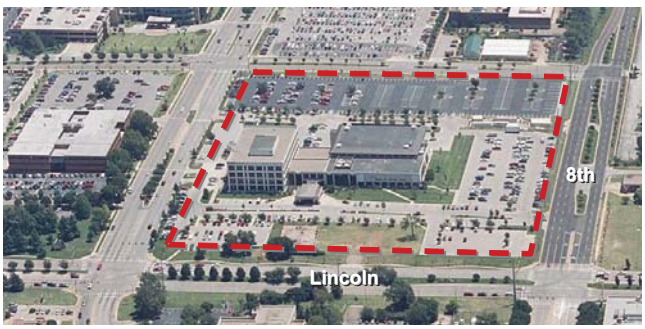
Parking is a serious and immediate issue that must be dealt with in a positive, pro-active manner as new facilities are planned and constructed. We recommend the parking supply be increased incrementally in both the near-term and mid-term to achieve a balance of actual spaces and target spaces; that the structured parking facilities be constructed in the east parking lot between Everest and Lottie Avenue with major entrances off Lottie; and the first unit of not less than 1,500 spaces be completed before the end of 2009.

Not only is there a substantial shortfall in the parking supply, the imminent start of construction on the new College of Allied Health facility will displace 300 spaces, and construction of the Oklahoma Cancer Institute, starting in late 2007, will displace another 500 spaces. There is no space available on campus to provide temporary parking of this magnitude, therefore, temporary spaces will need to be provided off-campus for both projects; most likely, temporary parking will be located south of 8th Street.

Recommended Parking Rates for OHC:

Outpatient Medical Use	(Clinic)	1 space per 200 GSF
Outpatient Medical Use	(Medical Office Building) (Patient Parking Only)	1 space per 250 GSF 1 space per 333 GSF
Academic / Educational	(Academic / Offices / Support) (Student Parking Only)	1 space per 200 GSF** 1 space per 250 GSF
Medical Research	(Laboratory / Support)	1 space per 500 GSF
General Office	(Administrative)	1 space per 350 GSF

GSF = gross square feet of building area



Large expanses of surface parking

I. Infrastructure

The local electrical utility, OG+E, furnishes primary service from two sub-stations with automatic switch-over for critical users such as hospitals. Many other institutions are provided with manual switches to restore their service from the alternate source as soon as possible. Emergency and backup power generation is provided at the individual facilities requiring such power.

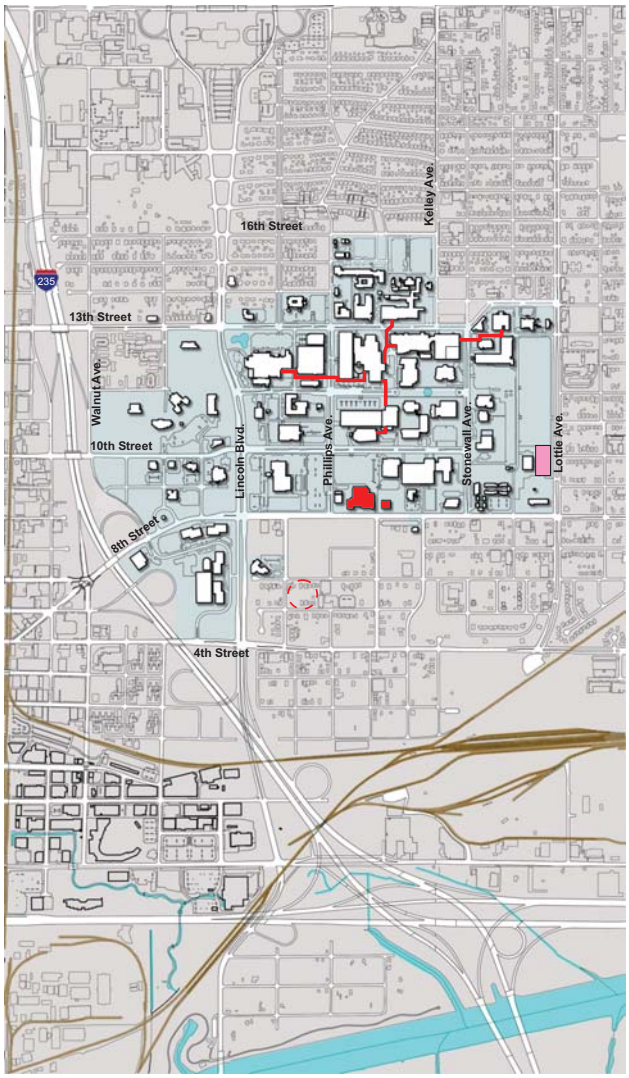
OG+E has committed to replacing their remaining overhead distribution lines with underground lines, and installing all future lines underground, as projects are constructed.

Natural gas service, from Oklahoma Natural Gas, has been most consistent over the years. Many facilities use natural gas as the fuel source for their emergency generators because of this reliability.

Water and sewer are provided by the City of Oklahoma City. OHC lies on the service border of two water treatment plants. This has proven beneficial in the past when major distribution lines have ruptured in one system, but the Health Center continued to have water supplied from the other although the pressure was low.

OUHSC is studying the feasibility of a second Steam and Chilled Water Plant to provide services to the new developments south of 8th Street. More importantly, this plant would interconnect with the existing plant to provide critical back-up capacity for health care and research users in the event of equipment failure or maintenance down-time.

As infill of the Health Center core areas occur, the deliverable capacity of each utility must be confirmed with each project. This will be particularly critical in the transition areas south of 8th Street since the existing utility infrastructure was designed and installed for residential usage.



Existing Infrastructure

Legend

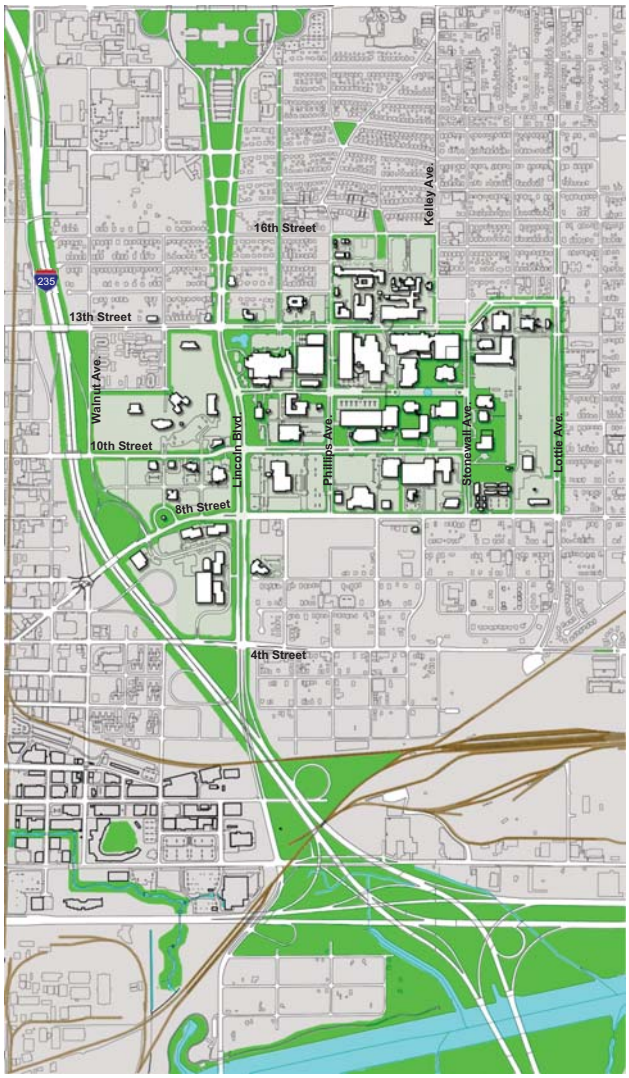
- Existing Skybridges
- OUHSC Steam & Chilled Water Plant
- OG+E Substation
- Potential Vicinity for new OUHSC Steam & Chilled Water Plants

J. Green Space

Green space consists of land dedicated to planting areas using native grasses, flowers, shrubs, and trees along with other amenities that enhance human use and enjoyment. Currently the campus has many small green space gardens and landscaped areas, however, many are not linked visually or physically in many cases. Maps for the garden areas around the Stanton L. Young Walk are available but are not widely distributed.

Develop Green Space by:

- *Strengthening the landscape character on the major streets*
- *Supporting landscaped and shaded campus sidewalks, streets and boulevards*
- *Creating landscaped setbacks from all residential areas*
- *Identifying park areas and therapeutic gardens within each district*
- *Connecting and extending the existing open spaces*
- *Creating vistas of green space through the campus*



Campus Greenspace

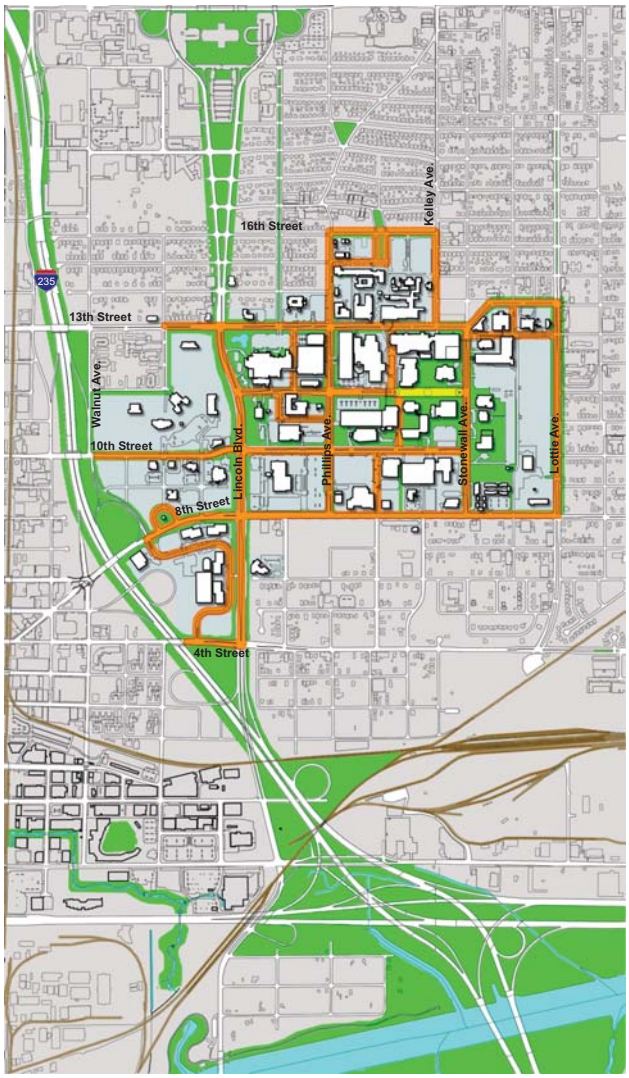
K. Pedestrian & Bicycle Paths

Other than the Stanton L. Young Walk and contiguous garden areas, the campus has no existing organized pedestrian and/or bicycle path design. Bicyclists are encouraged to travel on the street or, where available, bicycle-designated facilities. Mixing bicycle and pedestrian traffic is discouraged due to the safety hazard posed to pedestrians.

Where sufficient street-width exists, it is recommended that designed bicycle lanes be considered. Providing bicycle racks and lockers and showering facilities at strategic locations is also recommended in order to facilitate transportation by bicycle. It should also be considered to establish bicycle-based police patrol on the campus.

Providing a comprehensive, well-maintained sidewalk system network is essential. But, appropriate street furniture, landscaping, and hardscaping of pedestrian corridors will invite foot traffic and invigorate the street-level environment of the campus.

Creating well-lighted pedestrian corridors through major surface parking will increase personal security and safety. Properly designed and located street crosswalks (and pedestrian signal heads at traffic-signal-controlled intersections) is also recommended.



Existing Sidewalks

Legend

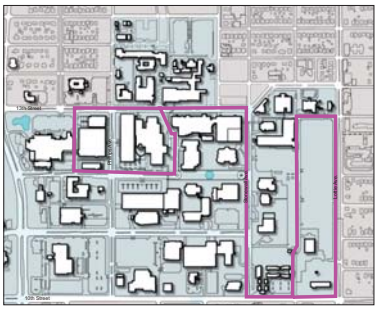
- **Stanton L. Young Walk**
- **Streets with Existing Sidewalks**
- **Existing Green Space**

L. Public Transportation

The OHC is presently served with several regularly scheduled Metro Transit bus routes with numerous stops. Several stops have shelters for protection against the weather. Overall ridership of the buses is quite low.

Internally, the campus is served by four shuttle routes connecting peripheral parking with principal destinations. These shuttles are operated by OU Parking and Transportation.

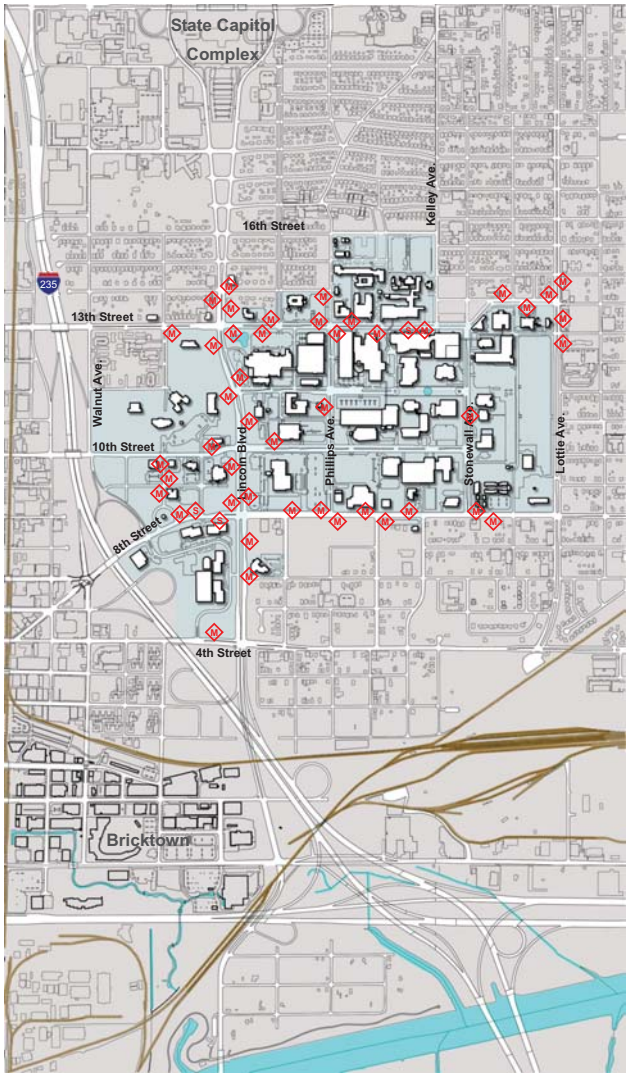
Campus Shuttle - West Route



Campus Shuttle - Central Route

Campus Shuttle - Crayon Route

Campus Shuttle - VA Route



Existing Metro Transit Bus Stops
(Map scale is too small to show bus routes clearly)

Metro Bus Stop
Metro Bus Stop with Shelter

Issues:

- *Standing shuttles block traffic lanes, particularly dangerous during rush hours*
- *Shuttle routes and timetables are unavailable at stops*

Recommendations include:

- *Provide "off-street bus loading lanes" at route starting points and key loading points*
- *Post routes and timetables at all shuttle stops*

Chapter 3 – Master Plan

A. Design Principles

The process for refining concepts toward a master plan is dynamic and interactive. Broad principles and concepts were repeatedly tested and evaluated with critical input from the Management Team and Project Advisory Group, narrowing the range of feasible options toward the consensus solution.

1. Patient Care Comes First

- Focus on patient care and healing
- Focus on the physical attributes of the campus
- Support education and teaching
- Attract leading physicians and researchers

2. Promote Interaction

- Encourage mix of uses
- Provide common areas of interactive use
- Allow for flexible buildings to adapt to multiple users and changes of use over time

3. Encourage Compactness

- Maximize adjacencies of related users
- Promote in-fill within existing core of campus
- Provide form-based guidelines to describe developments
- Leverage the location and interdependency
- Respect neighbors – within and outside the OHC
- Reinforce the concept of campus or neighborhood
- Enhance the greater medical community

4. Provide Clear Hierarchy of Access and Circulation

- Be gracious and welcoming
- Make destinations convenient to find and inviting to enter
- Create gateways that simplify decisions
- Provide convenient and intuitive vehicular access and parking
- Prioritize separations of dissimilar traffic patterns and users
- Support patient and staff needs
- Screen service and support activities

5. Develop Welcoming, Efficient and Easy to Use Parking

- Locate at perimeter of campus to minimize conflicts with pedestrians
- Locate entries in easy to find, intuitive locations
- Locate entries adjacent to final destinations

6. Create a Meaningful System of Usable Open Space

- Utilize building orientation to clarify wayfinding
- Create new open space as stimulus for reinvestment
- Consider open space and buildings as equal importance in the campus design
- Use open space to contribute to the identity
- Encourage mix of quality public, semi public and private open space
- Provide contemplative and communal spaces
- Utilize open space as destinations and transitions
- Design open space to be safe, secure and inviting

7. Determine Appropriate Development Strategies at Campus Edges

- Be a good neighbor to adjacent neighborhoods
- Stimulate reinvestment in adjacent communities
- Provide clear entries, edges and gateways to OHC campus to promote adjacent neighborhood stability

8. Provide a Framework of Infrastructure to Allow Flexibility to Adapt to Change Over Time

- Built on an infrastructure and land use framework plan to allow flexibility of use
- Facilitate growth and construction without disruption
- Provide invisible but robust infrastructure
- Accommodate today's needs while anticipating future changes

9. Encourage Renewed Emphasis on Low Impact Development and Building a Sustainable Environment

- Utilize natural systems
- Require low impact development guidelines
- Encourage use of transit systems

Molly Shi Boren Courtyard

B. Opportunities & Constraints

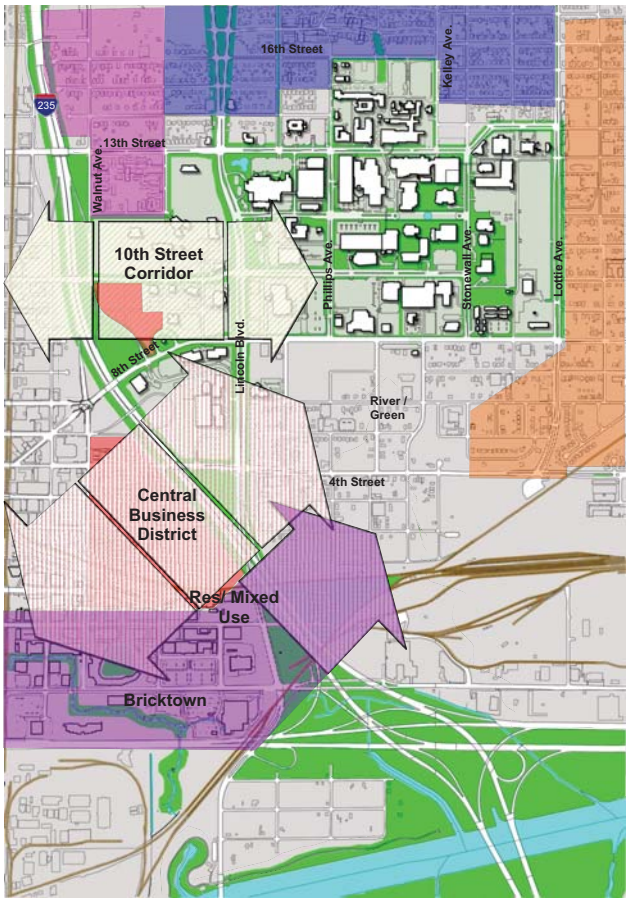
Expansion of the Oklahoma Health Center will continue to refine the character, image and economy of Oklahoma City. The cumulative developments made by the various OHC institutions will amount to a substantially large investment in the future of the City and the region. The more these developments can be strategically coordinated, with shared efficiencies and maximized land use potential, the more they will benefit from symbiotic relationships and the greater their combined impact will be upon the City. The OHC Master Plan identifies these ambitious opportunities and frames them within the context of the district's development challenges and constraints.

Opportunities:

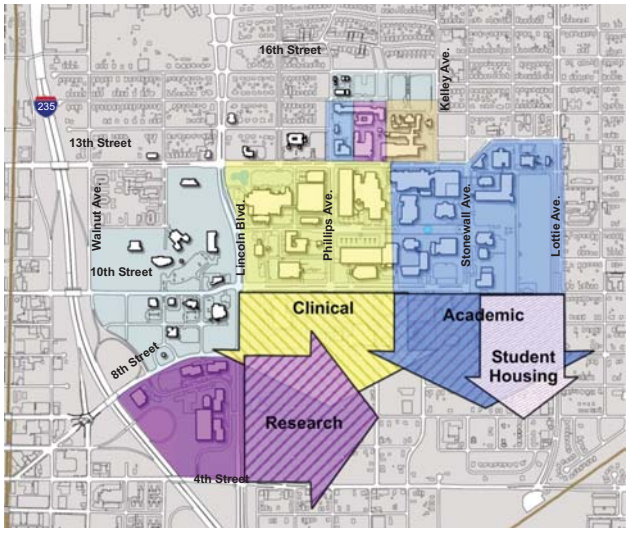
- *Foundation of a great urban medical campus is in place*
- *Physical adjacencies and organizational structures are in position to improve mutually beneficial relationships*
- *Diversity of institutions ensures long-term flexibility and adaptability to changes in the health care industry*
- *OHC has high-level support across district institutions of project goals*
- *Following popular MAPs, the Oklahoma City community has had recent success implementing ambitious projects that have demonstrated positive impacts on the region*

Constraints:

- *Neighborhoods (to the north and east) and interstate rights-of-way (to the west and south) define physical limits to potential district expansion*
- *As institutions expand, land availability is becoming increasingly scarce and costly*
- *Land scarcity has significant cost implications such as need for structured parking, higher density and inflexible expansion options*
- *Limited parking and roadway capacity may require alternative modes of transportation to service OHC district*
- *Potential expansion areas south of 8th Street include existing residences, churches and other structures*
- *Much of the district's growth opportunity has existing infrastructure that dates to when the area was a residential neighborhood and may be inadequate for medical center uses*
- *N.E. 13th and 4th streets have no access to or from I-235*



Leverage Adjacencies



Internal Growth Pressures

C. Concept Alternatives

Growth and redevelopment in the OHC can follow a variety of paths. However, the process of evaluating viable alternatives is intended to result in a single strategy that will help the OHC realize its short-term goals and plan for the gradual implementation of long-term goals.

The Design Team developed three concept alternatives. Each represent a viable strategy for growth and redevelopment. In each scheme, there is a different pattern that balances density with open space and allows growth to happen in predictable ways, resulting in a unique overall district identity.

Following evaluation of these three alternatives, the recommended alternative was developed as a hybrid between them, incorporating the strongest aspects of each alternative into an optimal growth strategy for the Oklahoma Health Center.

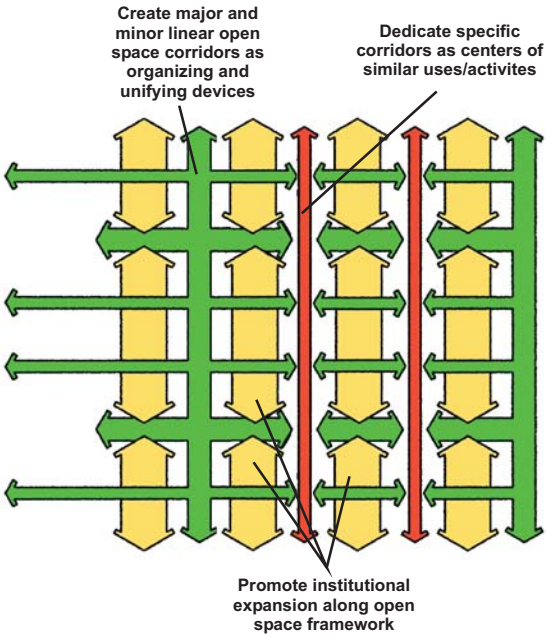
Alternative A: Corridors + Campuses

Building upon the strengths of what already exists, the "Corridors + Campuses" alternative would reorganize the existing corridors throughout the OHC area as campus centers, boulevards and activity centers. Over time, the district would become a series of small campuses linked by broad open space corridors and dense corridors alive with activity.

Most streets would continue to function as they do now, as a network of open space that links the various institutions within the district together.

Streets that remain open would maintain deep setbacks and quality landscaping. Building upon the precedent of the Stanton L. Young Walk, it is feasible some streets could be closed or scaled down to create large, contiguous open spaces around which buildings could be arranged as a campus.

Phillips and Stonewall Avenues would be redeveloped over time at a higher density, targeting specific activities - Phillips Avenue would become the backbone of clinical and research activity and Stonewall Avenue the backbone of academic activity. These two "main streets" would become the primary addresses for OHC institutions, providing visitors an understandable means to navigate the district.

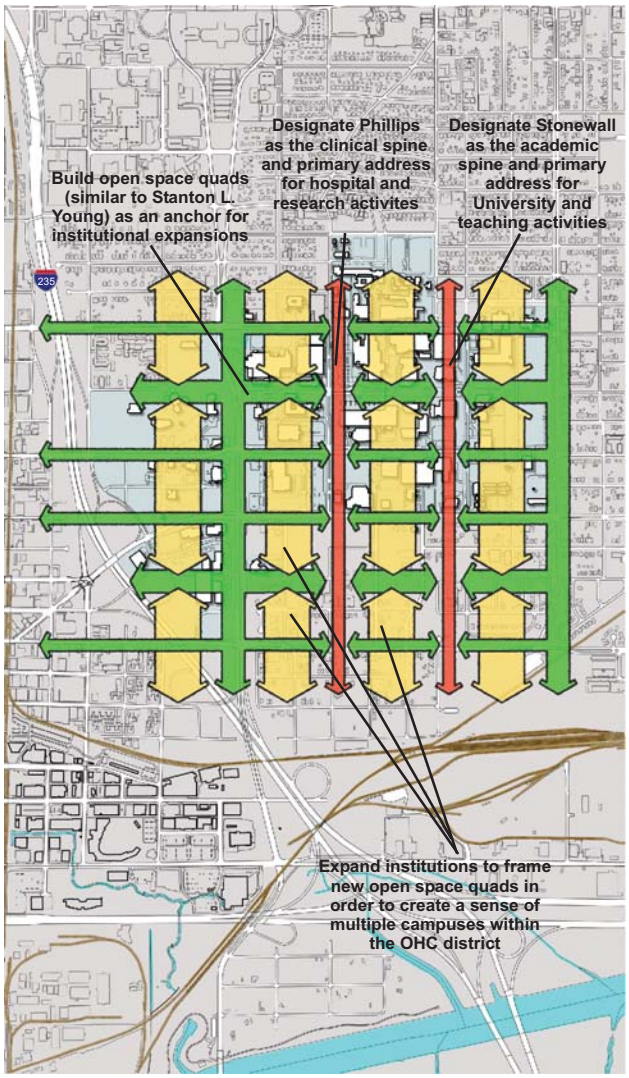


Corridors + Campuses Concept

C. Concept Alternatives, cont'd

Evaluation of Alternative A. The clear advantage of the Corridors + Campuses alternative is that it builds upon existing infrastructure, road alignments and land uses. In this regard, it would likely be a cost effective framework for near-term redevelopment at the Oklahoma Health Center.

However, this alternative's main disadvantage is it does not create additional real estate for future expansion. In the mid to long-term, institutions seeking to expand would need to rely on significant increases in density to accommodate their space and parking needs.



Alternative A: Corridors + Campuses

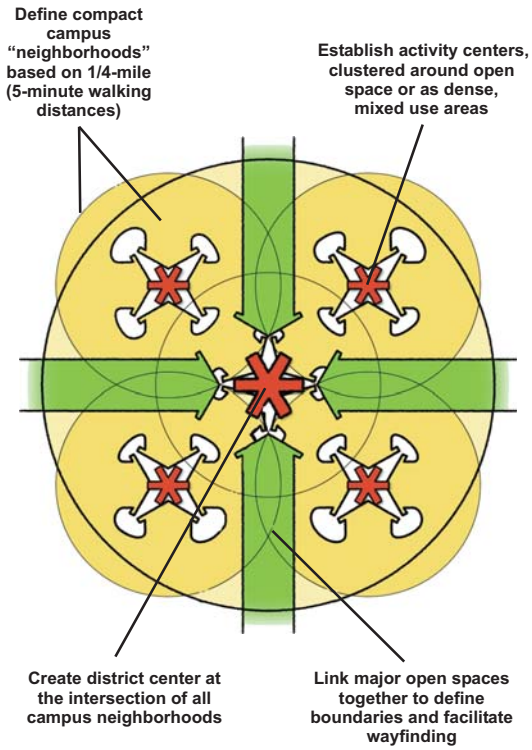
C. Concept Alternatives, cont'd

Alternative B: Campus Neighborhoods + Centers

The second alternative, "Campus Neighborhoods + Centers", would build upon the existing major clusters of activity — clinical, research and academic — to create inwardly-focused "neighborhoods" with an emphasis on these three themes. In contrast to the first alternative's linear development pattern, this alternative would be based on creating multiple nodes or concentrations of similar health center land uses.

Similar to the first alternative, the Stanton L. Young Walk is a precedent that could be replicated to support creation of campus neighborhoods and centers. Development of each node could be centered on a common open space (as in the creation of a campus development pattern) or it could be centered by a concentration of higher density, with or without a central open space (an urban development pattern). These centers would be appropriate locations to establish a retail or mixed-used zone that would become an active location, which fosters social interaction and provides services necessary for the district to function as a neighborhood.

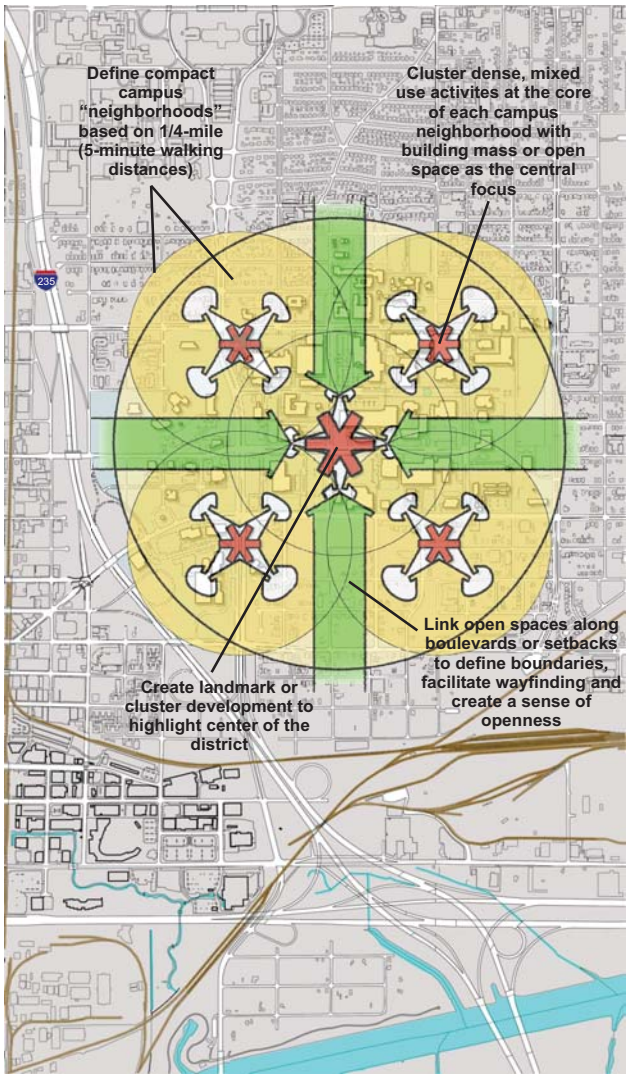
The perimeter of each of these neighborhoods should be clearly delineated to identify its institutions and accessibility. These edges would logically occur along the district's primary boulevards; corridors wide enough to be natural barriers between different activities, but attractive landscapes that contribute to the neighborhoods' identities. Where these boulevards intersect is an opportunity to establish a district center, or town center, larger in scale than the neighborhood centers with services that support the entire Oklahoma Health Center.



Campus Neighborhoods + Centers Concept

C. Concept Alternatives, cont'd

Evaluation of Alternative B. Campus Neighborhoods + Centers would create identifiable neighborhoods somewhat built upon existing infrastructure and road alignments. It would, however, likely be more costly than Alternative A, but it would give existing institutions more ability to expand within the boundaries of the OHC, making this alternative more attractive in the mid-term.



Alternative B: Campus Neighborhoods + Centers

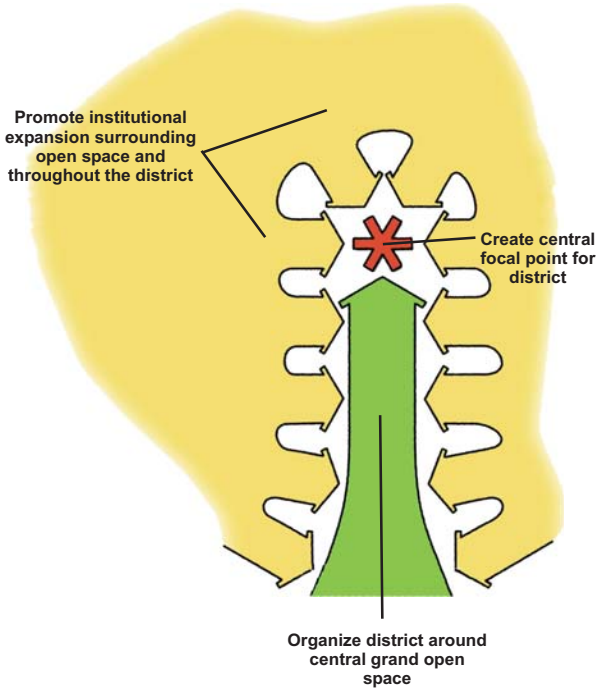
C. Concept Alternatives, cont'd

Alternative C: Greenway Address

Just as the first two alternatives are focused on managing redevelopment within the existing bounds of the Oklahoma Health Center (OHC), the "Greenway Address" alternative proposes a strategy for expanding the boundaries of the OHC, offering existing institutions multiple options within the district for their own expansion. Conceptually and physically, the central focus of this scheme is to create a large public open space in the center of the OHC that would link the district southward to the Oklahoma River. This scheme reflects the success of the Bricktown Canal as a precedent.

By extending a finger of open space from the Oklahoma River into the heart of the OHC, this alternative is regional in its approach and sets the stage for additional themes that relate to health, the environment, sustainability and connectedness. These themes could contribute to the image being established for the OHC.

Frontage along the greenway would be established as the coveted address for institutions expanding or relocating within the area. Since many of the existing facilities within the OHC are landlocked with little excess land area available for expansion, providing the opportunity for some institutions to relocate would benefit those that cannot relocate by vacating adjacent properties.



Greenway Address Concept

C. Concept Alternatives, cont'd

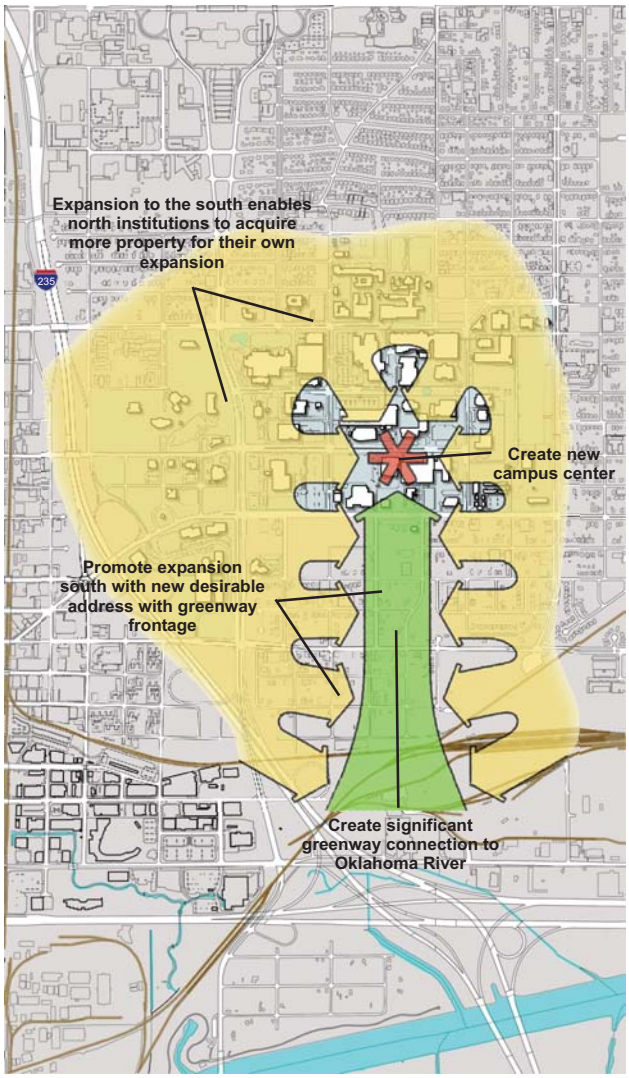
Evaluation of Alternative C. This ambitious alternative is forward-thinking and would accommodate OHC's growth needs well into the future. It allows for flexible phasing and implementation that can react to unexpected future market conditions or changes in the health care industry. The concept of establishing a Greenway address would be instrumental to the long-term redevelopment, marketing, recruiting and branding of the OHC. However, as a long-term strategy, it is complicated, costly, potentially risky, and may not adequately address the short to mid-term needs of OHC institutions.

Recommended Alternative: Hybrid Scheme

With assistance from the Project Management Team and Project Advisory Group, the recommended concept is a hybrid of the three alternatives, incorporating useful near-term solutions with ambitious long-term ideas. This concept essentially proposes redevelopment and in-fill for the area north of 8th Street. South of 8th Street is targeted for growth and expansion.

Elements of the "Corridors + Campuses" alternative are appropriate for the area north of 8th Street, where major infrastructure—including boulevards, open space and utility corridors—will likely remain. There are opportunities to transform some of the existing blocks into more cohesive clusters of buildings, centered on open space that mimics the form of a campus quad.

South of 8th Street will be targeted for an ambitious reordering of infrastructure, land use and development pattern. Central to this area will be a large public open space that will give the OHC a new image. The "Greenway Address" will become a desirable location for existing facilities wishing to expand, or for attracting new facilities from elsewhere that otherwise would not have the opportunity to co-locate adjacent to their renowned OHC peers.



Alternative C: Greenway Address

The idea of "Campus Neighborhoods + Centers" applies to both the area north and south of 8th Street, directing institutions with similar missions or activities to locate within close proximity to each other. The concept is intended to establish neighborhoods of a certain type of activity. A neighborhood center could typically be a zone where people are encouraged to interact, possibly by creating a cluster of retail or mixed-use around a common open space.

D. Land Use & Sub-District Characteristics

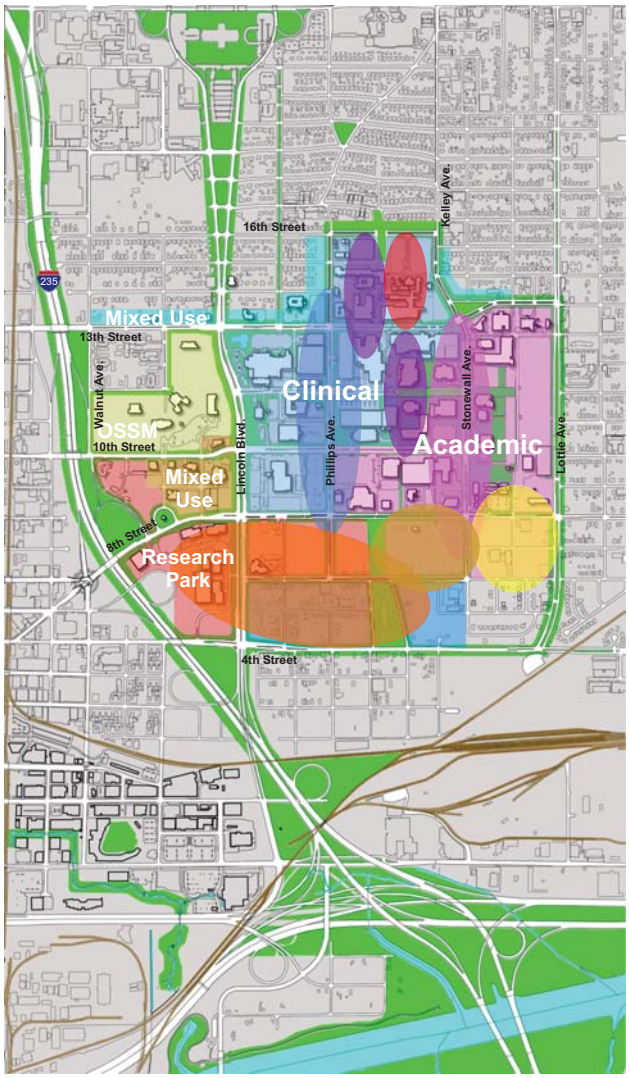
At a very conceptual level, the Oklahoma Health Center can be subdivided into four quadrants, generally creating four campus neighborhoods: Academic, Clinical, Research and Residential. The various institutions, facilities and land uses within each of these neighborhoods may be loosely connected or completely interdependent, but they typically should benefit from close proximity. Although the OHC boundary clearly identifies the edge of the district as a whole, boundaries between the four campus neighborhoods are conceived as transition zones; places for interaction and opportunities to connect otherwise disparate users and uses. The two primary transition zones between the four campus neighborhoods are the Mixed-Use Town Center and the Greenway Area.

Academic Neighborhood (northeast quadrant). The northeast quadrant is dominated by the instructional, administrative and student facilities of the University of Oklahoma Health Sciences Center. Despite the outstanding quality of academics, there is a demand for a variety of housing close to the campus as well as opportunities for enhancing student life. While the Academic Neighborhood cannot on its own support these activities, they can be accommodated close by.

Clinical Neighborhood (northwest quadrant). Together with the Academic Neighborhood, the Clinical Neighborhood currently makes up the core of the OHC. It contains multiple private and institutional patient care facilities as well as several instructional and research facilities, but is primarily anchored by the OU MEDICAL CENTER.

Research Neighborhood (southwest quadrant). Currently less intensively developed than the northern quadrants, the southwest quadrant is home to more than 30 private research facilities and non-profit agencies located in the Presbyterian Health Foundation Research Park.

Residential Neighborhood (southeast quadrant). In order to provide for the increasing demand for a variety of housing options, the southeast quadrant is optimally suited to evolve as a mixed-use urban neighborhood. Its proximity to the Academic Neighborhood provides convenient access for resident students and faculty, and would provide the neighborhood facilities necessary to enrich student life. Furthermore, as a residential neighborhood it would be compatible with the existing neighborhoods to the east.



Sub-Districts

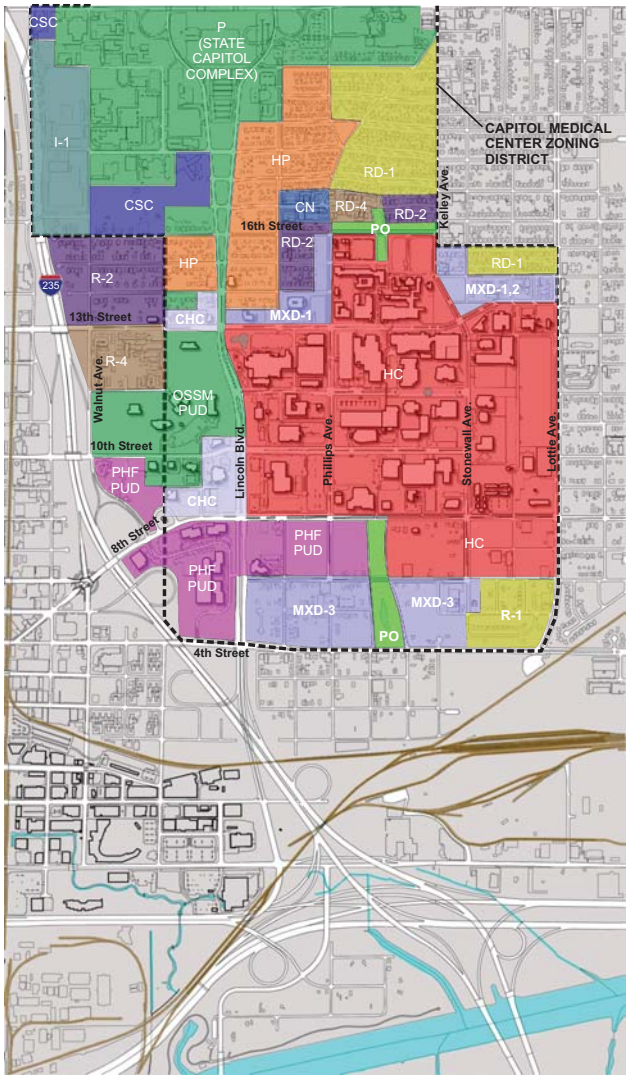
D. Land Use & Sub-District, cont'd

Mixed-Use Town Center. As a transitional zone between the northern and southern quadrants, the area centered on 8th Street is a place where diverse OHC users could come together. Either as a destination for interaction (via services) or as a stop en route to another destination, this area would gradually become the symbolic and functional heart of the OHC as the center of activity migrates south.

Greenway Area. Capitalizing on the new open space amenity and prestigious address, the area immediately adjacent to the Greenway would have a special character. The buildings that could line the edge of the Greenway would be important communicators of the Oklahoma Health Center's new image and brand. They must project a high quality image and should demonstrate a reasonable degree of continuity, particularly with respect to scale, materials and proportions.

Expanding the Boundary. The OHC and their partner institutions are enjoying enviable growth in the breadth and depth of their activities and services as the campus continues to emerge as a leader in the advancement of medical knowledge. Facilitation of this growth, enhancement of the existing institutions' missions, and the inclusion of new symbiotic partners require an expansion of available real estate. This plan extends the OHC related development south to NE 4th Street, from I-235 to Lottie Avenue.

Proposed Zoning. It is imperative to consider the expansion of the existing agencies and institutions, the addition of new partners, and the transition of existing neighborhoods to new uses, in a comprehensive and integrated forum. While application of Oklahoma City Zoning in the expansion areas would be a satisfactory combination, the use of CMZ Zoning, which is tailored to the needs of the Health Center and related activities, would be the superior partnership. It is our recommendation the Capitol Medical Center Zoning District be expanded southward to NE 4th Street, between Lincoln Boulevard and Lottie Avenue.



Proposed Zoning Map

CMZ Zoning Legend

P	Public
PO	Public, Open Space
HC	Health Center
HP-1	Historic Preservation
HP-2	Historic Preservation
RD-1	Single-Family Residential
RD-2	Low Density General Residence
RD-3	Low-Rise General Residence
RD-4	General Residential
MXD-1	Mixed Use Overlay Dist. 1 (Health Center related)
MXD-2	Mixed Use Overlay Dist. 2 (Residential related)
MXD-3	Mixed Use PUD*
CN	Neighborhood Commercial
CHC	Health Center Commercial
CSC	Commercial Service Center
I-1	Industrial
PHF-PUD	Presbyterian Health Foundation*
OSSM-PUD	Oklahoma School for Science and Math*

** PUD =Planned Unit Development Overlay Zoning District*

E. Access & Circulation

Expanding the size of facilities and the numbers of employees, students and patients will result in greater access and circulation demands on the system. As the OHC continues to add density, the existing street network will need to accommodate a higher volume of traffic. Opportunities to provide alternative transportation mode options should be explored to reduce infrastructure costs and provide improved access and circulation. Other enhancements may include reconfiguring major arterials and controlling land use, site access and future building locations to efficiently move people, bicycles, cars and transit vehicles throughout the district.

Increasing the current 17,000 parking spaces by the projected 14,000 spaces is an 82% gain, half of which is expected to occur in the next 5 years. This will have equally dramatic affects on the present traffic systems. Because significant changes and improvements in the infrastructure rarely happen in short time frames, immediate proactive and focused action is recommended in order to prepare for the demands of tomorrow.

Regional Accessibility

Goals:

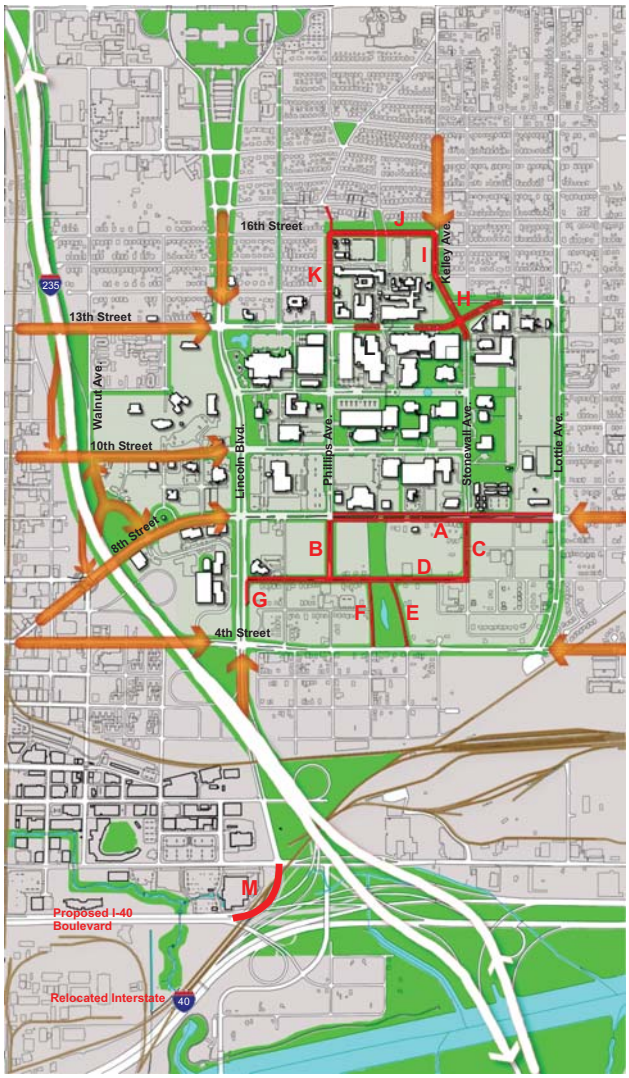
- *Encourage alternate routes of OHC access/egress*
- *Improve the I-235 entrance/exit ramping systems*
- *Improved traffic connections to the east side of OHC are critical to the successful utilization of this area*

Short-term Recommendations:

- *Actively monitor and participate in public planning processes (e.g., secure associate membership in the Association of Central Oklahoma Governments (ACOG), the planning authority for transportation in central Oklahoma). Tinker Air Base is an associate member.*
- *Encourage access to / from the east on NE 8th/10th Streets and NE 4th Street to/from campus (e.g., installation of directional signage on I-35 and Martin Luther King Boulevard).*

Long-term Recommendations:

- *Pursue additional direct freeway access to/from the OHC campus, such as a Lottie connection to the I-235 / Sheridan off-ramp for improved access to the east campus facilities*
- *Pursue improved ramping access to I-235, especially southbound I-235 at the 4th Street on-ramp*



Proposed Street Improvements

Street Improvements: (refer to Appendix C for full descriptions)

A. NE 8th Street from Phillips to Lottie
B. Phillips Avenue from NE 8th Street to NE 6th Street
C. Stonewall Avenue from NE 8th Street to NE 6th Street
D. NE 6th between Phillips and Stonewall
E. New east parkway from NE 6th St. to NE 4th St.
F. New west parkway from NE 6th St. to NE 4th St.
G. NE 6th Street from Lincoln to Phillips Drive & new intersection at Lincoln
H. Intersections of Kelley and Stonewall at NE 13th Street
I. Kelley Avenue from NE 13th Street to NE 16th Street
J. NE 16th Street from Kelley Avenue to Phillips Avenue
K. Phillips Avenue from NE 13th to Culbertson Drive
L. Reconfigure medians on NE 13th Street, mid block
M. Connect Lincoln Boulevard to the proposed I-40 Boulevard

E. Access & Circulation, cont'd

Local Area Roadway Network

Goals:

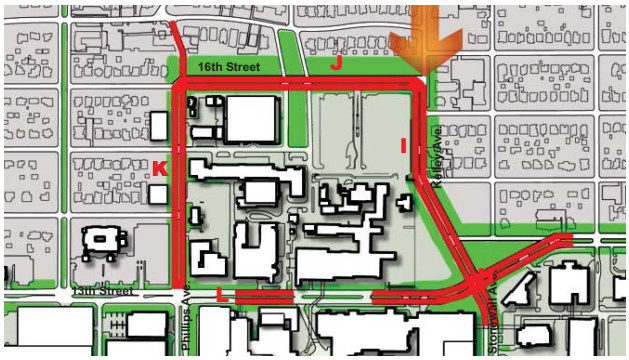
- *Reduce the through-traffic to/from the State Capitol Complex on Lincoln Boulevard in a substantial way*
- *Improve traffic flow at major intersections*
- *Eliminate dangerous practices*
- *Improve traffic safety, flow, and capacity along NE 8th Street, east of Phillips Avenue*
- *Improve access to expanded parking facilities on the northern border and service vehicle access to/from VA Medical Center, OMRF and the Colleges of Allied Health and Public Health*
- *Eliminate the double tee intersections at Kelley and NE 13th and Stonewall and NE 13th for improved traffic flow, wayfinding, and safety of both pedestrians and vehicles*
- *Acquire and preserve right-of-way for future improvement of N.E. 4th Street from Lincoln to Lottie*

Short-term Recommendations:

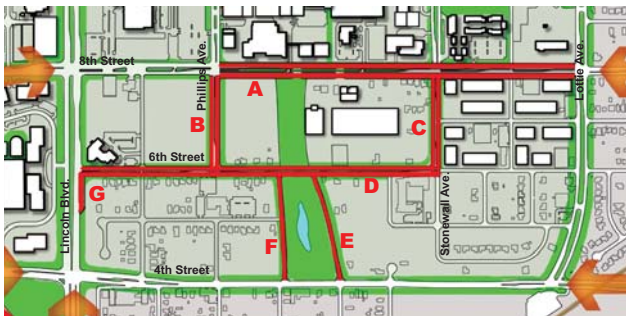
- *Investigate traffic signal timing improvements during off-peak period*
- *Construct additional turn bays to accommodate peak traffic patterns (e.g., southbound and northbound right turn lanes off Lincoln Boulevard at 8th and 10th Streets)*
- *Upgrade Phillips Avenue to four lanes with medians and left turn lanes from NE 13th Street to NE 16th Street*
- *Upgrade NE 16th Street to four lanes with medians and left-turn lanes from Phillips to Kelley Avenue*
- *Re-align Kelley and Stonewall to form a single intersection with NE 13th Street and upgrade Kelley to four lanes with medians and left-turn lanes from NE 13th to NE 16th Street (to match Stonewall south of 13th Street)*
- *Construct shuttle loading lanes at points where buses stand for longer periods*

Long-term Recommendations:

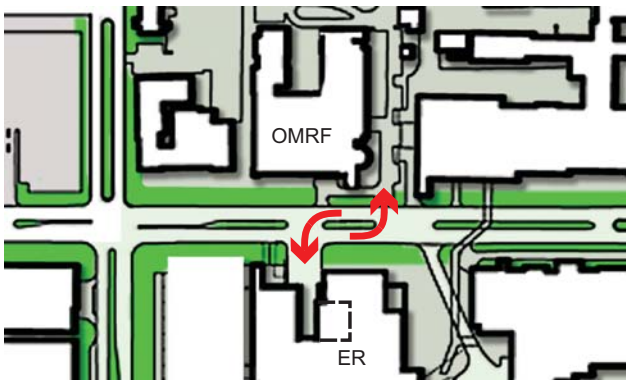
- *Implement roadway modifications that will focus through traffic that is not destined for OHC to peripheral streets and away from campus core (e.g., construct a new I-235 interchange in the vicinity of NE 18th Street serving the Capitol Complex more directly and effectively; and improving the flow and volume of traffic of the NE 23rd Street interchange in a substantial way)*
- *Widen NE 8th Street to include medians and left-turn lanes from Phillips Avenue to Lottie Avenue*
- *Connect Lincoln Blvd. to the proposed I-40 Blvd. with a direct, on-grade link*



Street Improvements - North



Street Improvements - South



New Median Cuts - Ambulance Entrance & OMRF entrance

Property Access

Goals:

- *Improve property access using standard median openings*
- *Improve safety and traffic flow at intersections with minimum driveway setbacks*

Short-term Recommendations:

- *Reconfigure the mid-block medians to provide safe access to and exit from the OMRF main entrance, and to provide emergency vehicle access from westbound 13th Street to the relocated Children's Emergency Center in Everett Tower*
- *As opportunities occur, relocate driveways to secondary streets and minimize driveways located on major thoroughfares such as Lincoln Boulevard and 10th Street*
- *Design future driveways at least 200-feet from nearest major intersection*
- *Avoid temptation to create "specialized" median openings: design driveways around standard median openings*

Long-term Recommendations:

- *(Same as short-term recommendations)*

F. Public Transportation

The benefits of introducing commuter rail and streetcar service as alternative means of transportation to and within the OHC are manifold, with direct benefits to the individual user as well as indirect benefits to the community as a whole.

Transportation Alternatives

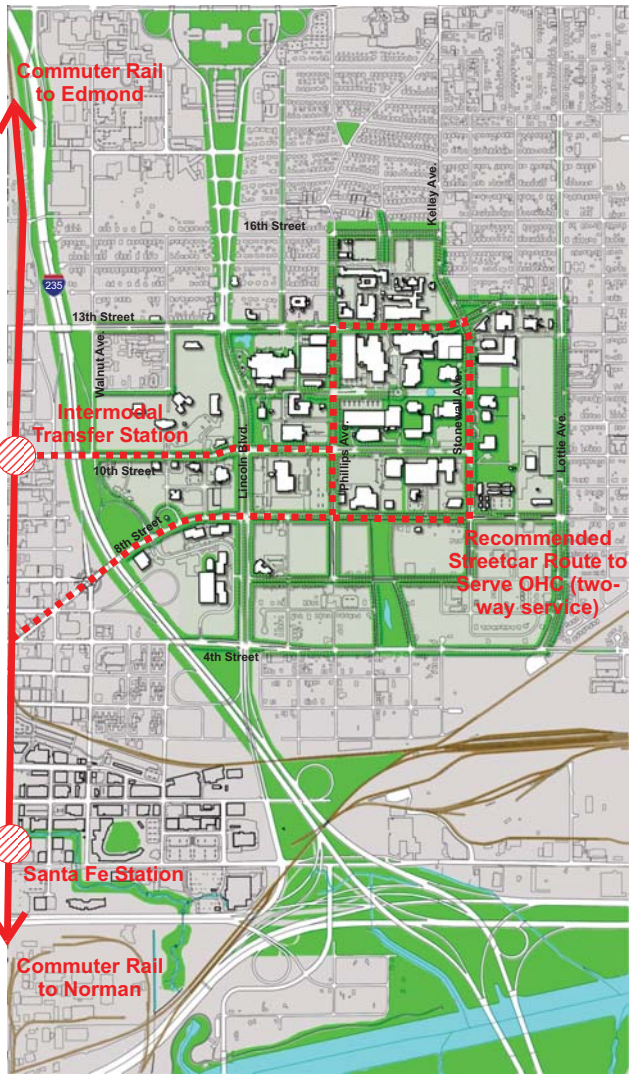
- *Develop alternative transportation modes on the OHC Campus*
- *Collaborate with ACOG, the City of Oklahoma City, and Metro Transit on effective bus routes and potential light rail systems*
- *Develop peripheral parking with supporting shuttle connections to and from convenient campus locations*
- *Promote comfortable pedestrian and bicycling environments to encourage walking and biking*
- *Promote nearby development of new and rehabilitated housing serving all economic levels to encourage walking and commuter biking*

Commuter Rail

- *Improved connection from Norman and Edmond to the OHC*
- *Help spur economic development opportunities in area surrounding transfer stations*
- *Help improve air quality of the region*
- *Improve mobility*
- *Expand transportation options alternative to automobile for commuters and visitors*

Streetcar (Fixed Rail)

- *Circle core campus*
- *Two-way service*
- *Interconnect with commuter rail*
- *Interconnect with skybridges at key locations*
- *Pedestrian friendly*
- *Less congestion, less parking, more development opportunity*



Public Transportation

Proposed Commuter Rail on BNSF Tracks

Proposed Streetcar Route

G. Gateways & Edges

Edges. Establishing identifiable gateways and clearly defined edges give security to neighbors that strengthen the image and presence of the Oklahoma Health Center.

Goals:

- *Strengthen the edges to clearly define the borders of the Health Center*
- *Reinforce the image and importance of the OHC with gateway entrances at the principal points of entry*
- *Establish a new western edge for the OHC along the east side of I-235 from 4th Street north to 13th Street*

Short- term Recommendations:

- *Combine street improvements, landscaping and open space. Mixed use development will stimulate revitalization of the residential and commercial areas, both for the community and in support of increasing the near-campus housing supply for OHC students, employees and staff.*
- *Strengthen the southern edge of the OHC along 4th Street with gateway intersections, trees, street lighting and wayfinding signage*
- *Refer to access and circulation for street improvements along the north border*

Gateways. The use of strong gateways give travelers a clear sense of arrival and distinctly marks the campus from its surroundings. Campus identity continues on the routes and paths with such features as landscaped streetscapes, streetlighting, street signage and pedestrian crosswalks. OHC's first impression and identity will benefit substantially with the introduction of unique entranceways at key locations. Refer to Appendix page D.5 for a gateway intersection concept illustration.

Goals:

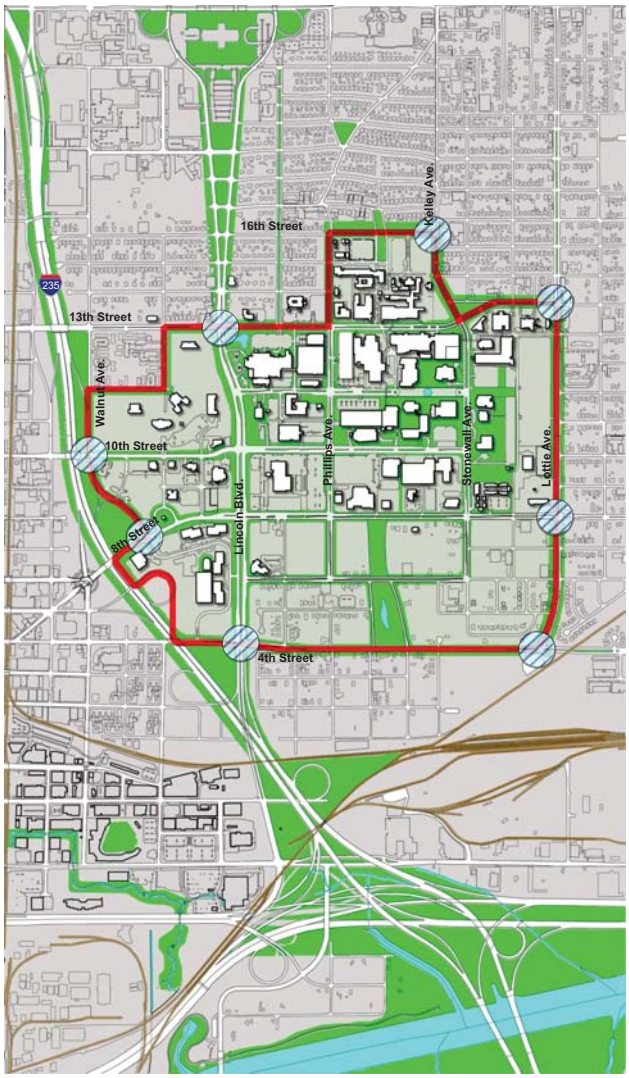
- *Develop a plan for clearly recognizable gateways. Link gateways to the internal road network. Gateways are to be clearly legible to the OHC population and visitors, well signposted, and lit appropriately*
- *Use public art to strengthen gateways*

Short- term Recommendations:

- *Implement a plan for financing and installing gateway intersections on a two-year cycle, starting with Lincoln Boulevard at 13th Street*
- *Install gateway intersections with street improvements, (e.g., N.E. 8th and Lottie, N.E. 16th and Kelley, etc).*

Long- term recommendations:

- *Continue short-term recommendations*



Gateways and Borders

Example of Gateway Identification

Beacon of Hope

H. Streetscape & Public Realm

There is a need for the existing and newly developing streetscape and public realm to have specific design guidelines. These guidelines should reflect the overall intent of the master plan to help join, connect and unify the existing and expanding campus. The quality of the public realm in the campus is vital to successfully create an environment that will attract workers and residents.

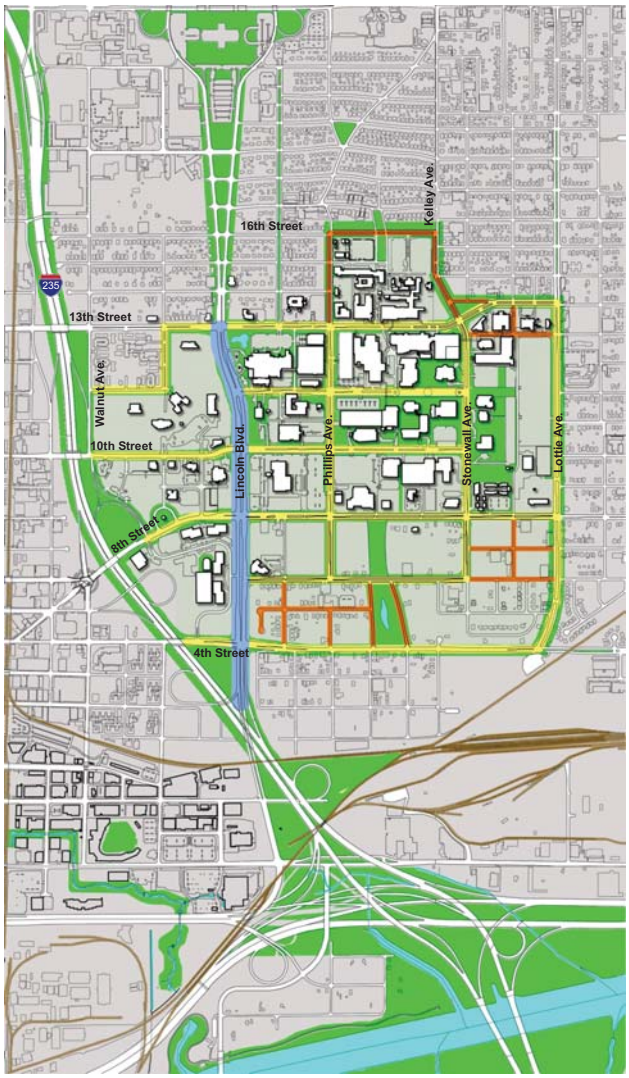
Recommendations that will aid the campus streetscape and the public realm include:

Goals:

- *New sidewalks should be set back a minimum of 5'-0" from back of curb to provide adequate space for street tree plantings*
- *Provide safe crosswalks that are clearly defined and accessible*
- *Develop streetscape design guidelines that prevent visual clutter*
- *Design streetscapes that incorporate strategies for safe pedestrian street crossings, bus stops and continuous, accessible sidewalks*
- *Develop and post intelligent street and path mapping*
- *Encourage visual links from the campus to the public realm*
- *Encourage street level activity and local identity within the public realm*

Short-term Recommendations:

- *Optimize timing of pedestrian / traffic signals to provide sufficient time for pedestrians to complete their crossing*
- *Install modern pedestrian signals at crosswalks, giving consideration to audible / visible type devices*
- *Develop landscaped medians and seating areas*
- *Provide pedestrian lighting along interior walkways*
- *Install public art at intersections, along paths, and in garden areas*
- *Upgrade sidewalks, safe pedestrian and bike crossings, and bus stops to meet design goals*



Building Setbacks Relate to the Heights of Adjacent Buildings

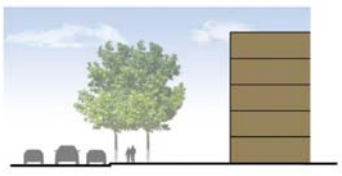
- *Provide uniform signs, seating, bus shelters, lamp fixtures, and trash receptacles*

Long-term Recommendations:

- *Continue short-term recommendations*

25' Building Setback

40' Building Setback



120' Building Setback

I. Identity & Wayfinding

A clear sense of arrival is vital for patients and visitors when approaching and moving through the campus. Care and clarity must be provided in helping to guide the public to their destination. All wayfinding must address the basic questions of the visitor: *Where do I drop off the person in my care for an appointment? Where do I park? How do I get conveniently from my car into the building? How do I get back to my car and out of the OHC? Where am I? Can I see my destination and route?*

Goals:

- *Implement comprehensive and hierarchical wayfinding programs emphasizing intuitive features and methodologies*
- *Create a unique health center identity that distinguishes the OHC from the surrounding community*
- *Building identity visible from a distance*
- *Intuitive, iconic building entrances*
- *Intuitive path(s) to parking*
- *Iconic signage*

Short-term Recommendations:

- *Develop gateways at major entry points and install identifying streetscape features in the district*
- *Develop a comprehensive, health center-wide wayfinding program (refer to Section F & Wayfinding)*
- *Signage identification from adjacent roadway and highways leading to the campus*
- *Clear paths of travel from parking to building at and around the OHC*
- *Signage designs made to allow users time to understand and digest the information*

Long-term Recommendations:

- *Design / orient future buildings with an intuitive relationship to the campus street system and a clearly visible, identifiable point of entry.*
- *Continue short-term recommendations*

Wayfinding Begins at the Regional Highways

Strengthen Identity With Landscaping

Effective Signage Examples

Example of Iconic Building Entrances

J. Green Space & Landscape

Landscaping is used to define a sense of place, and contribute to the quality of life by beautifying the campus, and provide an escape from the urban and campus surroundings. OHC has many small parks and gardens spread through out the campus that are well landscaped and maintained. They provide areas of refuge and healing for those outdoors and visual relief for those indoors.

Values and Benefits:

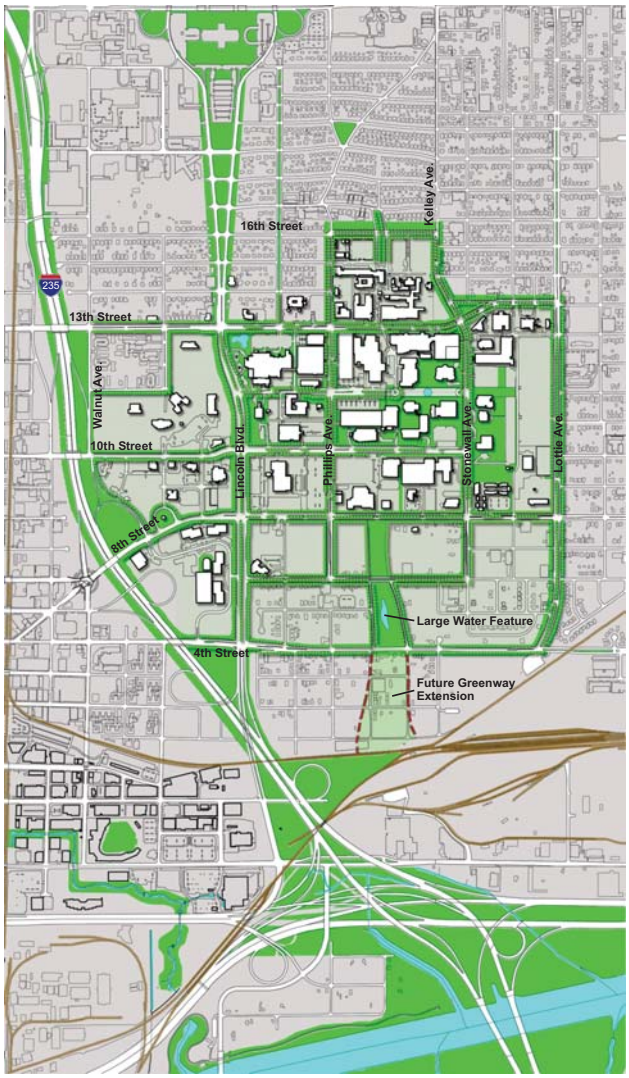
- *Green spaces encourage recreation and alternative modes of transportation in and around the campus*
- *Green spaces help separate public and private spaces*
- *Landscaping helps provide shade and protection from ultraviolet radiation*
- *Landscaping improves air quality by producing oxygen while reducing carbon dioxide and filtering airborne pollutants and dust*
- *Properly landscaped green spaces help provide visual clues by defining the street edges*
- *Properly landscaped areas will help control soil erosion, reduces stormwater runoff and filters oil, dust and heavy metal particles*

Goals:

- *Preserve and enhance open space around the campus*
- *Create new green space with major water feature, trails, landscaping, and peoplescaping in the natural valley*
- *Preserve and extend landscaped and shaded campus streets and boulevards*
- *Create landscaped setbacks from all residential areas*
- *Identify park areas and "therapeutic gardens" within each district*
- *Connect and extend the existing open spaces*
- *Encourage recreational use of green spaces*

Short-term Recommendations:

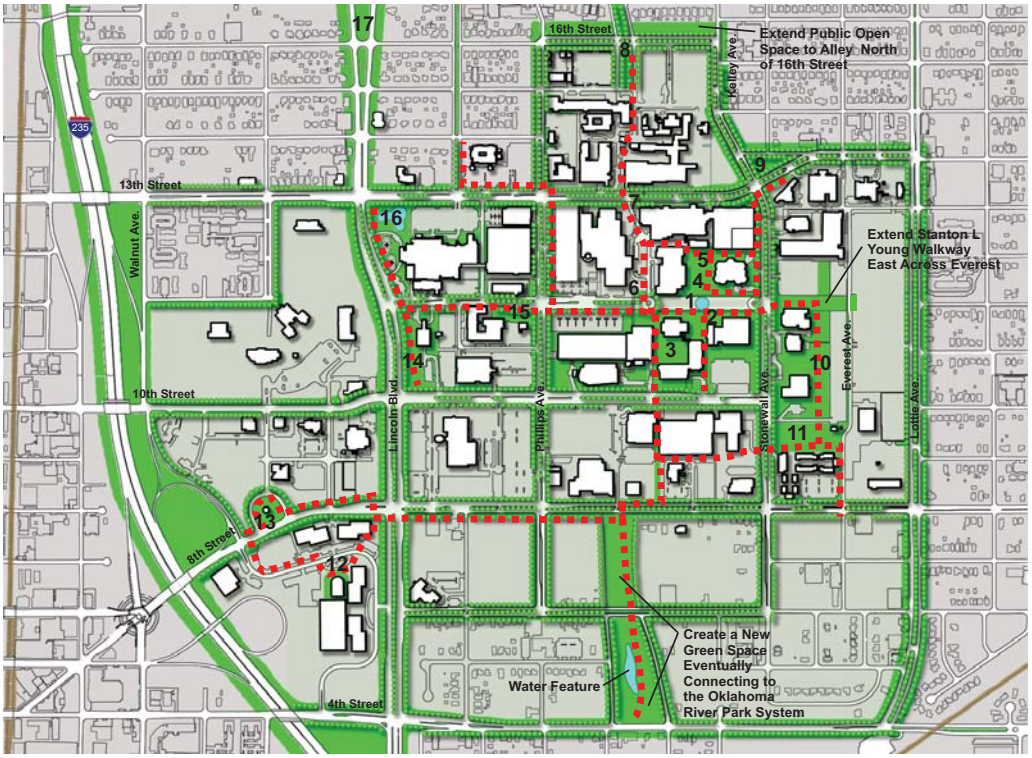
- *Reinforce OHC edges where appropriate, with the current practice of planting native species (i.e., I-235 at the west and Phillips / N.E. 16th / Kelley on the north edge)*
- *Use large specimens or concentrations to mark out the key paths and nodes in larger open spaces*



Extending the Basic Green Space Framework South to 4th Street

Water is Both a Visual and an Audible Attraction

J. Green Space & Landscape, cont'd



Campus Walking Paths and Points of Interest - Proposed and Existing

Short-term Recommendations, Cont'd:

- *Strengthen the landscape character of the major campus streets*
- *Create new open spaces, gardens, and linking pathways with each new building development*
- *Extend the Stanton L. Young Walk eastward across Everest Avenue to the entrance of the proposed Phase 1 Parking Garage*

Long-term Recommendations:

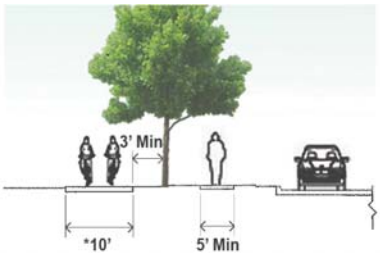
- *Extend the greenway southward connecting ultimately with the Oklahoma River Park system*

Significant Green Spaces:

1. Stanton L. Young Walk
2. Molly Shi Boren Courtyard
3. Augustine Henry Shi Garden & the Bluestem Stream
4. James G. Harlow Great Lawn
5. Children's Fountain and Oak Grove
6. Dreamcatcher Statue
7. Jimmie Everest Garden Walk
8. McMechan Park
9. Proposed Triangle Park
10. Nursing Bosque of Trees (Grove)
11. Intramural Field
12. Research Park Patio
13. Founder's Plaza
14. Dean A. McGee Eye Institute Lawn
15. Payne Boomer Campsite Historical Marker
16. Presbyterian Tower Pond and Gazebo
17. State Capitol Park

Paths can Provide a Variety of Experiences and Opportunities

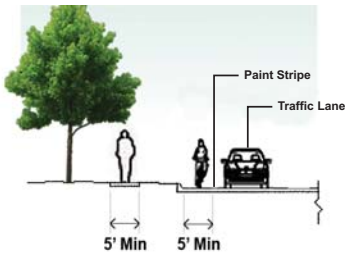
K. Pedestrians & Bicycles

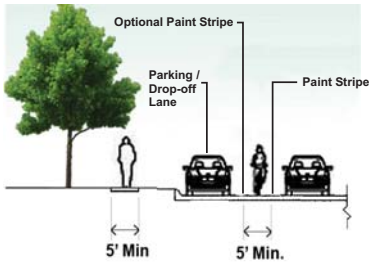


Detached Bicycle Path

- *Provide a minimum of 5'-0" in width for a one-way bike lane and 5'-0" minimum for a single pedistrian walkway. A 10'-0" minimum wide two-way shared use path is recommended.*

- *Improve crosswalks and signage at all intersections within the campus*



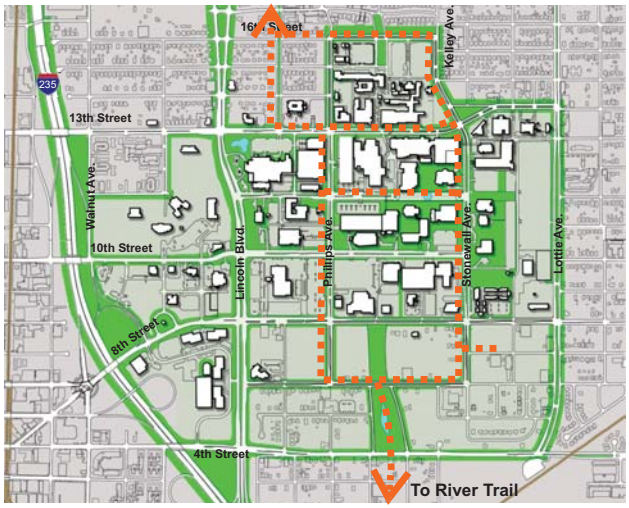


Bicycle Lanes in Streets

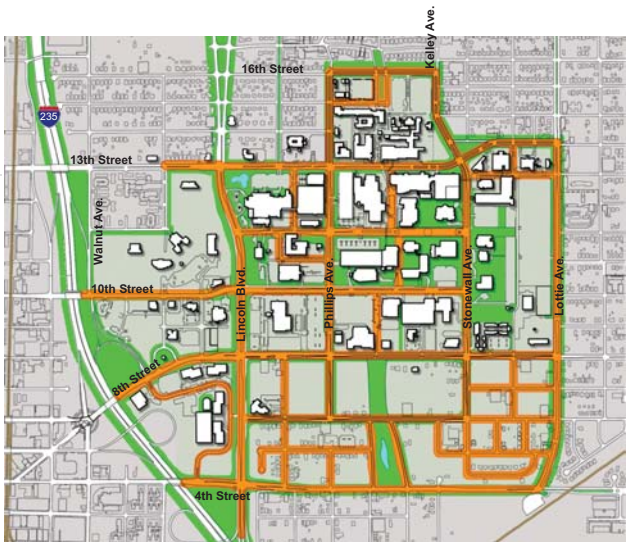
- *Promote walking options on campus to reduce auto dependencies*

- *Develop design guidelines for a pedestrian master plan*

- *Establish stronger paths that are habitual or potential lines of movement through the OHC and the most powerful means by which the campus can be ordered*



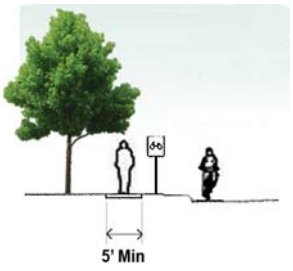
Proposed Bicycle Lane Routes



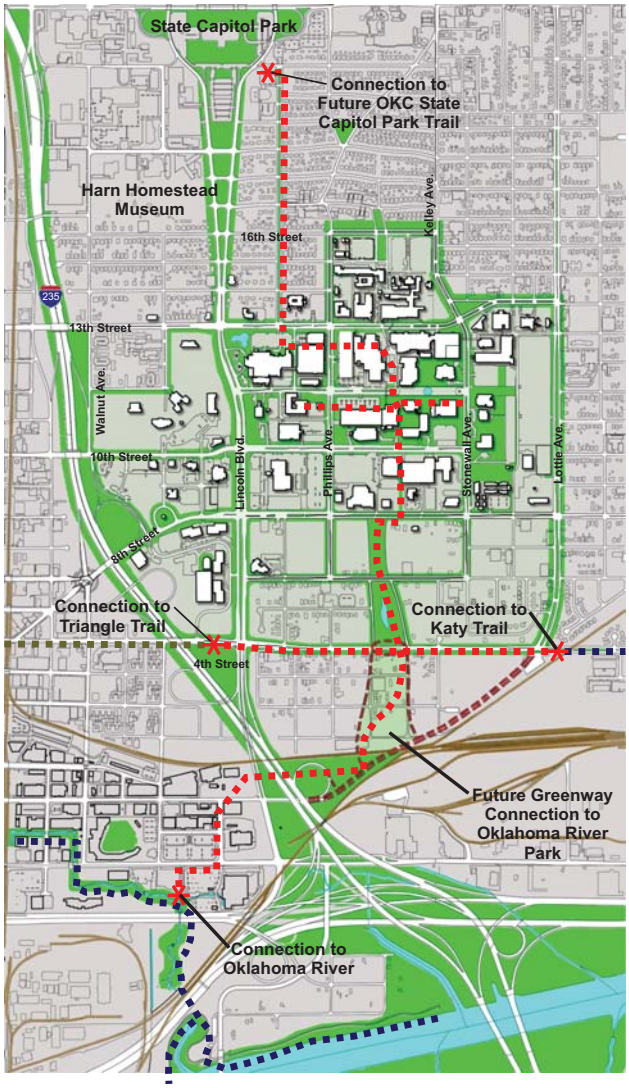
OHC Streets with Sidewalks

K. Pedestrians & Bicycles, cont'd

- *Develop a central pedestrian path (where possible), with formally planted trees to improve visual impact, identity and image along the axis ways*
- *Pedestrian and bicycle paths encourage their use for physical exercise and fitness*
- *Separate bicycle paths from roadways whenever possible*
- *Promote additional secure bike parking at or near off-campus transit stops*
- *Provide additional and improved on-campus bike parking, including secure and covered parking, charging for e-bikes, showers and locker facilities*
- *Help integrate the campus recreational trail system with the current city plan of bike trails*
- *Provide tree shading along the pedestrian and bike trails*
- *Clearly defined signage and pavement markings*



Bike Route with Sign



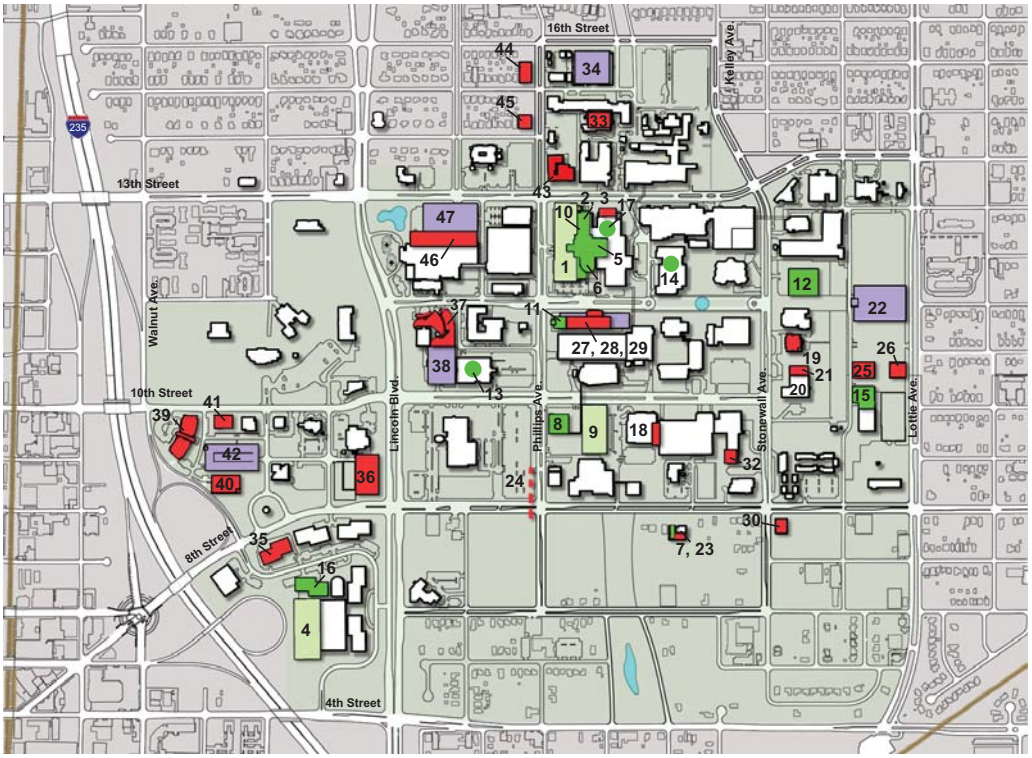
Major Walking / Biking Trails

- Existing OKC Pedestrian / Bicycle Trails
- Proposed OHC Pedestrian / Bicycle Trails
- Proposed Triangle Pedestrian / Bicycle Trail

Bicycle Lane

Landscaped Walk

L. Projected Expansion: 0-5 Year Horizon



Projects shown in green are funded and have a fixed site. All other projects are subject to changes in location, size, cost, or time frame until they are funded.

Planned Buildings
Planned Structured Parking
Currently Funded and Sited Buildings
Currently Funded and Sited Structured Parking

Infill Existing Campus

1. Everett Tower Parking Structure
2. Pediatric MOB
3. PMOB Parking Structure Below
4. PHF Parking Structure, Phase 2
5. Everett Tower Atrium
6. Education Center
7. Campus Police Station Addition, Phase 1
8. Oklahoma Cancer Institute, Phase 1
9. Oklahoma Cancer Institute Prkg. Struct. Phase 1
10. Oklahoma Diabetes Center (Pediatric)
11. Oklahoma Diabetes Center (Adult)
12. College of Allied Health Building
13. Case Management Program, Nursing
14. Basic Sciences Education Bldg., Renovation
15. Resource Annex 2
16. PHF Building 7
17. Pediatric Office Renovation, N. Pavilion
18. Family Medicine Classroom
19. Student Union 4th Floor Addition
20. Faculty / Staff Office Renovation, Nursing
21. Classrooms, Nursing
22. East Parking Structure, Phase 1
23. Campus Police Station Addition, Phase 2
24. New Steam & CW Tunnel, Phase 1
25. Operations Center
26. Motor Pool
27. Academic Office Building, 4.65 flrs
28. Academic Office Building Shell, 2 flr
29. Diabetes / Office Parking Structure
30. New Clinical Practice Facility, Dent.
31. * Extended-stay Lodging
32. OSDH Addition, Phase 1
33. OMRF Research Center
34. OMRF Parking Structure
35. PHF Building 8
36. OBI Expansion
37. Dean McGee Eye Institute Expansion
38. Dean McGee Eye Inst. Parking Struct.
39. RP-North, Medical Mall
40. RP-North, Office / Manufacturing
41. RP-North, Non-Profit Offices
42. RP-North, Parking Structure
43. Renovate College of Health Building
44. Cancer Caring House, 20 Rooms
45. Children's Caring House, 15 Rooms
46. Inpatient / ICU / Outpatient Addition - OUMC
47. Parking Garage - OUMC

South of 8th Street

48. * PHF East - Building E1
49. * New Steam & CW Plant, Phase 1
50. * New Steam & CW Tunnel, Phase 2
51. * Hotel
52. * Hotel Parking Structure
53. * Mid-range Lodging (Affordable)
54. * DHS Training Center
55. * DHS Parking Structure
56 * University Housing, 150 Units

**No Location Determined*

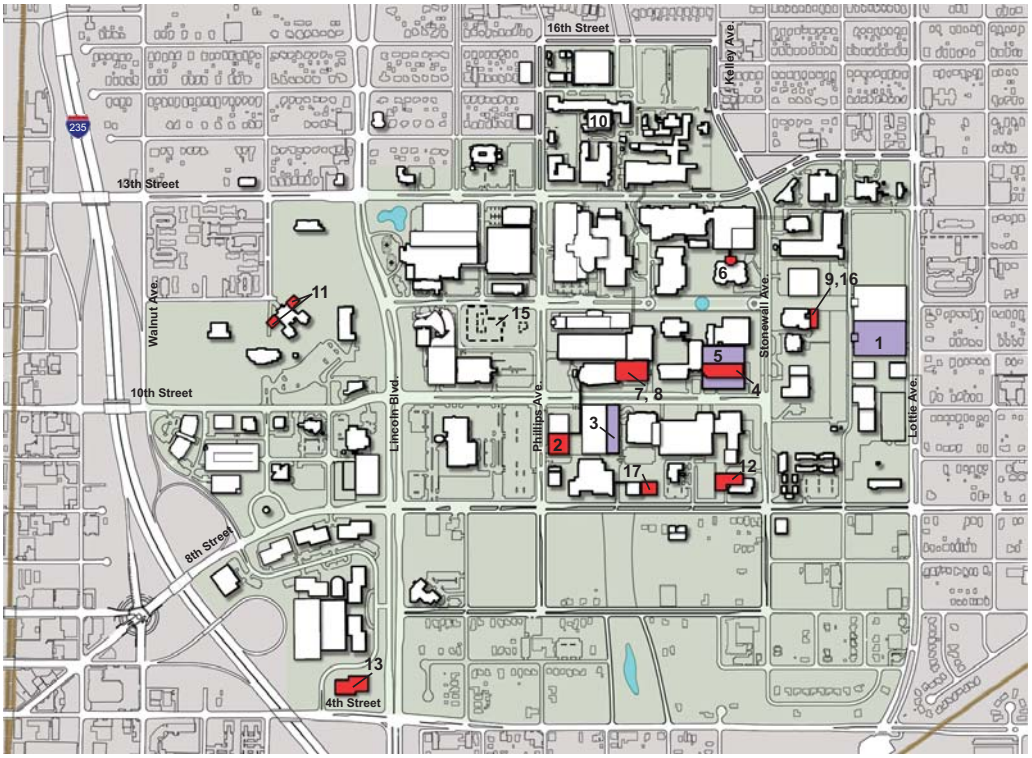
Summary: 0 - 5 Year Horizon

Refer to Appendicies B1,B2 and B3 for Details

	In-fill Existing Campus	South of 8th Street	Totals
Parking Requirement - spaces	5,229	1,737	6,966
Structured Parking - spaces	7,588*	683	8,271
Structured Parking - gsf	2,491,888	108,900	2,600,788
Building Area - gsf	2,174,642	792,372	2,967,014
Estimated Project Cost	$672,962,000	$124,540,000	$797,502,000

* includes spaces displaced by new developments and make-up spaces to address shortfall

L. Projected Expansion: 5-10 Year Horizon



Planned Buildings Planned Structured Parking

Infill Existing Campus

1. East Parking Structure, Phase 2
2. Oklahoma Cancer Institute, Phase 2
3. Oklahoma Cancer Inst. Prkg. Struct, Phase 2
4. BRC, Phase 3a
5. BRC Parking Structure
6. Expand Academic Facilities, Dent.
7. OU Physicians Expansion
8. OU Physicians Parking Structure
9. Classroom Addition, Pharmacy
10. OMRF Research Labs - Buildout
11. Dorm Expansion, OSSM
12. Replace Medical Examiner Facility
13. PHF Building 9
14. * PHF Building 10
15. Demolish Admin. & Motor Pool
16. Faculty & Staff Office Add'n, Pharmacy
17. Steam & Chilled Water Plant, Phase 3

South of 8th Street

18. * Administrative Services Center (ASC)
19. * Relocate Admin. From Rogers Bldg.
20. * ASC Parking Garage
21. * ASC Parking Garage - Overflow
22. * New Enterprise T3 Data Center
23. * Hazardous Materials Storage
24. * PHF East, Parking Garage Eg 1
25. * PHF East, Building E2
26. * Private Development Housing, 150 units

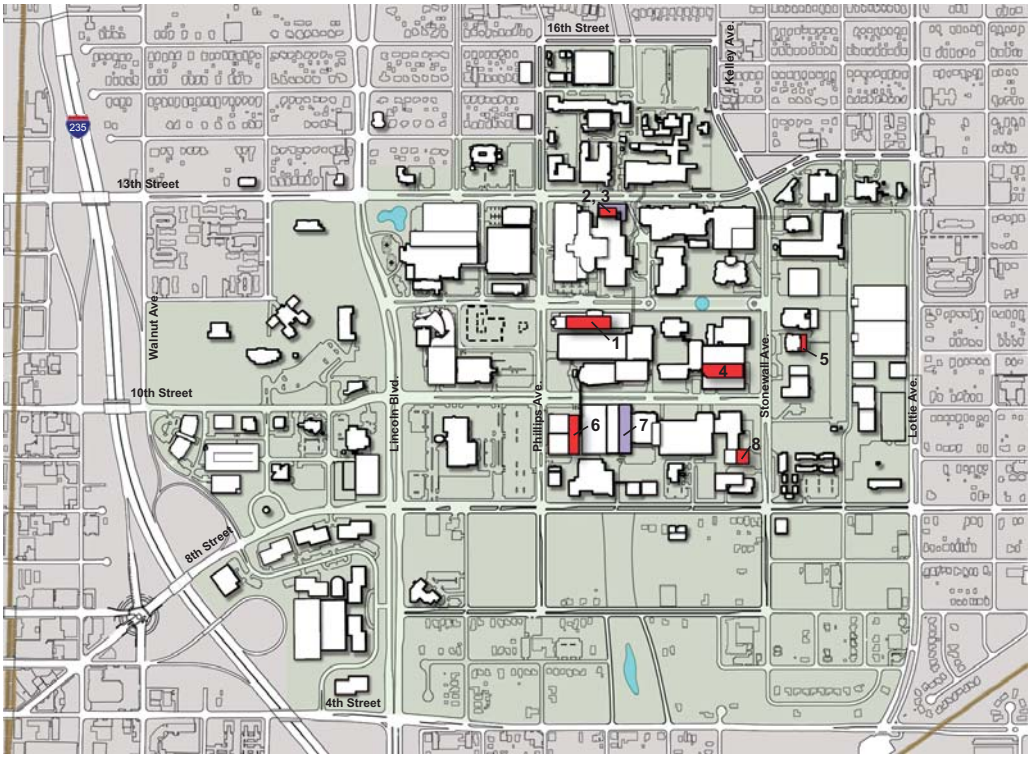
**No Location Determined*

Summary: 5 - 10 Year Horizon

Refer to Appendicies B1,B2 and B3 for Details	In-fill Existing Campus	South of 8th Street	Totals
Parking Requirement - spaces	2,092	835	2,927
Structured Parking - spaces	3,000*	2,300	5,300
Structured Parking - gsf	1,680,500	90,000	1,770,500
Building Area - gsf	876,900	334,000	1,210,900
Estimated Project Cost	$333,049,000	$70,310,000	$403,359,000

* includes spaces displaced by new developments and make-up spaces to address shortfall

L. Projected Expansion: 10 - 15 Year Horizon



Planned Buildings Planned Structured Parking

Infill Existing Campus

1. Academic Offices, Finish-out 2 flrs
2. Pediatric Office Addition - N. Pavilion
3. Pediatric Office Parking Structure
4. BRC, Phase 3b
5. Student Union East Addition
6. Oklahoma Cancer Institute, Phase 3
7. Oklahoma Cancer Institute Parking Struct., Phase 3
8. OSDH Addition, Phase 2

South of 8th Street

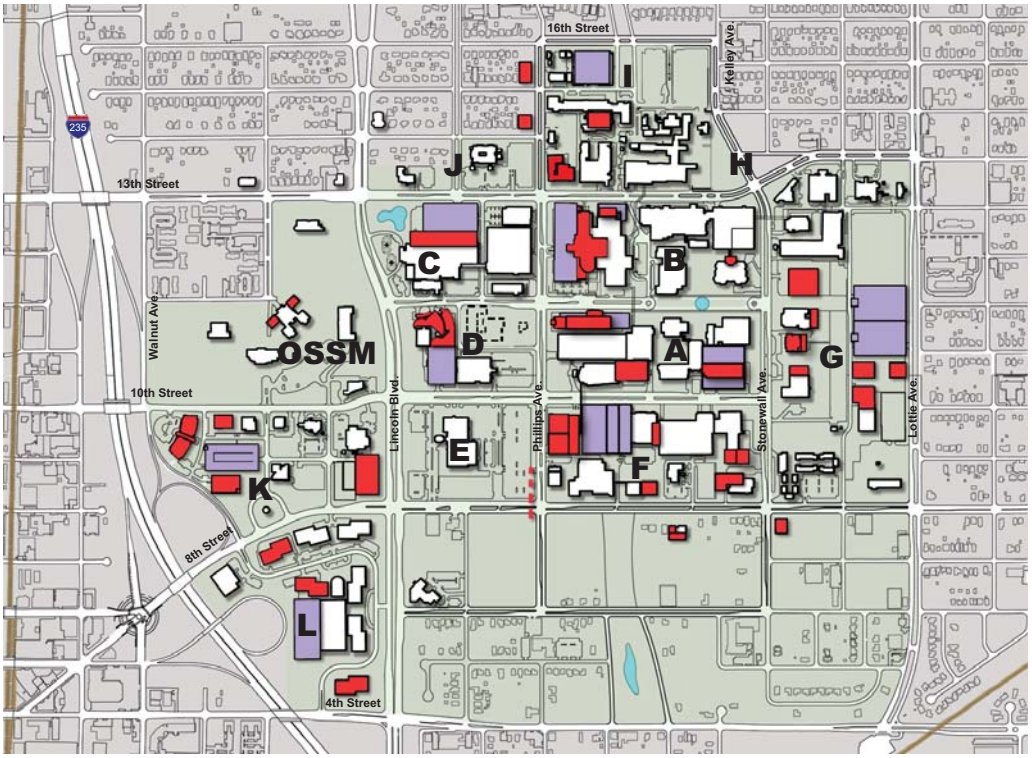
9. * PHF East - Building E3
10.* New Steam & CW Plant, Phase 2
11.* New Steam & CW Tunnel, Phase 3

**No Location Determined*

Summary: 10 - 15 Year Horizon

Refer to Appendicies B1,B2 and B3 for Details	In-fill Existing Campus	South of 8th Street	Totals
Parking Requirement - spaces	575	883	1,458
Structured Parking - spaces	600	--	600
Structured Parking - gsf	150,000	--	150,000
Building Area - gsf	353,200	230,000	583,200
Estimated Project Cost	$135,245,000	$63,500,000	$197,745,000

M. Summary of Planned Development, 0 - 15 Years



Summary of Planned Development, 0 - 15 Years

SUMMARY: BUILDINGS & PARKING NORTH OF 8th STREET

Planned Buildings
Planned Structured Parking

	BUILDINGS		PARKING		
Blk	EXISTING gsf	PLANNED gsf	EXISTING spaces	PLANNED[1] spaces	TOTAL spaces
A	1,220,798	695,200	2,122	1,630	3,752
B	1,770,810	428,700	1,265	1,200	2,465
C	703,700	(no data)	1,603	700	2,303
D	370,752	70,000	470	420	890
E	197,605	(no data)	984	0	984
F	434,861	548,900	1,630	2,000	3,630
G	546,225	244,770	4,424	3,000	7,424
H	-	-	72	0	72
I	1,612,658	233,600	1,442	630	2,072
J	71,040	38,000	577	0	577
OSSM		40,000	n/a	n/a	n/a
K	108,000	403,400	512	708	1,300
L	724,536	429,200	2,260	1,100	3,360
	7,760,985	**3,131,770**	**17,361**	**11,388**	**28,749**

SUMMARY: BUILDINGS & PARKING SOUTH OF 8th STREET

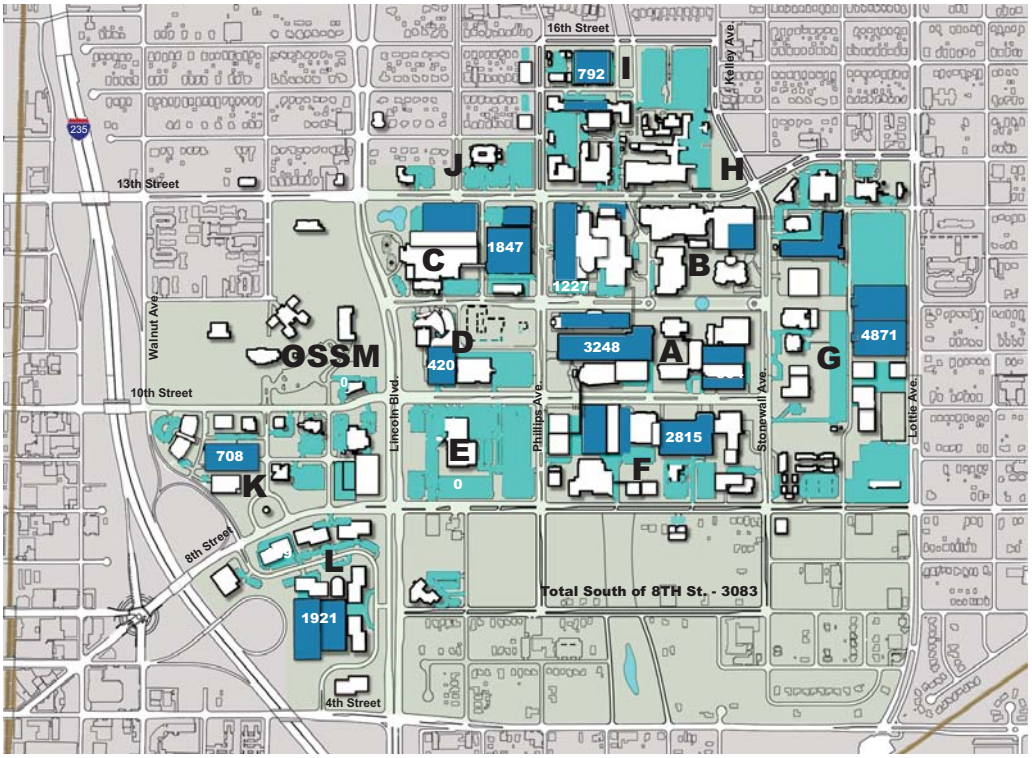
	PLANNED BUILDINGS GSF	PLANNED SURFACE PARKING spaces	PLANNED STRUCTURED PARKING spaces	TARGET PARKING FOR PLANNED BUILDINGS spaces[2]	NET PARKING EXCESS OR (SHORTFALL) spaces
Dept. of Human Services	179,772	70	380	449	1
PHF - Research Park East	450,000	56	1,100	1,125	31
OUHSC	340,272	101	750	851	0
OUHSC Housing	135,000	225	0	225	0
Lodging	316,000	475	320	790	5
Multi-family Residential	135,000	225	0	225	0
Totals	**1,556,044**	**1,152**	**2,550**	**3,665**	**37**

Notes

1. Planned parking structures only (excludes surface parking spaces)

2. Parking ratios used for computing the Target Parking Requirements are established by the Parking Consultant at the rate of 2.5 spaces per 1,000 square feet of building area

N. Parking Strategy



Existing and Planned Parking Structure Capacity

Surface Parking Structured Parking

As envisioned in this Master Plan, parking garages would be either of the first two categories below, or a hybrid of the two, i.e., partially in-ground and partially above-ground to maintain a lower profile. The project cost figures used for structured parking in Appendix B are consistant with this vision.

- Above-grade, naturally ventilated structures, three to five levels, and with capacity to add two levels at some future point.
- In-ground, naturally ventilated structures, with the upper deck at grade and one or two levels in the ground.
- These structures are very adaptable to sloping sites that simplify and enhance the design for natural ventilation, and provide opportunity for access at each level thereby eliminating the need for internal ramps.
- It is feasible to use in-ground parking structures under buildings with the building either raised above the top deck to maximize parking (e.g., the Oklahoma Allergy Clinic) or built on the top deck (e.g., the Acree-Woodworth / Massman Building at OMRF).
- Underground, mechanically ventilated structures, with an open plaza and/or building above, three or more levels deep, and with limited or no future vertical expansion capability.
- These structures are typically twice the cost of above-grade structures; consequently, they are usually viable only when all other parking options are unavailable.

Establish a Comprehensive Parking Strategy

- All new development must provide parking spaces at the rate of 2.5 spaces per 1,000 sf of building area
- Replace parking spaces lost to development
- Include structured parking with all new building projects, either underground below the new facility, adjacent to the new facility, and/or nearby
- Encourage the development of perimeter parking structures coupled with reliable shuttle and/or public transportation systems
- Provide patients and visitors with 10 percent extra spaces in order to accommodate peak load periods
- Prioritize parking allocations for patients, visitors, community doctors and designated staff at the most accessible locations in parking structures and lots
- Promote the establishment and use of public transit, including fixed guideway systems, as a strategy to reduce the growing numbers of vehicles traveling and parking on campus

Short-term Recommendations

- Establish campus governing authority to address parking issues on an Oklahoma Health Center campus-wide basis
- Update and expand the 2003 comprehensive parking and traffic study of the entire campus and include the growth identified herein
- Confirm or adjust the target planning criteria for campus-wide parking as part of parking and traffic study updates
- Recommend campus-wide strategies addressing key parking and transportation issues

Long-term Recommendations

- Update traffic and parking studies every three to five years

PLANNED STRUCTURED PARKING

Block	Spaces
A	1,630
B	1,200
C	700
D	420
E	0
F	2,000
G	3,000
H	0
I	630
J	0
OSSM	0
K	708
L	1,100
Total North of 8th Street	**11,388**
Total South of 8th Street	**2,550**
GRAND TOTAL	**13,938**

O. Conclusion

The Oklahoma Health Center Master Plan proposes a significant amount of potential future growth to the south of the existing core campus. The plan is based on recognizing and taking advantage of the natural features of the land and connecting to the river and the Central Business District of the City. Through the development of this area, a new campus entrance and gateway are established using quality green space and the potential to develop a new iconic University of Oklahoma Health Sciences Center Administrative Center as the central feature of this area. Along the greenway there are significant opportunities for the development of new buildings fronting on the green space with a prestigious new address.

To the south, while providing a significant amount of land for growth, the plan emphasizes major in-fill projects to the existing core campus, and also proposes to reinforce the stability of the adjacent neighborhoods.

The plan proposes a new approach to the development of future projects with the goal of a more efficient land use. This will create a more urban environment with a stronger orientation to the pedestrian, making the campus more walkable. However, this is not at the expense of properly accommodating the automobile. The proposed planning for new buildings locates them on corners of blocks for visibility and wayfinding. Parking to support each building is planned adjacent to building entrances at the side; not in front.

In addition to building location, additional opportunities to encourage pedestrian access throughout the campus are proposed with the ultimate goal of encouraging interaction.

In addition to strengthening the current neighborhoods, the redevelopment of urban neighborhoods adjacent to Bricktown and the Central Business District will strengthen environs of the Health Center and open the possibility for Health Center employees to live nearby.

The detailed plan for the development of specific projects is based on current University and College of Medicine development plans plus projections for growth and from interviews with all the stakeholders in the Health Center.

Master Plan Boundary

The plans are arranged to reflect short-term, mid-term and long-term growth projections and above all else are meant to be a framework for growth - not restrictive. Plans are highly flexible to allow for adjustments as future needs become more clearly defined, or as new developments or technology, that are not available today, require adjustments to the campus plan.

P. Extending the Vision

"The past is prologue to the future"

(unknown)

In the 35 years since 1971 when the Health Center began its dramatic expansion that has resulted in today's campus, approximately 7 million square feet of buildings have been constructed; an average of 200,000 square feet per year.

Over the next 15 years, the growth of OHC is projected to be 4.75 million square feet, an average of more than 300,000 square feet per year.

As the foundations of the past and the synergies of today translate into the continuing growth of tomorrow, OHC can expect continued expansions of its borders beyond the 15-year horizon of this study, even at the conservative pace of the last 35 years.

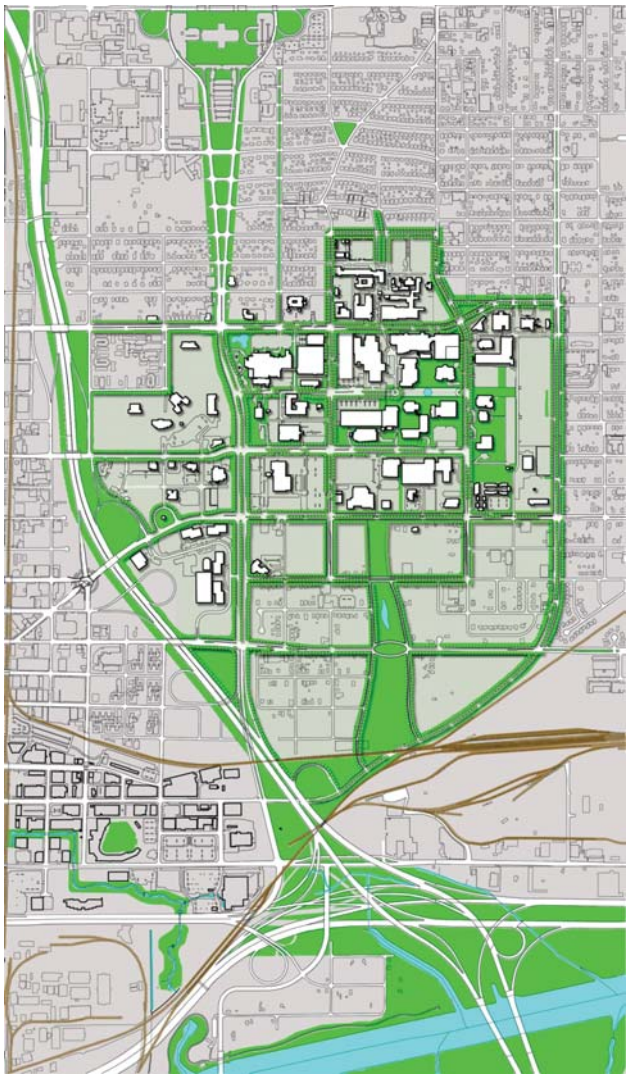
Growth Opportunities

There will still be core space available for in-fill at a modest level in many areas and a more robust level in limited areas such as the west side of Phillips from 8th Street to Stanton L. Young Boulevard.

Older buildings on the existing campus will be replaced with larger, higher density developments.

Eventual expansion southward to 1st Street offers great opportunity for large developments.

The 13th Street Corridor will become an important link to development of the northwest sector.



Extending the Vision

Appendices

Appendix A - Existing Buildings & Parking Supply

				PARKING SUPPLY			PARKING TARGET	
		EXISTING BUILDING GSF		EXISTING SURFACE PARKING spaces	EXISTING STRUCT'RD PARKING spaces		PARKING TARGET @ 2.5 sp per 1000 gsf *	PARKING SHORTFALL (EXCESS)
Summary by Block								
A		1,220,798		504	1,618		3,052	(930)
B		1,770,810		38	1,227		4,427	(3,162)
C		703,700		456	1,147		1,760	(157)
D		370,752		470	-		927	(457)
E		197,605		948	36		494	490
F		434,861		848	815		1,088	575
G		568,101		3,153	1,271		1,421	3,003
H		-		72	-		-	72
I		1,612,658		1,280	162		4,033	(2,591)
J		71,040		577	-		178	399
K		108,000		512	-		271	243
L		724,536		339	1,921		1,811	449
	TOTALS	**7,782,861**		**9,197**	**8,197**		**19,462**	**(2,066)**
	Total Existing Parking Supply				**17,394**			

Notes

1 Parking ratios used for computing the Target Parking Requirements are established by the Parking Consultant at the rate of 2.5 spaces per 1,000 square feet of building area.

2 Negative values for Target Parking indicate a shortfall of spaces and positive values indicate an excess of spaces.

Appendix A - Existing Buildings & Parking Supply, cont'd

			PARKING SUPPLY		PARKING TARGET	
		EXISTING BUILDING GSF	EXISTING SURFACE PARKING spaces	EXISTING STRUCT'RD PARKING spaces	PARKING TARGET @ 2.5 sp per 1000 gsf *	PARKING SHORTFALL (EXCESS)
BLOCK A						
A1.	Resident Physicians Lot	-	216		0	216
C.	Robert M.Bird Health Sciences Library - OUHSC	125,559	162		314	(152)
1	OU Physicians Building - OUHSC	175,214	45		438	(393)
1A.	Radiation Therapy - OUMC	48,422	40		121	(81)
2	Williams Pavilion - OUHSC	138,733	20	1,618	347	1,291
3	Biomedical Sciences Building - OUHSC	505,500	9		1,264	(1,255)
4	S. L. Young Biomedical Research Center - OUHSC	227,370	12		568	(556)
		1,220,798	504	1,618	3,052	(930)
BLOCK B						
E.	Children's Physicians Tower Parking Structure	-		1,150	0	1,150
6	Dental Clinical Sciences Building - OUHSC	190,444	14		476	(462)
7A.	Nicholson Tower - OUMC (Exist'g Children's Hosp.)	695,836		77	1,740	(1,663)
7B.	Bielstein Tower - OUMC	incl above				-
7C.	Garrison Tower - OUMC	incl above				-
8	Basic Sciences Education Building - OUHSC	146,820	10		367	(357)
9	Everett Tower - OUMC	610,973	14		1,527	(1,513)
10	North Pavilion - OUMC	126,737			317	(317)
		1,770,810	38	1,227	4,427	(3,162)
BLOCK C						
12	Oklahoma Allergy and Asthma Clinic	66,000	-	200	165	35
13	Presbyterian Tower - OUMC	540,640	390	947	1,352	(15)
14	Presbyterian Professional Office Building - HCA	97,060	66		243	(177)
		703,700	456	1,147	1,760	(157)
BLOCK D						
15	Motor Pool - OUHSC	2,260	52		6	46
16	Service Center Building - OUHSC	118,492	38		296	(258)
17	Dean A. McGee Eye Institute	90,000	140		225	(85)
18	Oklahoma City Clinic	160,000	240		400	(160)
		370,752	470	-	927	(457)
BLOCK E						
19A.	Center For Healthy Living, Medical Office Building - HCA	121,052	223	36	303	(44)
19B.	Center For Healthy Living, Fitness Center - HCA	76,553	179		191	(12)
R.	Center For Healthy Living - East Parking Lot - Leased		419		0	419
Q.	Center For Healthy Living - South Parking Lot - Temporary Parking		127		0	127
		197,605	948	36	494	490

Appendix A - Existing Buildings & Parking Supply, cont'd

			PARKING SUPPLY		PARKING TARGET	
		EXISTING BUILDING GSF	EXISTING SURFACE PARKING spaces	EXISTING STRUCT'RD PARKING spaces	PARKING TARGET @ 2.5 sp per 1000 gsf *	PARKING SHORTFALL (EXCESS)
BLOCK F						
	OUHSC Parking, D Lot	-	452		0	452
21	Don E. Hogg Greenhouse - OUHSC	11,464	12		29	(17)
22	Steam and Chilled Water Plant - OUHSC	51,877	30		130	(100)
22A.	Steam and Chilled Water Plant Expansion - OUHSC	8,694	-		22	(22)
23	Family Medicine Center - OUHSC	73,626	234		184	50
24	Oklahoma State Department of Health	260,000	50	815	650	215
25	Davita Dialysis Center	11,200	30		28	2
26	Oklahoma State Medical Examiner	18,000	40		45	(5)
		434,861	848	815	1,088	575
BLOCK G						
	OUHSC Parking - leased to VA	-	750		0	750
	OUHSC Parking	-	1,147	1,271	0	2,418
27	University Village - OUHSC	71,940	153		180	(27)
28	DHS Service Center	14,800	160		37	123
29	Resource Annex - OUHSC	20,461	13		51	(38)
30	College of Nursing - OUHSC	96,670	85		242	(157)
31	David L. Boren Student Union - OUHSC	38,846	13		97	(84)
32	College of Pharmacy - OUHSC	84,393	410		211	199
33	M.I.D. Building - DHS	40,000	106		100	6
34	Pauline Mayor Group Home - DHS	2,000	8		5	3
35	Okla State Dept of Mental Health & Substance Abuse	30,000	147		75	72
36	O'Donoghue Research Building - OUHSC	147,115	101		368	(267)
37	Child Study Center-OUHSC	21,876	60		55	5
		568,101	3,153	1,271	1,421	3,003
BLOCK H						
AK.	Children's Tower Visitor Parking	-	72		0	72
		-	72	-	0	72
BLOCK I						
	Veterans Affairs Medical Center	905,079	680		2,263	(1,583)
AN.	Oklahoma Medical Research Foundation - North Parking	-	235		0	235
39	Chapman Building / Milligan Center - OMRF	277,822	77		695	(618)
41	John W. Keys Speech and Hearing Center - OUHSC	30,153	34		75	(41)
42	William H. Bell Building - OMRF	144,212	14		361	(347)
43	Acree-Woodworth-Massman Building - OMRF	83,334	14	162	208	(32)
44	Allied Health Practice Center & Shop - OUHSC	6,720	29		17	12
45	Rogers Office Building - OUHSC	48,091	162		120	42
46	Televised Instruction Facility - OSRHE	3,800	5		10	(5)
47	College of Health Building - OUHSC	113,447	30		284	(254)
		1,612,658	1,280	162	4,033	(2,591)

Appendix A - Existing Buildings & Parking Supply, cont'd

			PARKING SUPPLY		PARKING TARGET	
		EXISTING BUILDING GSF	EXISTING SURFACE PARKING spaces	EXISTING STRUCT'RD PARKING spaces	PARKING TARGET @ 2.5 sp per 1000 gsf *	PARKING SHORTFALL (EXCESS)
BLOCK J						
AU.	College of Health - West Parking Lot	-	293		0	293
48	Easter Seals Adult and Child Care	24,000	50		60	(10)
49	Faculty House - OUHSC	11,921	-		30	(30)
50	Dermatology Clinic - OUHSC	17,119	122		43	79
AX.	Faculty House Parking Lot	-	42		0	42
71	Dental Association	10,000	40		25	15
72	Council of Public Affairs	8,000	30		20	10
		71,040	577	-	178	399
OSSM						
	NONE	-	-	-	0	-
					0	-
BLOCK K						
57	Oklahoma State Chamber of Commerce	16,000	60		40	20
58	Ratcliffe's Book Store	6,000	50		15	35
59	Ohoma Health Services Federal Credit Union	6,000	50		15	35
60	Sylvan N. Goldman Oklahoma Blood Institute	35,000	152		88	65
61	Oklahoma Department of Commerce	45,000	200		113	88
		108,000	512	-	271	243
BLOCK L						
BE.	PHF Research Park Parking Structure G1		-	810	0	810
BE.	PHF Research Park Parking Structure G2		-	1,111	0	1,111
62	PHF Research Park Building 1	106,786	46		267	(221)
63	PHF Research Park Building 2	131,485	217		329	(112)
64	PHF Research Park Building 3	151,116	13		378	(365)
65	PHF Research Park Building 4	145,693	10		364	(354)
66	PHF Research Park Building 5	21,202	12		53	(41)
70	PHF Research Park Building 6	25,735	25		64	(39)
-	PHF Reaserch Park Building 7	142,519	16		356	(340)
		724,536	339	1,921	1,811	449
	Totals	**7,782,861**	**9,197**	**8,197**	**19,462**	**(2,066)**

Appendix B1 - Projected Expansion Arranged by Entities

G = General / Office Space C + Clinical Space A = Acedemic Space R = Research Space P = Parking S = Steam & Chilled Water Plant T = Utility Tunnel

FACILITY	NEW gsf	REPLACE gsf	EXPAND gsf	RELOCATE gsf	REPURPOSE & RENOVATE gsf	STRUCTURED PARKING gsf	COMMENTS	PARKING REQMTS spaces	ESTIMATED PROJECT COST 2006 Pricing	TIME FRAME
SUMMARY BY ENTITY										
OUHSC FACILITIES & PARKING	1,191,300	250,770	206,472	(163,000)	107,100	2,507,000		3,914	$ 707,718,000	
UNIV. HOSPITAL AUTHORITY & TRUST	358,700	0	0	0	0	406,288		897	$ 92,450,000	
OU MEDICAL CENTER	0	0	335,500	0		234,000		839	$ 150,975,000	
STATE OF OKLAHOMA AGENCIES	234,772	(18,000)	120,000	0	0	108,900		742	$ 69,930,000	
OTHER INSTITUTIONS & ENTITIES	1,776,500	0	248,200	0	0	1,265,100		4,819	$ 445,788,000	
MULTI-FAMILY RESIDENTIAL	270,000	0	0	0	0	0		676	$ 16,500,000	
TOTALS	**3,831,272**	**232,770**	**910,172**	**-163,000**	**107,100**	**4,521,288**		**11,887**	**$ 1,483,361,000**	
TOTAL NEW, REPLACED & EXPANDED			4,974,214	(Excludes Renovations & Structured Parking)						

NOTES, ASSUMPTIONS, AND CALCULATIONS

1	Building space requirements (gsf) are recorded from Strategic Plans and/or as presented in interviews -- verification of such data is beyond the scope of this effort.
2	Estimated Project Cost at 2006 pricing is computed at 1.33 times estimates of Construction Cost, then rounded upward. (refer to table below)
3	Parking ratios used for computing the Parking Requirements are established by the Parking Consultant at the rate of 2.5 spaces per 1,000 square feet of building area.
4	Parking requirements for Lodging and Residential facilities are computed other than the ratio used in Item 4 above.

Codes		Construction Cost	Project Cost
G	General / Office Space	$170 / gsf	$230 / gsf
C	Clinical Space (w/o primary offices)	$185 / gsf	$250 / gsf
M	Clinical / Medical Office Building	$185 / gsf	$250 / gsf
A	Acedemic (Office + Classroom)	$170 / gsf	$230 / gsf
R	Research Space	$250 / gsf	$325 / gsf
CAR	Clinical / Academic / Research	$192 / gsf	$260 / gsf
S	Steam & Chilled Water Plant	$845 / gsf	$1150 / gsf
T	Steam & Chilled Water Tunnel	$1200 / LF	$1600 / LF
P	Parking, structured or inground	$11,000 / sp	$14,500 / sp

OUHSC FACILITIES & PARKING

Administration & Operations											
G	Administrative Services Center		62,000					Vacate Administrative Services Bldg	155	$ 17,100,000	10 year
G	Relocate Admin. From Rogers Bldg.		48,000	24,000		(48,000)		Relocate to Admin. SC Vacate Rogers Bldg.	180	$ 16,560,000	10 year
G	New Enterprise T3 Data Center		6,000		(6,000)			Vacate Administrative Services Bldg	15	$ 8,140,000	10 year
P	ASC Parking Garage						90,000	3 deck, 750 spaces	n/a	$ 4,350,000	10 year
P	ASC Parking Garage - Overflow						293,000	1 deck add'n., 300 sp 3 deck expan., 150 sp	n/a	$ 12,780,000	10 year
G	Operations Center / Motor Pool		14,400	27,700	(14,400)			Vacate Administrative Services Bldg	105	$ 6,200,000	5 year
	Motor Pool		3,400					Vacate Existing Building	9	$ 780,000	5 year
--	Demolish Admin. & Motor Pool				(104,600)				n/a	$ 300,000	10 year
G	Hazardous Materials Storage		2,700					Vacate and Demo Existing Bldg.	7	$ 600,000	10 year
G	Student Union 4th Floor Add'n			12,000				Recreational & Student Services	30	$ 2,700,000	5 year
G	Student Union East Addition			20,000				Student Support	50	$ 4,000,000	15 year
P	East Parking Structure, Phase 1						487,500	5 deck, 1,500 spaces	n/a	$ 21,800,000	5 year
P	East Parking Structure, Phase 2						487,500	5 deck, 1,500 spaces	n/a	$ 21,800,000	10 year
G	Campus Police Station Add'n, Ph 1			2,572					n/a	$ 528,000	Current
G	Campus Police Station Add'n, Ph 2			5,000					n/a	$ 1,060,000	5 year
T	New Steam & CW Tunnel, Phase 1	500 LF						Extend tunnel south of 8th Street	n/a	$ 800,000	5 year
S	Steam & Chilled Water Plant, Ph 3			9,200				Chiller Expansion, Last Phase	23	$ 10,600,000	10 year
S	New Steam & CW Plant, Phase 1	20,000						South of 8th Street	50	$ 23,000,000	5 year
T	New Steam & CW Tunnel, Phase 2	1,000 LF						South of 8th Street	n/a	$ 1,600,000	5 year
S	New Steam & CW Plant, Phase 2	20,000						South of 8th Street	50	$ 23,000,000	15 year
T	New Steam & CW Tunnel, Phase 3	3,000 LF						South of 8th Street	n/a	$ 4,800,000	15 year
	Sub-Totals	**40,000**	**136,500**	**100,472**	**(125,000)**	**(48,000)**	**1,358,000**		**674**	**$ 182,498,000**	

Appendix B1 - Projected Expansion Arranged by Entities, cont'd

G = General / Office Space C + Clinical Space A = Acedemic Space R = Research Space P = Parking S = Steam & Chilled Water Plant T = Utility Tunnel

	FACILITY	NEW gsf	REPLACE gsf	EXPAND gsf	RELOCATE gsf	REPURPOSE & RENOVATE gsf	STRUCTURED PARKING gsf	COMMENTS	PARKING REQMTS spaces	ESTIMATED PROJECT COST 2006 Pricing	TIME FRAME
College Of Medicine											
M	OU Cancer Institute, Phase 1	140,000							350	$ 75,800,000	Current
P	Oklahoma Cancer Institute Prkg. Struct. Ph. 1						300,000	3 deck, 1000 spaces under building	n/a	$ 14,200,000	Current
C	Oklahoma Diabetes Center (Pediatric)	20,000						Relocates to Children's MOB	50	$ 5,000,000	Current
C	OU Diabetes Center (Adult), 1.35 flrs	36,000						Mixed use facility w/ Academic Office Bldg	90	$ 9,000,000	Current
A	Academic Office Building, 4.65 flrs	172,800						Includes 50,000 gsf for temp. Pediatric Offices	432	$ 39,744,000	5 year
A	Academic Office Building Shell, 2 flr	75,600						2 floors	n/a	$ 7,938,000	5 year
P	Diabetes / Office Prkg. Structure						189,000	3 deck, 630 spaces under building	n/a	$ 8,946,000	5 year
A	Family Medicine Classroom			2,700					7	$ 765,000	5 year
R	Resource Annex 2	25,000							63	$ 4,000,000	Current
A	Basic Sciences Education Bldg.				(18,000)	18,000		Relocate Admin. Functions	0	$ 3,600,000	Current
M	OU Cancer Institute, Phase 2	140,000							350	$ 90,000,000	10 year
P	OU Cancer Inst. Prkg. Struct, Ph. 2						150,000	3 deck, 500 spaces under building	n/a	$ 7,000,000	10 year
A	Pediatric Office Add'n - N. Pavilion	40,000							100	$ 9,200,000	15 year
P	Pediatric Office Parking Structure							2 deck, 100 spaces under building	n/a	$ 2,130,000	15 year
R	BRC, Phase 3a	97,600						8 stories shell, 4 stories buildout	244	$ 35,760,000	10 year
P	BRC Parking Structure						240,000	2 deck, 600 spaces under building	n/a	$ 11,360,000	10 year
C	OU Physicians Expansion	140,000							350	$ 25,000,000	10 year
P	OU Physicians Prkg. Structure						120,000	2 deck, 400 spaces under building	n/a	$ 5,680,000	10 year
R	BRC, Phase 3b	97,600						4 stories buildout	244	$ 16,240,000	15 year
A	Academic Offices, Finish-out 2 flrs			75,600				2 floors	189	$ 9,575,000	15 year
M	OU Cancer Institute, Phase 3	140,000							350	$ 90,000,000	15 year
P	OU Cancer Inst. Prkg. Struct. Ph. 3						150,000	3 deck, 500 spaces under building	n/a	$ 7,100,000	15 year
A	Pediatric Office Renov'n, N. Pavilion					2,600			n/a	$ 210,000	Current
	Sub-Totals	**1,124,600**	**0**	**78,300**	**(18,000)**	**20,600**	**1,149,000**		**2,818**	**$ 478,248,000**	
College of Allied Health											
G									0		
CAR	Allied Health Building		114,270					Includes Speech & Hearing Facilities	286	$ 26,623,000	Current
A									0		
R									0		
	Sub-Totals	**0**	**114,270**	**0**	**0**	**0**	**0**		**286**	**$ 26,623,000**	
College of Nursing											
G	Case Management Program				(20,000)			Relocate to leased space	0		Current
G	Faculty & Staff Offices					20,000			n/a	$ 2,750,000	5 year
C									0		
A	Classrooms	13,700							34	$ 3,150,000	5 year
R									0		
P									n/a		
	Sub-Totals	**13,700**	**0**	**0**	**(20,000)**	**20,000**	**0**		**34**	**$ 5,900,000**	
College of Phamacy											
C									0		
A	Classroom Addition			9,600					24	$ 2,349,000	10 year
R									0		
G	Faculty & Staff Office Addition			8,100					20	$ 1,875,000	10 year
P											
	Sub-Totals	**0**	**0**	**17,700**	**0**	**0**	**0**		**44**	**$ 4,224,000**	

Appendix B1 - Projected Expansion Arranged by Entities, cont'd

G = General / Office Space C + Clinical Space A = Acedemic Space R = Research Space P = Parking S = Steam & Chilled Water Plant T = Utility Tunnel

	FACILITY	NEW gsf	REPLACE gsf	EXPAND gsf	RELOCATE gsf	REPURPOSE & RENOVATE gsf	STRUCTURED PARKING gsf	COMMENTS	PARKING REQMTS spaces	ESTIMATED PROJECT COST 2006 Pricing	TIME FRAME
College of Dentistry											
G									0		
C	New Clinical Practice Facility	13,000						Free-standing building	33	$ 2,925,000	5 year
A	Expanded Academic Facilities			10,000		2,500			25	$ 2,300,000	10 year
P											
	Sub-Totals	**13,000**	**0**	**10,000**	**0**	**2,500**	**0**		**58**	**$ 5,225,000**	
College of Public Health											
G									0		
C									0		
A	Renovate College of Health Building					112,000		Renovate & repurpose for Public Health	0	$ 5,000,000	5 year
R									0		
P											
	Sub-Totals	**0**	**0**	**0**	**0**	**112,000**	**0**		**0**	**$ 5,000,000**	
Graduate College (none)											
G									0		
C									0		
A									0		
R									0		
P											
	Sub-Totals	**0**	**0**	**0**	**0**	**0**	**0**		**0**	**$ -**	
	TOTALS - OUHSC	**1,191,300**	**250,770**	**206,472**	**(163,000)**	**107,100**	**2,507,000**		**3,914**	**$ 707,718,000**	
UNIVERSITY HOSPITAL AUTHORITY & TRUST (UHAT)											
	Everett Tower Parking Structure						366,135	3 deck, 900 spaces	n/a	$ 17,750,000	under constr'n
	Pediatric MOB	259,200						12 story w/ parking below	648	$ 54,530,000	under constr'n
	PMOB Parking Structure Below						40,153		n/a	$ 1,450,000	under constr'n
	Everett Tower Atrium	66,500							166	$ 14,300,000	Current
	Education Center	33,000							83	$ 4,420,000	Current
	TOTALS - UHAT	358,700	0	0	0	0	406,288		897	$ 92,450,000	
OU MEDICAL CENTER											
	Inpatient / ICU / Outpatient Addition			335,500					839	$ 140,975,000	5 year
	Parking Structure						234,000	3 deck, 700 spaces	n/a	$ 10,000,000	5 year
	TOTALS - OU MEDICAL CENTER	**0**	**0**	**335,500**	**0**	**0**	**234,000**		**839**	**$ 150,975,000**	
STATE OF OKLAHOMA AGENCIES											
Oklahoma School for Science and Math											
	Dorm Expansion			40,000					n/a	$ 6,500,000	10 year
Department of Human Services											
	DHS Training Center	179,772						surface parking - 71 spaces	449	$ 30,000,000	5 year
	Parking Structure						108,900	4 deck, 363 spaces	n/a	$ 3,630,000	5 year
Oklahoma State Department of Health											
	OSDH Addition, Phase 1			40,000				Prefer to lease Surface parking	100	$ 7,400,000	5 year
	OSDH Addition, Phase 2			40,000				Prefer to lease Surface parking	100	$ 7,400,000	15 year
Oklahoma State Medical Examiner											
	Replace ME Facility	55,000	(18,000)					Replace existing building on site	93	$ 15,000,000	10 year
	TOTALS - STATE AGENCIES	**234,772**	**(18,000)**	**120,000**	**0**	**0**	**108,900**		**742**	**$ 69,930,000**	

Appendix B1 - Projected Expansion Arranged by Entities, cont'd

G = General / Office Space C + Clinical Space A = Acedemic Space R = Research Space P = Parking S = Steam & Chilled Water Plant T = Utility Tunnel

FACILITY	NEW gsf	REPLACE gsf	EXPAND gsf	RELOCATE gsf	REPURPOSE & RENOVATE gsf	STRUCTURED PARKING gsf	COMMENTS	PARKING REQMTS spaces	ESTIMATED PROJECT COST 2006 Pricing	TIME FRAME
OTHER INSTITUTIONS & ENTITIES										
Oklahoma Medical Research Foundation										
OMRF Parking Structure						189,000	3 deck, 630 spaces	n/a	$ 7,400,000	5 year
OMRF Research Building	110,400							276	$ 40,000,000	5 year
OMRF Research Labs - Buildout			123,200					308	$ 32,715,000	10 year
Presbyterian Health Foundation Research Park										
PHF Parking Structure, Phase 2						330,000	4 deck, 1100 spaces	n/a	$ 11,000,000	under constr'n
PHF Building 7	142,200							356	$ 23,000,000	Current
PHF Building 8	118,500							296	$ 18,000,000	5 year
PHF Building 9	118,500							296	$ 18,000,000	10 year
PHF Building 10	50,000							125	$ 8,000,000	10 year
Presbyterian Health Foundation Research Park North										
RP-North Medical Mall	250,000						7 stories	625	$ 62,500,000	5 year
RP-North Office / Manufacturing	66,400						3 stories	166	$ 15,272,000	5 year
RP-North Non-Profit Offices	32,000						2 stories	80	$ 7,360,000	5 year
RP-North Parking Structure						230,100	3 deck, 708 spaces	n/a	$ 10,266,000	5 year
Presbyterian Health Foundation Research Park East										
PHF-East, Building E1	150,000							375	$ 24,300,000	5 year
PHF-East, Parking Garage EG1						390,000	3 deck, 1100 spaces	n/a	$ 17,040,000	10 year
PHF-East, Building E2	150,000							375	$ 24,300,000	10 year
PHF-East, Building E3	150,000							375	$ 24,300,000	15 year
Oklahoma Blood Institute										
OBI Expansion			55,000					138	$ 11,000,000	5 year
Dean A. McGee Eye Institute										
DMEI Expansion			70,000					175	$ 33,000,000	5 year
DMEI Parking Structure						126,000	3 deck, 420 spaces	n/a	$ 4,200,000	5 year
Lodging / Conferencing										
Hotel / Conference Center	168,000						Full-service facility	420	$ 22,500,000	5 year
Hotel / Conf. Ctr. Parking Structure	97,500						2 deck, 320 spaces	n/a	$ 4,260,000	5 year
Mid-range lodging (affordable)	100,000						Patients, families, trainers, trainees	250	$ 16,000,000	5 year
Extended-stay Lodging	48,000						Patients, families, trainers, temp. faculty	120	$ 7,000,000	5 year
Cancer Caring House, 20 rooms	14,000						Out-of-town patients	35	$ 2,450,000	5 year
Childrens Caring House, 15 rooms	11,000						Out-of-town patients & families	28	$ 1,925,000	5 year
TOTALS - OTHER ENTITIES	**1,776,500**	**0**	**248,200**	**0**	**0**	**1,265,100**		**4,819**	**$ 445,788,000**	
MULTI-FAMILY RESIDENTIAL										
Multi-family Residential Developments										
University Housing, 150 units	135,000						Density @ 25 u/acre, south of 8th street	338	$ 8,250,000	5 year
Private Development Housing, 150 un	135,000						Density @ 25 u/acre, south of 8th street	338	$ 8,250,000	10 year
TOTALS - MULTI FAMILY	**270,000**	**0**	**0**	**0**	**0**	**0**		**676**	**$ 16,500,000**	

Appendix B2 - Projected Expansion Arranged by Superblock

G = General / Office Space C + Clinical Space A = Acedemic Space R = Research Space P = Parking

	FACILITY	NEW gsf	REPLACE gsf	EXPAND gsf	RELOCATE gsf	REPURPOSE & RENOVATE gsf	STRUCTURED PARKING gsf	COMMENTS	PARKING REQMTS spaces	ESTIMATED COST 2006 Pricing	TIME FRAME
								STRUCTURED			
SUMMARY BY SUPERBLOCK	Refer to Kep Map for Superblock Locations							PARKING - spaces			
A		619,600	0	75,600	(18,000)	18,000	549,000	1,630	1,549	$ 172,843,000	
B		418,700	0	10,000	0	5,100	406,288	1,200	1,072	$ 111,290,000	
C		0	0	335,500	0		234,000	700	839	$ 150,975,000	
D		0	0	70,000	(104,600)	0	126,000	420	175	$ 37,500,000	
E	No Planned Facilities	0	0	0	0	0	0	0	0	$ 0	
F		475,000	(18,000)	91,900	0	0	600,000	2,000	1,373	$ 326,065,000	
G		38,700	128,670	77,400	(34,400)	20,000	975,000	3,000	612	$ 97,247,000	
H	No Planned Facilities	0	0	0	0	0	0	0	0	$ 0	
I		110,400	0	123,200	0	112,000	189,000	630	584	$ 85,115,000	
J		38,000	0	0	0	0	0	0	96	$ 7,300,000	
OSSM		0	0	40,000	0	0	0	0	n/a	$ 6,500,000	
K		348,400	0	55,000	0	0	230,100	708	1,009	$ 106,398,000	
L		429,200	0	0	0	0	330,000	1,100	1,073	$ 78,000,000	
	Totals North of 8th Street	**2,478,000**	**110,670**	**878,600**	**(157,000)**	**155,100**	**3,639,388**	**11,388**	**8,382**	**$ 1,179,233,000**	
	Totals South of 8th Street	**1,353,272**	**118,700**	**31,572**	**(6,000)**	**(48,000)**	**881,900**	**2,550**	**3,497**	**$ 303,348,000**	
	GRAND TOTALS	**3,831,272**	**229,370**	**910,172**	**(163,000)**	**107,100**	**4,521,288**	**13,938**	**11,879**	**$ 1,482,581,000**	
	TOTAL NEW, REPLACED & EXPANDED			**4,970,814**	**(Excludes Structured Parking)**						
A											
College Of Medicine											
C	Oklahoma Diabetes Inst. (Adult), 1.35 flrs	36,000						Mixed use facility w/ Academic Office Bldg	90	$ 9,000,000	Current
A	Basic Sciences Education Bldg.				(18,000)	18,000		Relocate Admin. Functions	0	$ 3,600,000	Current
A	Academic Office Building, 4.65 flrs	172,800						Includes 50,000 gsf for temp. Pediatric Offices	432	$ 39,744,000	5 year
A	Academic Office Building Shell, 2 flr	75,600						2 stories	n/a	$ 7,938,000	5 year
P	Diabetes / Office Prkg. Structure						189,000	3 deck, 630 spaces under building	n/a	$ 8,946,000	5 year
R	BRC, Phase 3a	97,600						8 stories shell, 4 stories buildout	244	$ 35,760,000	10 year
P	BRC Parking Structure						240,000	2 deck, 600 spaces under building	n/a	$ 11,360,000	10 year
	5 Year Totals	**382,000**	**0**	**0**	**(18,000)**	**18,000**	**429,000**		**766**	**$ 116,348,000**	
College Of Medicine											
C	OU Physicians Expansion	140,000							350	$ 25,000,000	10 year
P	OU Physicians Prkg. Structure						120,000	2 deck, 400 spaces under building	n/a	$ 5,680,000	10 year
R	BRC, Phase 3b	97,600						4 stories buildout	244	$ 16,240,000	10 year
	10 Year Totals	**237,600**	**0**	**0**	**0**	**0**	**120,000**		**594**	**$ 46,920,000**	
College Of Medicine											
A	Academic Offices, Finish-out 2 flrs			75,600				2 floors	189	$ 9,575,000	15 year
	15 Year Totals	0	0	75,600	0	0	0		189	$ 9,575,000	
	Block Totals	619,600	0	75,600	(18,000)	18,000	549,000		1,549	$ 172,843,000	

Appendix B2 - Projected Expansion Arranged by Superblock, cont'd

G = General / Office Space C + Clinical Space A = Acedemic Space R = Research Space P = Parking

	FACILITY	NEW gsf	REPLACE gsf	EXPAND gsf	RELOCATE gsf	REPURPOSE & RENOVATE gsf	STRUCTURED PARKING gsf	COMMENTS	PARKING REQMTS spaces	ESTIMATED COST 2006 Pricing	TIME FRAME
B											
UNIVERSITY HOSPITAL AUTHORITY & TRUST (UHAT)											
	Everett Tower Parking Structure						366,135	3 deck, 900 spaces	n/a	$ 17,750,000	under constr'n
	Pediatric MOB	259,200						12 story w/ parking below	648	$ 54,530,000	under constr'n
	PMOB Parking Structure Below						40,153		n/a	$ 1,450,000	under constr'n
	Everett Tower Atrium	66,500							166	$ 14,300,000	Current
	Education Center	33,000							83	$ 4,420,000	Current
	Under Construction Totals	358,700	0	0	0	0	406,288		897	$ 92,450,000	
College Of Medicine											
C	Oklahoma Diabetes Inst. (Pediatric)	20,000						Relocates to Children's MOB	50	$ 5,000,000	Current
A	Pediatric Office Renov'n, N. Pavilion					2,600			n/a	$ 210,000	Current
College of Dentistry											
A	Expanded Academic Facilities			10,000		2,500			25	$ 2,300,000	10 year
	5 Year Totals	**20,000**	**0**	**10,000**	**0**	**5,100**	**0**		**75**	**$ 7,510,000**	
College Of Medicine											
A	Pediatric Office Add'n - N. Pavilion	40,000							100	$ 9,200,000	15 year
P	Pediatric Office Parking Structure							2 deck, 100 spaces under building	n/a	$ 2,130,000	15 year
	15 Year Totals	**40,000**	**0**	**0**	**0**	**0**	**0**		**100**	**$ 11,330,000**	
	Block Totals	418,700	0	10,000	0	5,100	406,288		1,072	$ 111,290,000	
	Total New, Replace & Expand	428,700									
C											
OU Medical Center (HCA)											
	Inpatient / ICU / Outpatient OUMC			335,500					839	$ 140,975,000	5 year
	Parking Structure - OUMC						234,000	3 deck, 700 spaces	n/a	$ 10,000,000	5 year
	5 Year Totals	**0**	**0**	**335,500**	**0**	**0**	**234,000**		**839**	**$ 150,975,000**	
D											
Dean A. McGee Eye Institute											
	DMEI Expansion			70,000					175	$ 33,000,000	5 year
	DMEI Parking Structure						126,000	3 deck, 420 spaces	n/a	$ 4,200,000	5 year
	5 Year Totals	0	0	70,000	0	0	126,000		175	$ 37,200,000	
Administration & Operations											
--	Demolish Admin. & Motor Pool				(104,600)				n/a	$ 300,000	10 year
	10 Year Totals	0	0	0	(104,600)	0	0		0	$ 300,000	
	Block Totals	0	0	70,000	(104,600)	0	126,000		175	$ 37,500,000	
E											
	No Planned Facilities										
	Block Totals										
F											
College Of Medicine											
A	Family Medicine Classroom			2,700					7	$ 765,000	5 year
M	OU Cancer Institute, Phase 1	140,000							350	$ 75,800,000	Current
P	OU Cancer Institute Prkg. Struct, Ph 1						300,000	3 deck, 1000 spaces under building	n/a	$ 14,200,000	Current
T	New Steam & CW Tunnel, Phase 1	500 LF						Extend tunnel south of 8th Street	n/a	$ 800,000	5 year
Oklahoma State Department of Health											
	OSDH Addition, Phase 1			40,000				Prefer to lease Surface parking	100	$ 7,400,000	5 year
	5 Year Totals	**140,000**	**0**	**42,700**	**0**	**0**	**300,000**		**457**	**$ 98,965,000**	
Administration & Operations											
S	Steam & Chilled Water Plant, Ph 3			9,200				Chiller Expansion, Last Phase	23	$ 10,600,000	10 year
College Of Medicine											

Appendix B2 - Projected Expansion Arranged by Superblock, cont'd

G = General / Office Space C + Clinical Space A = Acedemic Space R = Research Space P = Parking

	FACILITY	NEW gsf	REPLACE gsf	EXPAND gsf	RELOCATE gsf	REPURPOSE & RENOVATE gsf	STRUCTURED PARKING gsf	COMMENTS	PARKING REQMTS spaces	ESTIMATED COST 2006 Pricing	TIME FRAME
M	OU Cancer Institute, Phase 2	140,000							350	$ 90,000,000	10 year
P	OU Cancer Institute Prkg. Struct. Ph 2						150,000	3 deck, 500 spaces under building	n/a	$ 7,000,000	10 year
Oklahoma State Medical Examiner											
	Replace ME Facility	55,000	(18,000)					Replace existing building on site	93	$ 15,000,000	10 year
	10 Year Totals	195,000	(18,000)	9,200	0	0	150,000		466	$ 122,600,000	
College Of Medicine											
M	OU Cancer Institute, Phase 3	140,000							350	$ 90,000,000	15 year
P	OU Cancer Institute Prkg. Struct, Ph 3						150,000	3 deck, 500 spaces under building	n/a	$ 7,100,000	15 year
Oklahoma State Department of Health											
	OSDH Addition, Phase 2			40,000				Prefer to lease Surface parking	100	$ 7,400,000	15 year
	15 Year Totals	**140,000**	**0**	**40,000**	**0**	**0**	**150,000**		**450**	**$ 104,500,000**	
	Block D totals	475,000	(18,000)	91,900	0	0	600,000		1,373	$ 326,065,000	
	Total New, Replace & Expand	548,900									
G											
Administration & Operations											
G	Student Union 4th Floor Addition			12,000				Recreational & Student Services	30	$ 2,700,000	5 year
P	East Parking Structure, Phase 1						487,500	5 deck, 1,500 spaces	n/a	$ 21,800,000	5 year
College of Medicine											
G	Resource Annex 2	25,000							63	$ 4,000,000	Current
College of Allied Health											
CAR	College of Allied Health Building		114,270	0				Includes Speech & Hearing Facilities	286	$ 26,623,000	Current
College of Nursing											
G	Case Mgmt Program, Nursing				(20,000)			Relocate to leased Space	0		Current
G	Faculty & Staff Offices, Nursing					20,000			n/a	$ 2,750,000	5 year
A	Classrooms, Nursing	13,700							34	$ 3,150,000	5 year
College of Phamacy											
G	Faculty & Staff Office Addition			8,100					20	$ 1,875,000	10 year
	5 Year Totals	**38,700**	**114,270**	**20,100**	**(20,000)**	**20,000**	**487,500**		**433**	**$ 62,898,000**	
Administration & Operations											
P	East Parking Structure, Phase 2						487,500	5 deck, 1,500 spaces	n/a	$ 21,800,000	10 year
G	Operations Center / Motor Pool		14,400	27,700	(14,400)			Vacate Administrative Services Bldg.	105	$ 6,200,000	5 year
College of Phamacy											
A	Classroom Addition			9,600					24	$ 2,349,000	10 year
	10 Year Totals	**0**	**14,400**	**37,300**	**(14,400)**	**0**	**487,500**		**129**	**$ 30,349,000**	
Administration & Operations											
G	Student Union East Addtion			20,000				Student Support	50	$ 4,000,000	15 year
	15 Year Totals	**0**	**0**	**20,000**	**0**	**0**	**0**		**50**	**$ 4,000,000**	
	Block C totals	38,700	128,670	77,400	(34,400)	20,000	975,000		612	$ 97,247,000	
	Total New, Replace & Expand	244,770									
H											
	No Planned Facilities										
	5 Year Totals	0	0	0	0	0	0		0	$ -	
I											
Oklahoma Medical Research Foundation											
	OMRF Research Building	110,400							276	$ 40,000,000	5 year
	OMRF Parking Structure						189,000	3 deck, 630 spaces	n/a	$ 7,400,000	5 year
College of Public Health											
A	Renovate College of Health Building					112,000			0	$ 5,000,000	10 year
	5 Year Totals	110,400	0	0	0	112,000	189,000		276	$ 52,400,000	

Appendix B2 - Projected Expansion Arranged by Superblock, cont'd

G = General / Office Space C + Clinical Space A = Acedemic Space R = Research Space P = Parking

	FACILITY	NEW gsf	REPLACE gsf	EXPAND gsf	RELOCATE gsf	REPURPOSE & RENOVATE gsf	STRUCTURED PARKING gsf	COMMENTS	PARKING REQMTS spaces	ESTIMATED COST 2006 Pricing	TIME FRAME
Oklahoma Medical Research Foundation											
	OMRF Research Labs - Buildout			123,200					308	$ 32,715,000	10 year
	10 Year Totals	0	0	123,200	0	0	0		308	$ 32,715,000	
	Block Totals	110,400	0	123,200	0	112,000	189,000		584	$ 85,115,000	
J											
Lodging											
	Cancer Caring House, 20 rooms	14,000						Out-of-town patients	35	$ 2,450,000	5 year
	Children's Caring House, 15 rooms	11,000						Out-of-town patients & families	28	$ 1,925,000	5 year
College of Dentistry											
C	New Clinical Practice Facility	13,000						Free-standing building	33	$ 2,925,000	5 year
	5 Year Totals	38,000	0	0	0	0	0		97	$ 7,300,000	
OSSM											
Oklahoma Sschool for Science and Math											
	Dorm Expansion			40,000					n/a	$ 6,500,000	10 year
	10 Year Totals			**40,000**					**n/a**	**$ 6,500,000**	
K											
Presbyterian Health Foundation - Research Park North											
	RP-North Medical Mall	250,000						7 stories	625	$ 62,500,000	5 year
	RP-North Office / Manufacturing	66,400						3 stories	166	$ 15,272,000	5 year
	RP-North Non-Profit Offices	32,000						2 stories	80	$ 7,360,000	5 year
	RP-North Parking Structure						230,100	3 deck, 708 spaces	n/a	$ 10,266,000	5 year
Oklahoma Blood Institute											
	OBI Expansion			55,000					138	$ 11,000,000	5 year
	OBI Parking Lot							Undetermined	n/a		
	5 Year Totals	348,400	0	55,000	0	0	230,100		1,009	$ 106,398,000	
	Block Totals	348,400	0	55,000	0	0	230,100		1,009	$ 106,398,000	
L											
Presbyterian Health Foundation Research Park											
	PHF Parking Structure, Phase 2						330,000	3 deck, 1100 spaces	n/a	$ 11,000,000	under const
	PHF Building 7	142,200							356	$ 23,000,000	Current
	PHF Building 8	118,500							296	$ 18,000,000	5 year
	PHF Building 9	118,500							296	$ 18,000,000	10year
	PHF Building 10	50,000							125	$ 8,000,000	10year
	5 Year Totals	429,200	0	0	0	0	330,000		1,073	$ 78,000,000	

Appendix B2 - Projected Expansion Arranged by Superblock, cont'd

G = General / Office Space C + Clinical Space A = Acedemic Space R = Research Space P = Parking

	FACILITY	NEW gsf	REPLACE gsf	EXPAND gsf	RELOCATE gsf	REPURPOSE & RENOVATE gsf	STRUCTURED PARKING gsf	COMMENTS	PARKING REQMTS spaces	ESTIMATED COST 2006 Pricing	TIME FRAME
	Facilities planned South of 8th Street (All)										
	Department of Human Services										
	DHS Training Center	179,772						surface parking - 70 spaces	449	$ 30,000,000	5 year
	DHS Parking Structure						108,900	4 deck, 380 spaces	n/a	$ 3,630,000	5 year
	Presbyterian Health Foundation - Research Park East										
	PHF-East, Building E1	150,000							375	$ 24,300,000	5 year
	Lodging / Conferencing										
	Hotel / Conference Center	168,000						Full-service facility	420	$ 22,500,000	5 year
	Hotel Conf. Ctr. Parking Structure	97,500						2 deck, 320 spaces	n/a	$ 4,260,000	5 year
	Mid-range lodging (Affordable)	100,000						Patients, families, trainers, trainees	250	$ 16,000,000	5 year
	Extended-stay Lodging	48,000						Patients, families, trainers, temp. faculty	120	$ 7,000,000	5 year
	OUHSC										
G	Hazardous Materials Storage		2,700					Vacate and Demo Existing Bldg.	7	$ 600,000	10 year
G	New Enterprise T3 Data Center		6,000		(6,000)			Vacate Admin. Services Bldg.	15	$ 8,140,000	10 year
G	Campus Police Station Add'n, Ph 1			2,572					n/a	$ 528,000	Current
S	New Steam & CW Plant, Phase 1	20,000							50	$ 23,000,000	5 year
T	New Steam & CW Tunnel, Phase 2	1000 LF							n/a	$ 1,600,000	5 year
	Multi-family Residential Developments										
	University Housing, 150 units	135,000						Density @ 25 u/acre, south of 8th street	338	$ 8,250,000	5 year
	5 Year Totals	**898,272**	**8,700**	**2,572**	**(6,000)**	**0**	**108,900**		**2,024**	**$ 149,808,000**	
	OUHSC										
G	Administrative Services Center		62,000					Vacate Administrative Services Bldg	155	$ 17,100,000	10 year
G	Relocate Admin. From Rogers Bldg.		48,000	24,000		(48,000)		Relocate to Admin. SC Vacate Rogers Bldg.	180	$ 16,560,000	10 year
P	ASC Parking Garage						90,000	3 deck, 750 spaces	n/a	$ 4,350,000	10 year
P	ASC Parking Garage - Overflow						293,000	1 deck add'n., 300 sp 3 deck expan., 150 sp	n/a	$ 12,780,000	10 year
	Multi-family Residential Developments										
	Private Development Housing, 150 un	135,000						Density @ 25 u/acre, south of 8th street	338	$ 8,250,000	10 year
	Presbyterian Health Foundation Research Park East										
	PHF-East, Building E2	150,000							375	$ 24,300,000	10 year
	PHF-East Parking Garage EG1						390,000	4 deck, 1100 spaces	n/a	$ 17,040,000	10 year
	10 Year Totals	**285,000**	**110,000**	**24,000**	**0**	**(48,000)**	**773,000**		**1,048**	**$ 100,380,000**	
G	Campus Police Station Add'n, Ph 2			5,000					n/a	$ 1,060,000	5 year
	PHF-East, Building E3	150,000							375	$ 24,300,000	15 year
S	New Steam & CW Plant, Phase 2	20,000							50	$ 23,000,000	15 year
T	New Steam & CW Tunnel, Phase 3	3000 LF							n/a	$ 4,800,000	15 year
	15 Year Totals	**170,000**	**0**	**5,000**	**0**	**0**	**0**		**425**	**$ 53,160,000**	
	TOTALS South of 8th Street	**1,353,272**	**118,700**	**31,572**	**(6,000)**	**(48,000)**	**881,900**		**3,497**	**$ 303,348,000**	

Appendix B3 - Projected Expansion Arranged by Time

G = General / Office Space C + Clinical Space A = Acedemic Space R = Research Space P = Parking S = Steam & Chilled Water Plant T = Utility Tunnel

	FACILITY	NEW gsf	REPLACE gsf	EXPAND gsf	RELOCATE gsf	REPURPOSE & RENOVATE gsf	STRUCTURED PARKING gsf	COMMENTS	PARKING REQMTS spaces	ESTIMATED PROJECT COST 2006 Pricing	TIME FRAME
	SUMMARY BY TIME FRAME										
	UNDER CONSTRUCTION	259,200	-	-	-	-	736,288		648	$ 84,730,000	
	CURRENT (Funded Projects)	462,700	114,270	2,572	(38,000)	20,600	300,000		1,444	$ 180,681,000	
	5 YEAR HORIZON	1,775,672	14,400	547,900	(14,400)	132,000	1,564,500		5,401	$ 616,066,000	
	10 YEAR HORIZON	886,100	100,700	224,100	(110,600)	(45,500)	1,770,500		2,928	$ 403,359,000	
	15 YEAR HORIZON	447,600	-	135,600	-	-	150,000		1,458	$ 197,745,000	
	TOTALS	**3,831,272**	**229,370**	**910,172**	**(163,000)**	**107,100**	**4,521,288**		**11,879**	**$ 1,482,581,000**	
	TOTAL NEW, REPLACED & EXPANDED			**4,970,814**	(Excludes Renovations & Structured Parking)						
	NOTES, ASSUMPTIONS, AND CALCULATIONS										
1	Building space requirements (gsf) are recorded from Strategic Plans and/or as presented in interviews -- verification of such data is beyond the scope of this effort.										
2	Estimated Project Cost at 2006 pricing is computed at 1.33 times estimates of Construction Cost, then rounded upward. (refer to table below)										
3	Parking ratios used for computing the Parking Requirements are established by the Parking Consultant at the rate of 2.5 spaces per 1,000 square feet of building area.										
4	Parking requirements for Lodging and Residential facilities are computed other than the ratio used in Item 4 above.										
Codes		Construction Cost	Project Cost								
G	General / Office Space	$170 / gsf	$230 / gsf								
C	Clinical Space (w/o primary offices)	$185 / gsf	$250 / gsf								
M	Clinical / Medical Office Building	$185 / gsf	$250 / gsf								
A	Acedemic (Office + Classroom)	$170 / gsf	$230 / gsf								
R	Research Space	$250 / gsf	$325 / gsf								
CAR	Clinical / Academic / Research	$192 / gsf	$260 / gsf								
S	Steam & Chilled Water Plant	$845 / gsf	$1150 / gsf								
T	Steam & Chilled Water Tunnel	$1200 / LF	$1600 / LF								
P	Parking, Structured or Ingound	$11,000 / sp	$14,500 / sp								
	UNDER CONSTRUCTION										
	Everett Tower Parking Structure						366,135	3 deck, 900 spaces	n/a	$ 17,750,000	under constr'n
	Pediatric MOB	259,200						12 story w/ parking below	648	$ 54,530,000	under constr'n
	PMOB Parking Structure Below						40,153		n/a	$ 1,450,000	under constr'n
	PHF Parking Structure, Phase 2						330,000	4 deck, 1100 spaces	n/a	$ 11,000,000	under constr'n
	TOTALS UNDER CONSTRUCTION	**259,200**	**0**	**0**	**0**	**0**	**736,288**		**648**	**$ 84,730,000**	
	CURRENT (Funded Projects not yet under construction)										
	Everett Tower Atrium	66,500							166	$ 14,300,000	Current
	Education Center	33,000							83	$ 4,420,000	Current
G	Campus Police Station Add'n, Ph 1			2,572					n/a	$ 528,000	Current
M	OU Cancer Institute, Phase 1	140,000							350	$ 75,800,000	Current
P	OU Cancer Institute Prkg. Struct. Ph. 1						300,000	3 deck, 1000 spaces under building	n/a	$ 14,200,000	Current
C	Oklahoma Diabetes Center (Pediatric)	20,000						Relocates to Children's MOB	50	$ 5,000,000	Current
C	Oklahoma Diabetes Cntr. (Adult), 1.35 flrs	36,000						Mixed use facility w/ Academic Office Bldg	90	$ 9,000,000	Current
CAR	Allied Health Building		114,270					Includes Speech & Hearing Facilities	286	$ 26,623,000	Current
G	Case Mgmt Program, Nursing				(20,000)			Relocating to leased space	0	n/a	Current
A	Basic Sciences Education Bldg.				(18,000)	18,000		Relocate Admin. Functions	0	$ 3,600,000	Current
R	Resource Annex 2	25,000							63	$ 4,000,000	Current
	PHF Building 7	142,200							356	$ 23,000,000	Current
A	Pediatric Office Renov'n N. Pavilion					2,600			n/a	$ 210,000	Current
	Totals for Current	**462,700**	**114,270**	**2,572**	**(38,000)**	**20,600**	**300,000**		**1,444**	**$ 180,681,000**	

Appendix B3 - Projected Expansion Arranged by Time, cont'd

G = General / Office Space C + Clinical Space A = Acedemic Space R = Research Space P = Parking S = Steam & Chilled Water Plant T = Utility Tunnel

	FACILITY	NEW gsf	REPLACE gsf	EXPAND gsf	RELOCATE gsf	REPURPOSE & RENOVATE gsf	STRUCTURED PARKING gsf	COMMENTS	PARKING REQMTS spaces	ESTIMATED PROJECT COST 2006 Pricing	TIME FRAME
0 - 5-YEAR HORIZON											
A	Family Medicine Classroom			2,700					7	$ 765,000	5 year
G	Student Union 4th Floor Addition			12,000				Recreational & Student Services	30	$ 2,700,000	5 year
G	Faculty & Staff Offices, Nursing					20,000			n/a	$ 2,750,000	5 year
A	Classrooms, Nursing	13,700							34	$ 3,150,000	5 year
P	East Parking Structure, Phase 1						487,500	5 deck, 1,500 spaces	n/a	$ 21,800,000	5 year
G	Campus Police Station Add'n, Ph 2			5,000					n/a	$ 1,060,000	5 year
T	New Steam & CW Tunnel, Ph 1	500 LF						Extends tunnel south of 8th Street	n/a	$ 800,000	5 year
G	Operations Center / Motor Pool		14,400	27,700	(14,400)			Vacate Admin. Bldg - Services Bldg.	105	$ 6,200,000	5 year
S	New Steam & CW Plant, Phase 1	20,000						South of 8th street	50	$ 23,000,000	5 year
T	New Steam & CW Tunnel, Phase 2	1,000 LF						South of 8th street	n/a	$ 1,600,000	5 year
A	Academic Office Building, 4.65 flrs	172,800						Includes 50,000 gsf for Temp. Pediatric Offices	432	$ 39,744,000	5 year
A	Academic Office Building Shell, 2flr	75,600						2 floors	n/a	$ 7,938,000	5 year
P	Diabetes / Office Prkg. Structure						189,000	3 deck, 630 spaces under building	n/a	$ 8,946,000	5 year
C	New Clinical Practice Facility, Dent.	13,000						Free-standing building	33	$ 2,925,000	5 year
	Hotel / Conference Center	168,000						Full-service facility	420	$ 22,500,000	5 year
	Hotel/Conf. Ctr. Parking Structure	97,500						2 deck, 320 spaces	n/a	$ 4,260,000	5 year
	Mid-range lodging (Affordable)	100,000						Patients, families, trainers, trainees	250	$ 16,000,000	5 year
	Extended-stay Lodging	48,000						Patients, families, trainers, temp. faculty	120	$ 7,000,000	5 year
	DHS Training Center	179,772						surface parking - 71 spaces	449	$ 30,000,000	5 year
	DHS Parking Structure						108,900	4 deck, 363 spaces	n/a	$ 3,630,000	5 year
	OSDH Addition, Phase 1			40,000				Prefer to lease Surface parking	100	$ 7,400,000	5 year
	University Housing, 150 units	135,000						Density @ 25 u/acre, south of 8th street	338	$ 8,250,000	5 year
	OMRF Research Laboratories	110,400							276	$ 40,000,000	5 year
	OMRF Parking Structure						189,000	3 deck, 630 spaces	n/a	$ 7,400,000	5 year
	PHF Building 8	118,500							296	$ 18,000,000	5 year
	OBI Expansion			55,000					138	$ 11,000,000	5 year
	DMEI Expansion			70,000					175	$ 33,000,000	5 year
	DMEI Parking Structure						126,000	3 deck, 420 spaces	n/a	$ 4,200,000	5 year
	RP-North Medical Mall	250,000						7 stories	625	$ 62,500,000	5 year
	RP-North Office / Manufacturing	66,400						3 stories	166	$ 15,272,000	5 year
	RP-North Non-Profit Offices	32,000						2 stories	80	$ 7,360,000	5 year
	RP-North Parking Structure						230,100	3 deck, 708 spaces	n/a	$ 10,266,000	5 year
	PHF East - Building E1	150,000							375	$ 24,300,000	5 year
A	Renovate College of Health Building					112,000		Renovate & repurpose[e] for Public Health	0	$ 5,000,000	5 year
	Cancer Caring House, 20 Rooms	14,000						Out-of-town patients	35	$ 2,450,000	5 year
	Children's Caring House, 15 Rooms	11,000						Out-of-town patients & families	28	$ 1,925,000	5 year
	Inpatient / ICU / Outpatient - OUMC			335,500					839	$ 140,975,000	5 year
	Parking Structure						234,000	3 deck, 700 spaces (inground)	n/a	$ 10,000,000	5 year
	Totals for 5-Year Horizon	**1,775,672**	**14,400**	**547,900**	**(14,400)**	**132,000**	**1,564,500**		**5,401**	**$ 616,066,000**	

Appendix B3 - Projected Expansion Arranged by Time, cont'd

G = General / Office Space C + Clinical Space A = Acedemic Space R = Research Space P = Parking S = Steam & Chilled Water Plant T = Utility Tunnel

	FACILITY	NEW gsf	REPLACE gsf	EXPAND gsf	RELOCATE gsf	REPURPOSE & RENOVATE gsf	STRUCTURED PARKING gsf	COMMENTS	PARKING REQMTS spaces	ESTIMATED PROJECT COST 2006 Pricing	TIME FRAME
5 - 10-YEAR HORIZON											
G	Administrative Services Center		62,000					Vacate Admin. Bldg - Services Bldg.	155	$ 17,100,000	10 year
G	Relocate Admin. From Rogers Bldg.		48,000	24,000		(48,000)		Relocate to Admin. SC Vacate Rogers Bldg.	180	$ 16,560,000	10 year
P	ASC Parking Garage						90,000	3 deck, 750 spaces	n/a	$ 4,350,000	10 year
P	ASC Parking Garage - Overflow						293,000	1 deck add'n., 300 sp 3 deck expan., 150 sp	n/a	$ 12,780,000	10 year
G	New Enterprise T3 Data Center		6,000		(6,000)			Vacate Administrative Services Bldg.	15	$ 8,140,000	10 year
G	Hazardous Materials Storage		2,700					Vacate and Demo Existing Bldg.	7	$ 600,000	10 year
P	East Parking Structure, Phase 2						487,500	5 deck, 1,500 spaces	n/a	$ 21,800,000	10 year
S	Steam & Chilled Water Plant, Ph 3			9,200				Chiller Expansion, Last Phase	23	$ 10,600,000	10 year
M	OU Cancer Institute Phase 2	140,000							350	$ 90,000,000	10 year
P	OU Cancer Institute Prkg. Struct, Ph. 2						150,000	3 deck, 500 spaces under building	n/a	$ 7,000,000	10 year
R	BRC, Phase 3a	97,600						8 stories shell, 4 stories buildout	244	$ 35,760,000	10 year
P	BRC Parking Structure						240,000	2 deck, 600 spaces under building	n/a	$ 11,360,000	10 year
A	Expand Academic Facilities, Dent.			10,000		2,500			25	$ 2,300,000	10 year
C	OU Physicians Expansion	140,000							350	$ 25,000,000	10 year
P	OU Physicians Prkg. Structure						120,000	2 deck, 400 spaces under building	n/a	$ 5,680,000	10 year
A	Classroom Addition, Pharmacy			9,600					24	$ 2,349,000	10 year
R	OMRF Research Labs - Buildout			123,200					308	$ 32,715,000	10 year
	Dorm Expansion, OSSM			40,000					n/a	$ 6,500,000	10 year
	Replace ME Facility	55,000	(18,000)					Replace existing building on site	93	$ 15,000,000	10 year
	Private Development Housing, 150 un	135,000						Density @ 25 u/acre, south of 8th street	338	$ 8,250,000	10 year
	PHF Building 9	118,500							296	$ 18,000,000	10 year
	PHF Building 10	50,000							125	$ 8,000,000	10 year
	PHF East, Building E2	150,000							375	$ 24,300,000	10 year
	PHF East, Parking Garage EG1						390,000	3 deck, 1100 spaces	n/a	$ 17,040,000	10 year
	Demolish Admin. & Motor Pool				(104,600)				n/a	$ 300,000	10 year
G	Faculty & Staff Office Add'n, Pharm			8,100					20	$ 1,875,000	10 year
	Totals for 10-Year Horizon	**886,100**	**100,700**	**224,100**	**(110,600)**	**(45,500)**	**1,770,500**		**2,928**	**$ 403,359,000**	
10 - 15-YEAR HORIZON											
A	Academic Offices, Finish-out 2 flrs			75,600				2 floors	189	$ 9,575,000	15 year
A	Pediatric Office Add'n - N. Pavilion	40,000							100	$ 9,200,000	15 year
P	Pediatric Office Parking Structure							2 deck, 100 spaces under building	n/a	$ 2,130,000	15 year
R	BRC, Phase 3b	97,600						4 stories buildout	244	$ 16,240,000	15 year
G	Student Union East Addition			20,000				Student Support	50	$ 4,000,000	15 year
M	OU Cancer Institute, Phase 3	140,000							350	$ 90,000,000	15 year
P	OU Cancer Inst Prkg. Struct. Ph. 3						150,000	3 deck, 500 spaces under building	n/a	$ 7,100,000	15 year
	OSDH Addition, Phase 2			40,000				Prefer to lease; Surface parking	100	$ 7,400,000	15 year
	PHF East - Building E3	150,000							375	$ 24,300,000	15 year
S	New Steam & CW Plant, Phase 2	20,000						South of 8th Street	50	$ 23,000,000	15 year
T	New Steam & CW Tunnel, Phase 3	3,000 LF						South of 8th Street	n/a	$ 4,800,000	15 year
	Totals for 15-Year Horizon	447,600	0	135,600	0	0	150,000		1,458	$ 197,745,000	

Appendix C: Proposals for the OKC Capitol Improvement Bond Issue

NE 13th STREET MEDIAN RECONFIGURATION BETWEEN PHILLIPS AND KELLEY
Reconfigure the mid-block medians to provide safe access to and exit from the OMRF main entrance, and to provide emergency vehicle access from westbound 13th Street to the relocated Children's Emergency Center in Everett Tower.

NE 8th STREET FROM PHILLIPS TO LOTTIE:
Upgrade to a four-lane boulevard with left-turn lanes, landscaped medians, sidewalks, and landscaped curblines; match the other streets in the Health Center. Extend sidewalks and landscaping westward to Lincoln. Provide a Gateway Intersection at the NE 8th and Lottie intersection.

PHILLIPS AVENUE FROM NE 8th STREET TO NE 6th STREET:
(This sub-project extends Phillips Ave south to NE 6th Street)
Extend Phillips Avenue south from NE 8th Street to a point 300-feet south of NE 8th Street four-lane boulevard with left-turn lanes, landscaped median, sidewalks, and landscaped edges. Connect to new curved street described below.

STONEWALL AVENUE FROM 8th STREET TO NE 6th STREET:
(This sub-project upgrades Stonewall Ave to match the existing street north of 8th street.)
Improve Stonewall Avenue south from NE 8th Street to a point 300-feet south of NE 8th Street four-lane boulevard with left-turn lanes, landscaped median, sidewalks, and landscaped edges. Connect to new curved street described below.

NE 6th STREET BETWEEN PHILLIPS AND STONEWALL:
(This sub-project upgrades NE 6th between Phillips Ave. and Stonewall Ave.)
Connect the south ends of Phillips and Stonewall Streets with a four-lane boulevard with left-turn lanes, landscaped medians, sidewalks, and landscaped edges to match the new Phillips and Stonewall streets.

NEW INTERSECTION AT NE 6th STREET AND LINCOLN:
Reopen the intersection of NE 6th Street on the east side of Lincoln Boulevard. Provide a divided entrance with median and a deceleration lane on northbound Lincoln.

NE 6th STREET FROM LINCOLN TO PHILLIPS DRIVE:
Rebuild NE 6th Street from the new Lincoln intersection to the new Phillips Drive; a two-lane street with parallel parking, sidewalks, and landscaping on both sides, a divided entrance with median at the Lincoln intersection, and a deceleration lane on northbound Lincoln.

These projects define the north border of the Health Center:

INTERSECTIONS OF KELLEY AND STONEWALL AT NE 13th STREET:
Realign NE 13th Street along a line from the center of the existing NE 13th and Kelley intersection to the center of the NE 13th and Stonewall intersection; realign Kelley and Stonewall to form an “X” intersection perpendicular to the new NE 13th alignment. All streets to be four-lane boulevards with left-turn lanes and landscaped medians. Rebuild Dean Place and connections to Kelley and NE 13th Street.

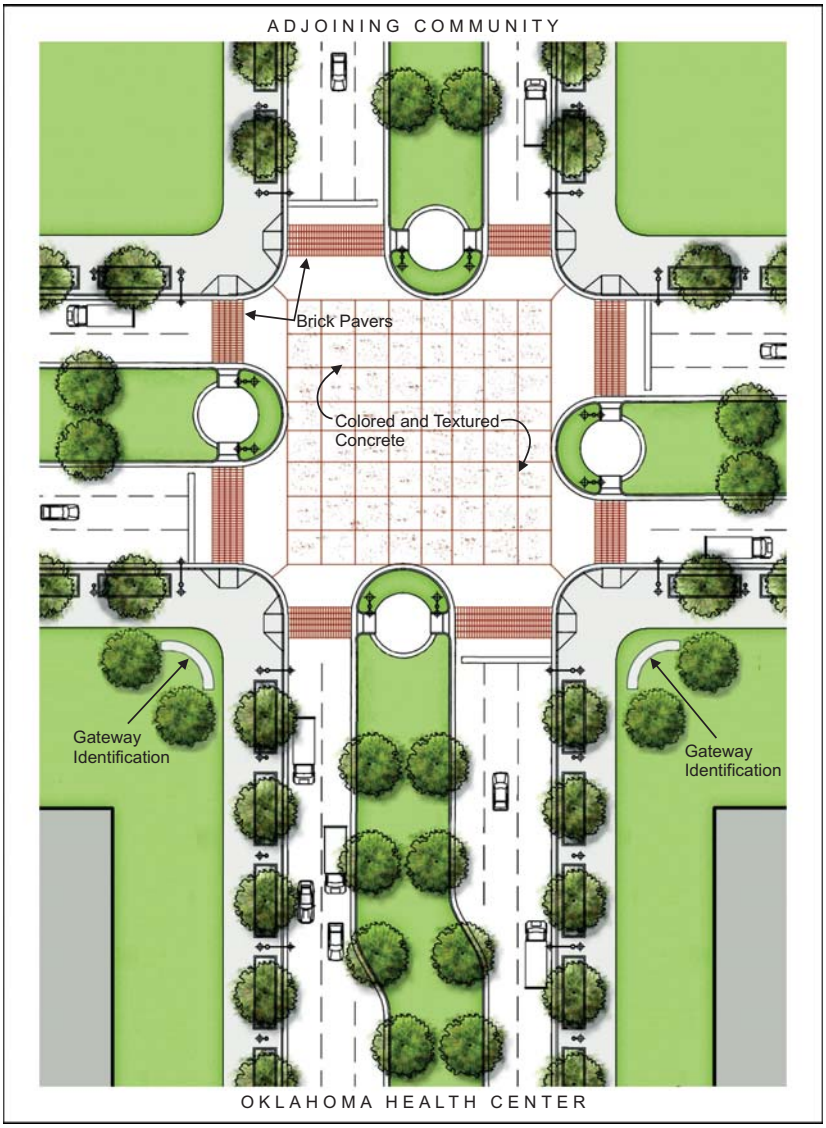
KELLEY AVE. FROM NE 13th STREET TO NE 16th STREET:
Reconfigure the Kelley intersection at 13th Street and upgrade Kelley north to NE 16th Street to a four-lane boulevard with left-turn lanes, landscaped medians and landscaped edges. Provide a Gateway Intersection at NE 16th and Kelley.

NE 16th STREET FROM KELLEY AVENUE TO PHILLIPS AVENUE:
Replace NE 16th Street from Kelley Avenue to Phillips Avenue with a two-lane boulevard style street, similar in street width to the existing McMeecham Parkway or Lindsey Street to the west, with left-turn lanes into parking areas, landscaped medians, and landscaped along the south edge.

N. PHILLIPS AVENUE FROM NE 13th TO NE 16th:
Replace the narrow, deteriorated existing street with a wider, two-lane street with a two-lane boulevard style street, similar in street width to the existing McMeecham Parkway or Lindsey Street to the west, with left-turn lanes into parking areas, landscaped medians, and landscaped edges. Provide a Gateway Intersection at NE 16th and Phillips.

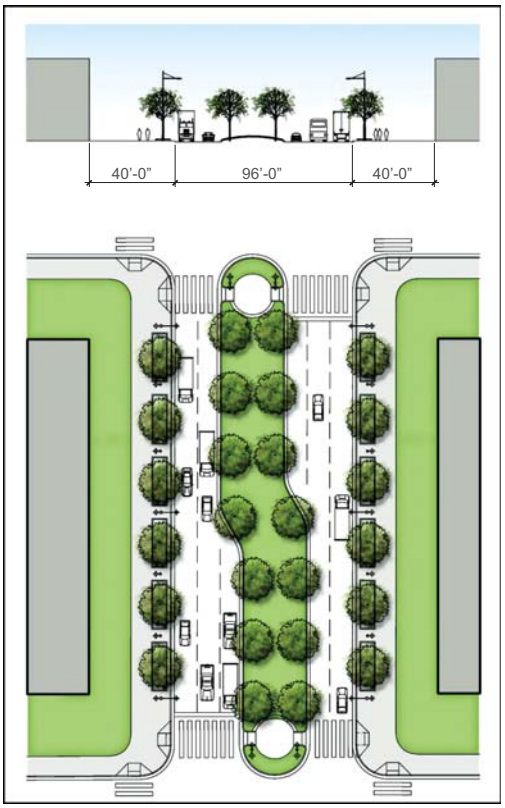
N. PHILLIPS AVENUE FROM NE 16th TO CULBERTSON DRIVE:
Replace the narrow, deteriorated existing street with a wider, two-lane street and improved intersections.

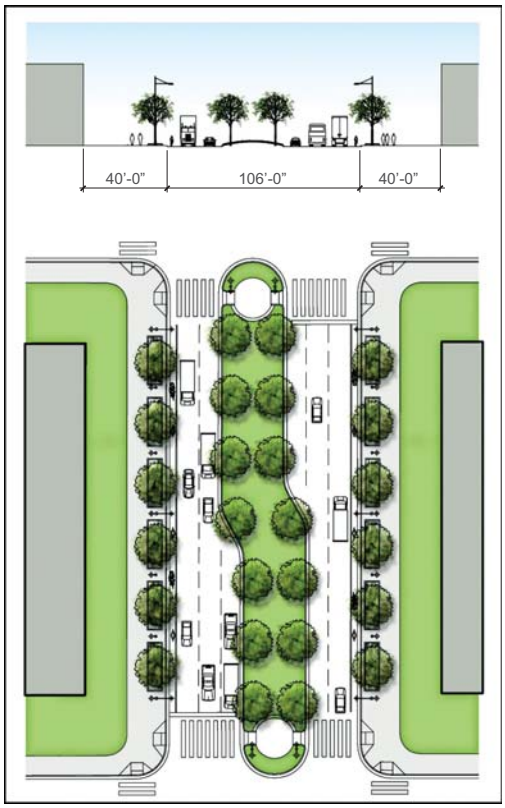
Appendix D: Representative Street Designs



Gateway Intersection Concept

Appendix D: Representative Street Designs, cont'd





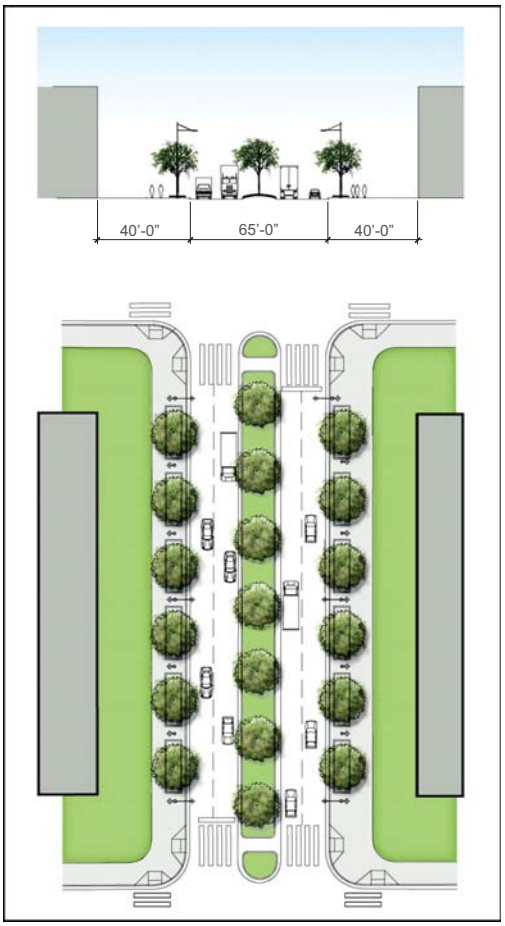
A1 - DIVIDED, TWO-LANE W/ LEFT-TURN LANES

- Separate Left-turn Lane
- Wide medians
- Wide sidewalks
- Well marked accessible pedestrian crossings
- Medians with pedestrian refuge at crosswalks
- Tree lined boulevard
- Landscaped medians and sidewalks
- Distinctive street lighting

A2 - DIVIDED, TWO-LANE W/ LEFT-TURN & BICYCLE LANE

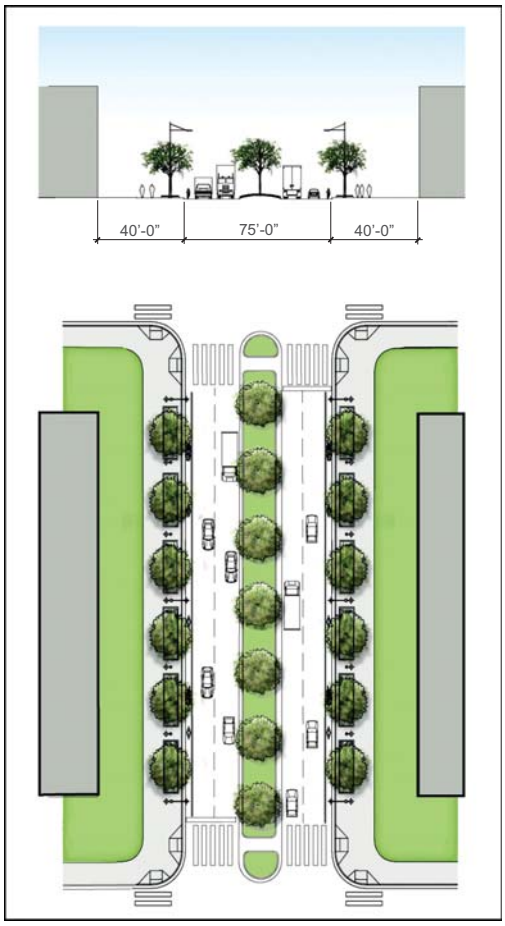
- Separate Left-turn Lane
- Bicycle lane each direction
- Wide medians
- Wide sidewalks
- Well marked accessible pedestrian crossings
- Medians with pedestrian refuge at crosswalks
- Tree lined boulevard
- Landscaped medians and sidewalks
- Distinctive street lighting

Appendix D: Representative Street Designs, cont'd



B1 - DIVIDED, TWO-LANE STREET

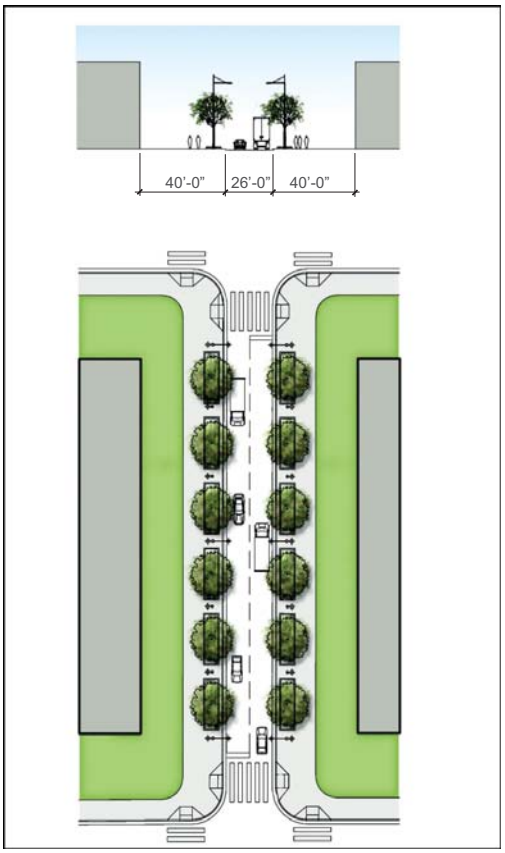
- Double lane streets
- Tree lined boulevard
- Wide sidewalks
- Pedestrian lighting
- Landscaped sidewalks
- Well marked pedestrian crosswalks
- Medians with pedestrian refuge
- Accessible crosswalks
- Separate left turn lane



B2 - DIVIDED, TWO-LANE STREET W/ BICYCLE LANE

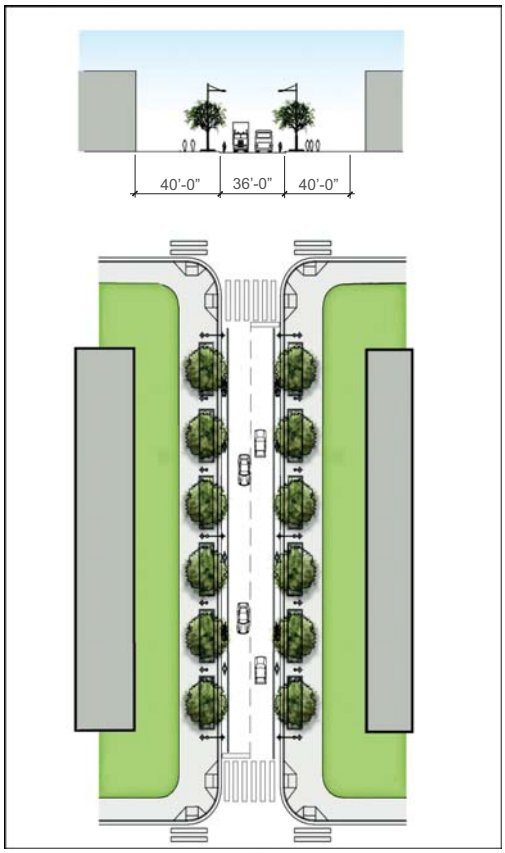
- Left-turn from inside lane
- Bicycle lane each direction
- Wide medians
- Wide sidewalks
- Well marked accessible pedestrian crossings
- Medians with pedestrian refuge at crosswalks
- Tree lined boulevard
- Landscaped medians and sidewalks
- Distinctive street lighting

Appendix D: Representative Street Designs, cont'd



C1 - TWO-LANE STREET

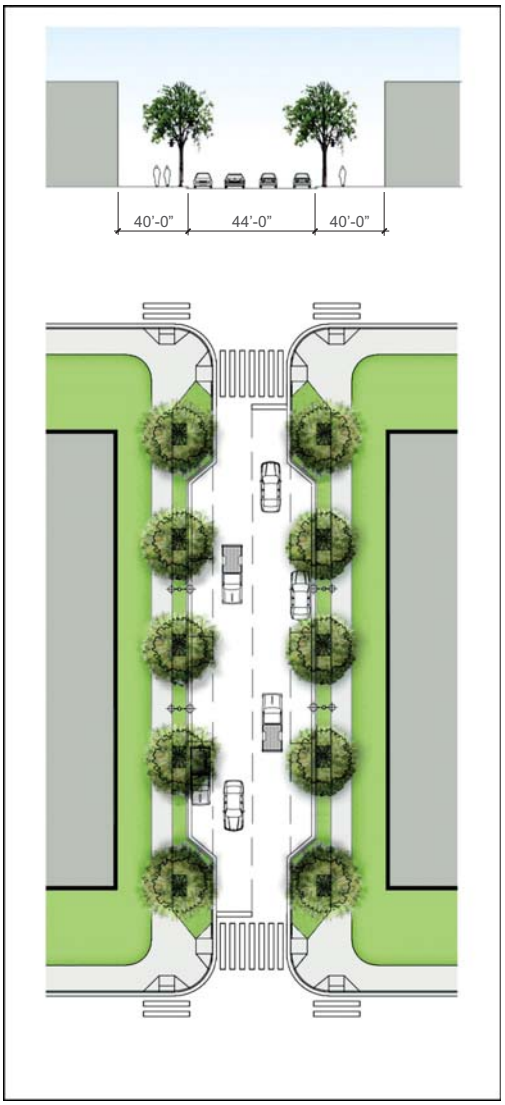
- Wide sidewalks
- Well marked accessible pedestrian crossings
- Tree lined streets
- Distinctive street lighting



C2 - TWO-LANE STREET W/ BICYCLE LANE

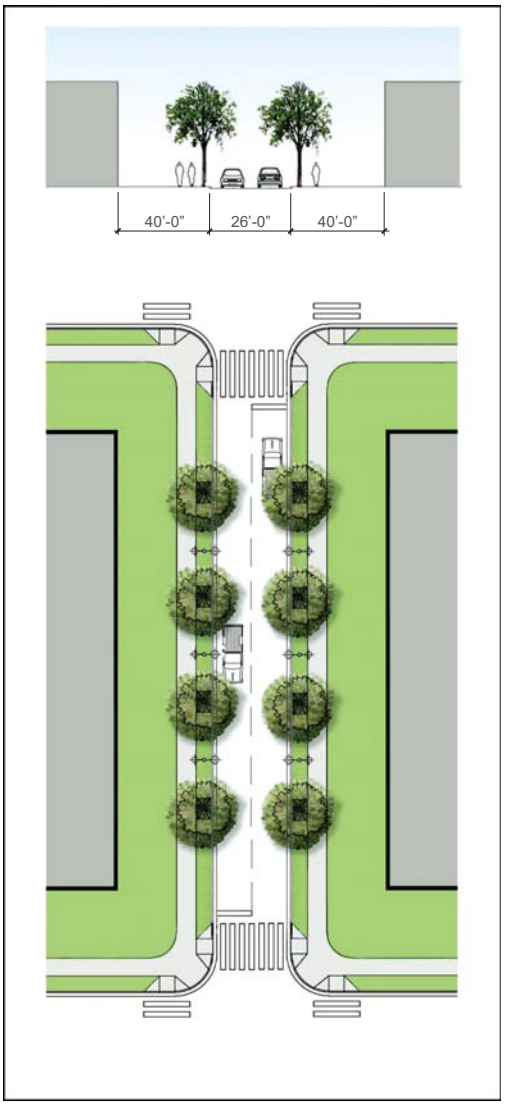
- Bicycle lane each direction
- Wide sidewalks
- Well marked accessible pedestrian crossings
- Tree lined streets
- Distinctive street lighting

Appendix D: Representative Street Designs, cont'd



D1 - TWO-LANE STREET WITH PARKING LANES

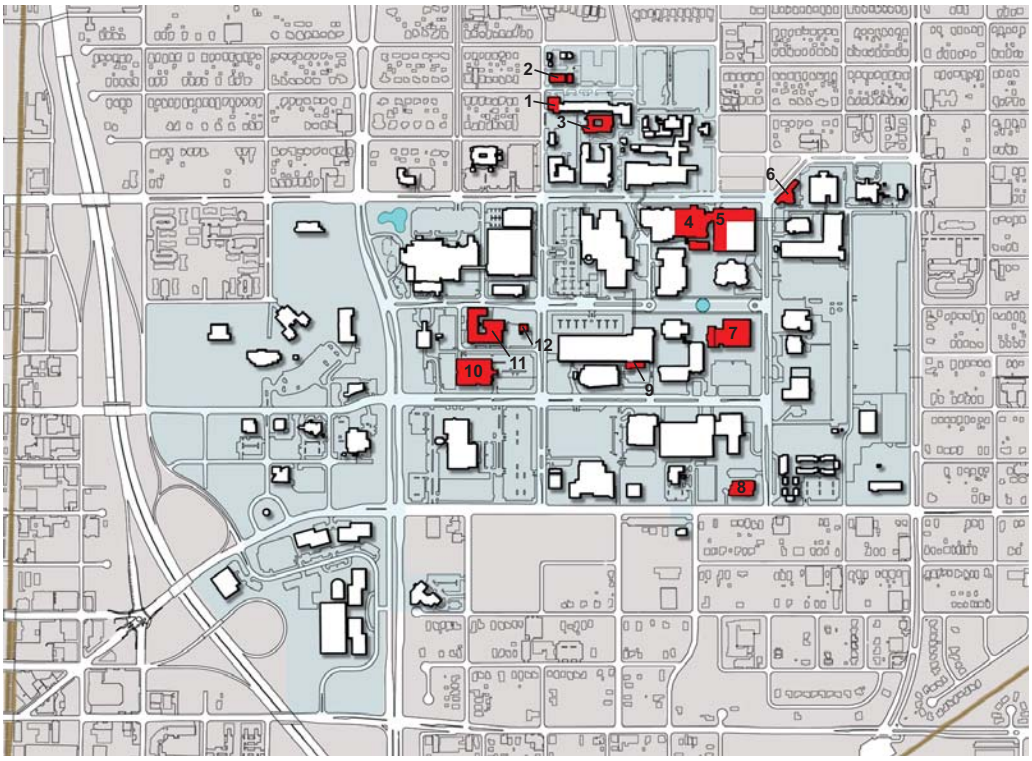
- Parallel parking at curb both sides
- Normal sidewalks
- Well marked accessible pedestrian crossings
- Tree lined streets
- Distinctive street lighting



D2 - TWO-LANE STREET

- Normal sidewalks
- Well marked accessible pedestrian crossings
- Tree lined streets
- Distinctive street lighting

Appendix E: Potential Facilities for Repurposing or Decommissioning



Potential Facilities for Repurposing or Decommissioning

Potential Facilities for Repurposing or Decommissioning:

FACILITY EXISTING	gsf	DISPOSITION
1. Rogers Building	48,091	Relocate to new Administration Building (long term). Potential sale to OMRF.
2. Allied Health Practice Ctr & Shop	9,228	Relocate. Potential sale to OMRF for parking.
3. Keys Speech & Hearing Center	30,153	Relocates to new Allied Health Building in 2008. Existing bldg. sold to OMRF.
4. Bielstein	unknown	Evaluate - see notes 1 and 2. Decommission and demolish?
5. Nicholson	unknown	Evaluate - see notes 1 and 2. Repurpose into extended stay facility?
6. Child Study Center	21,876	Scheduled to move into the new Pediatric MOB. Evaluate - see notes I and 2.
7. Bird Library	125,559	Evaluate to determine feasibility of adding two floors and repurposing library.
8. State Medical Examiner	18,000	Currently being evaluated for on-site replacement.
9. Radiation Therapy	49,422	Available when Radiation Therapy moves to new Cancer Center.
10. OKC Clinic	160,000	Evaluate - see notes 1 and 2.
11. Service Center Building	118,492	Evaluate use of site for better purposes.
12. Motor Pool	2,260	Evaluate use of site for better purposes.

Recommend an engineering evaluation to determine:

1. Feasibility of renovating facility to meet current Academic Accreditation Standards, Accessibility Standards, and Building Codes.

2. Feasibility of upgrading or replacing Mechanical, Plumbing. Electrical, and I.T. to comply with current codes, energy conservation criteria, and the Renovations described in Note 1 above.