

NORCO COLLEGE

RIVERSIDE COMMUNITY COLLEGE DISTRICT



FACILITIES MASTER PLAN

FEBRUARY 2020

MESSAGE FROM LEADERSHIP



Norco College opened its doors in March of 1991 with fewer than 1,000 students. At that time, few imagined we would enroll close to 15,000 students, with over 20,000 expected within the next decade.

Guided by the Educational Master Plan, this Facilities Master Plan identifies specific new construction and renovation projects to be completed through 2030. It serves as the foundation for ensuring that the college continues to provide quality higher education in an environment that is inviting and conducive to enhancing all aspects of the learning experience through:

College Transformation

Create a comprehensive campus environment with a full complement of academic programs and capacity to meet the needs of our entire service area.

Student Transformation

Promote student success through academic growth and implementing a guided pathways framework.

Regional Transformation

Establish a distinct regional identity with initiatives that influence academic, economic, workforce, social, and cultural development.

This plan is the result of many hours of dedication and deliberation by members of faculty, staff, management and the student body at Norco College. It captures our collective vision for Norco College as a pivotal center for scholarship, arts and culture, dynamic technologies, and partnerships in the region. I thank each of you for your hard work and steadfast dedication to providing access, ensuring equity, and guiding future generations of students to success at Norco College.

Respectfully,

DR. MONICA GREEN
INTERIM PRESIDENT
NORCO COLLEGE

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Prepared by

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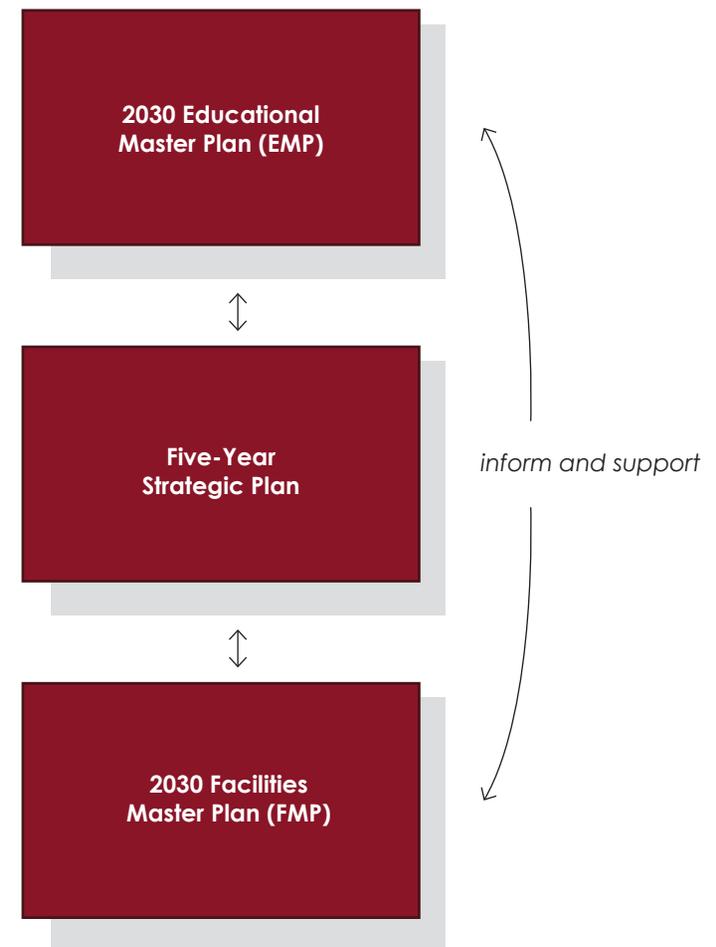
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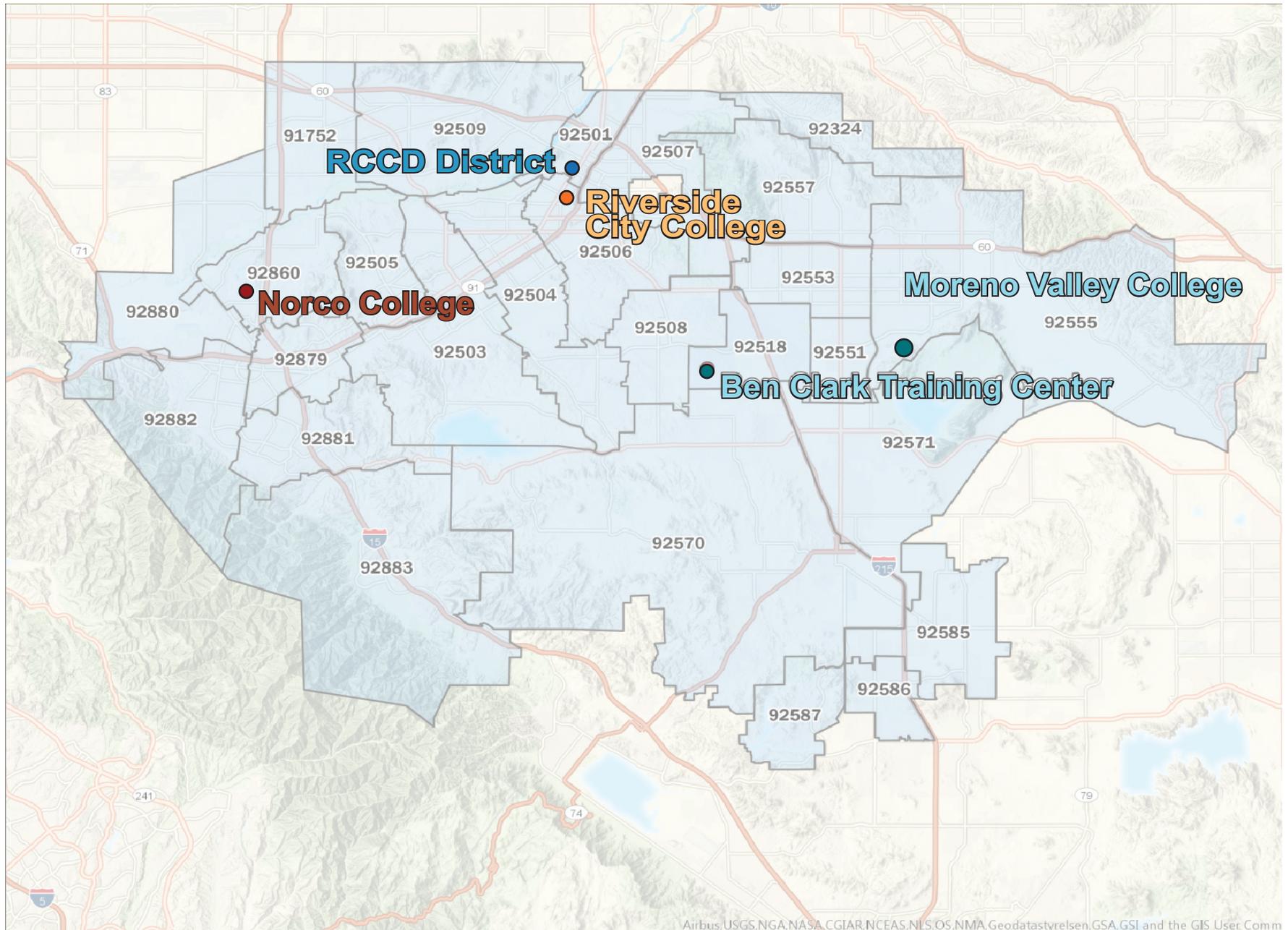
CHAPTER 01: PROJECT INTRODUCTION

COMPREHENSIVE PLANNING

Riverside Community College District (RCCD) and Norco College assembled a planning team to update the Facilities Master Plan in an effort to integrate the newly developed Educational Master Plan and provide recommendations for the campus' physical environment that align with the college's goals, mission, and vision.

Norco College started a comprehensive planning process in the Fall semester of 2017. The process involved a significant amount of thinking, planning, and deliberation. The detailed implementation strategy for this vision can be found in three core documents. First, the 2030 Educational Master Plan (EMP) defines where the College is headed over the next decade. The Educational Master Plan sets forth a strong vision for the future direction of the institution that will serve as a model for other community colleges deep into the 21st century. Second, the Five-Year Strategic Plan defines the work the College is going to do over the next five years as it heads in the EMP direction. Third, the Facilities Master Plan (FMP) maps out a direction for the campus environment that will need to be built in support of the EMP. These three documents outline a clear, strong, and compelling vision for the future. **The complete set of plans defines a framework that will transform Norco College into a comprehensive institution with the capacity to serve the entire region.**





ABOUT NORCO COLLEGE

The Riverside Community College District is located in the County of Riverside, in what is referred to as the Inland Empire, the fastest growing area in California. In the past eight years, the District has grown by more than 50% in Weekly Student Contact Hours (WSCH). The District operates three separate colleges: Norco College, Riverside City College, Moreno Valley College.

Norco College lies at the far west end of the Riverside Community College District and primarily serves Jurupa Valley, Eastvale, Norco, La Sierra, Corona, Temescal Valley, and all the unincorporated areas along the 1-15 corridor. Norco College became the 112th California community college on January 29, 2010, when it received initial accreditation, however its history is much older than that. Under the auspices of RCCD, college classes were regularly taught at various locations in Norco-Corona as early as the 1970s. Riverside Community College leaders first began to plan for a branch campus in the area at about the same time. On June 4, 1985, that plan was realized when more than 141-acres of U.S. government-owned land—the site of what would become Norco College—were acquired by RCCD for one dollar to build a satellite campus. Formal opening of what was then referred to as the RCC-Norco Campus took place in fall 1991, coinciding with the 75th anniversary of RCC. Just over 3,000 students attended classes that first semester; by 2014, the college's enrollment had more than tripled. In that same period, the college's full-time faculty grew sevenfold. Some of the professors who greeted students in August 1991 still teach at the college—and some students from the 90s are now Norco College professors.

Norco College was initially envisioned as an institution that would emphasize programs in technology, a counterpart to its sister campus Moreno Valley College's focus on the health care fields. Among its first buildings were the

Science and Technology Building, the Applied Technology Building, and the Center for Applied Competitive Technology. The college now offers over 40 career-technical education programs, including Logistic Management, Game Development, and Pre-Engineering, Engineering Technology, supported in part from a series of federal grants including an NSF (National Science Foundation) grant and STEM-related grants totaling nearly 15 million dollars. Nearly 200 students received CTE certificates in 2013-14, representing 25 different programs.

Now a Hispanic Serving Institution (HSI), the college has also developed a strong reputation as a comprehensive community college offering numerous Associate Degree for transfer programs in fields ranging from Spanish and sociology to business administration and computer science. In 2014, 785 students received an A.A. or A.S. Degree from Norco College. More than 800 students transferred from the college to a four-year university this past year.

While being a relatively young institution, the college has already made national headlines winning a prestigious Community College Futures Assembly Bellwether Award, being named a "Best for Vets" college by Military Times three out of the past four years, host of a National Science Foundation national center, and designated a "2018 Great College to Work For" by The Chronicle of Higher Education. An elite "Guided Pathway" college in California, a culture of entrepreneurial-ism has resulted in a current grant portfolio of \$45 Million, rivaling many universities. Norco College leads at the statewide and national levels in the areas of veterans education, lowering inmate recidivism through education, eliminating student equity gaps, innovative apprenticeship models, emerging technology education, high school partnerships, and industry engagement.

GUIDED PATHWAYS FRAMEWORK

Norco College is one of 20 community colleges selected statewide to participate in the California Guided Pathways Initiative. The Guided Pathways Framework established within California community colleges implements an integrated, institution-wide approach to student success by creating structured educational experiences that supports each student from point of entry to attainment of high-quality postsecondary credentials and careers. Guided Pathways provides students with clear, educationally coherent program maps that include specific course sequences, progress milestones, and program learning outcomes.

The college successfully completed a comprehensive reorganization process designed to make long term structural changes needed to support a school-based guided pathways framework. As a result of the reorganization, Norco College is poised to have a significant impact on the students and wider community the college serves. The College is unified in its desire to help students complete their programs of study (completion), to help students regardless of background, preparedness levels (equity), and a dedication to increase the number of students from the region who attend college (access).

SCHOOLS AT NORCO COLLEGE

Currently, Norco College is comprised of four schools which cover numerous programs and certifications. Each school has dedicated counselors, faculty advisors, peer mentors, and resources to guide each student to success.

School of Arts & Humanities: The Norco College School of Arts & Humanities is a pursuit of an interdisciplinary study of the arts by selecting among courses in historical context, studio practice, performance ensemble, creative writing, and ideas and interpretation of the arts. In the Arts & Humanities core course, students will experience the theory and practice of the arts in a workshop setting and, in studio or ensemble courses, will gain practical experience in at least one area of the visual or performing arts or creative writing. Courses in the historical context and interpretation of the arts will enable students to understand how style, subject matter and materials may respond to different motivations and purposes.

School of Business & Management: The Norco College School of Business & Management offers a number of certificate pattern programs. Certificate programs, leading to an associate of science degree require a minimum of 18 units (6 classes or so). The School of Business & Management provides relevant, rigorous and career-focused degree programs that meet the needs of self-directed adults who seek to achieve educational and professional goals. Certificates can be completed within one and a half to two years and lead to employment! Each course required for the certificate must be completed with a "C" grade or better and all can be counted toward the degree as well as the major.

School of Social & Behavioral Sciences: The Norco College School of Social & Behavioral Sciences, through excellence in instruction, readies students to effectively navigate the increasingly complex, diverse, and globally connected world by providing them with knowledge of themselves, others, and the dynamic social environment. By means of hands-on exposure to scientific theory, research, and practice, the School of Social & Behavioral Sciences strives to develop socially responsible students who are engaged and prepared for both work and continuing education in the social/behavioral sciences and related fields.

School of Science, Technology, Engineering & Mathematics: The Norco College School of Science, Technology, Engineering & Math (STEM) provides learning in a wide variety of disciplines. STEM professionals include engineers, electricians, architects and game developers. The School of STEM includes two distinct programs designed for students pursuing degrees in the fields of Science, Technology, Engineering and Mathematics. The first program, STEM Pathways at Norco College, includes two distinct programs designed for students pursuing degrees in the fields of Science, Technology, Engineering and Mathematics. The first program, Engineering Pathways, provides opportunities for students seeking transfer to 4-year universities in Civil, Mechanical, Electric, Computer and other diverse fields of engineering. The Engineering Pathways program provides students with direct assistance, educational planning and academic coaching from entrance to transfer. The program also provides internship and research opportunities for students. The second program, STEM Scholars, is a program that provides assistance to students pursuing the physical, life, and natural sciences, computer science and mathematics degrees. STEM scholars receive career and academic counseling, mentoring and assistance with the transfer process.



The Educational Master Plan for Norco College is built on the foundation of our Mission, Vision and Values:

MISSION STATEMENT

Norco College inspires a diverse student body by an inclusive innovative approach to learning through its pathways to transfer, professional, career and technical education, certificates, and degrees. We are proud to be a pivotal hub for scholarship, arts and culture, dynamic technologies, and partnerships. Norco College encourages self-empowerment and is dedicated to transforming the lives of our students, employees, and community.

VISION STATEMENT

We will change the trajectory of our students' lives. We will stimulate academic, economic, and socio-social development in our service area. We will build a comprehensive institution with the capacity and programming to serve our entire area.

CORE COMMITMENTS

Access

Providing open admissions and comprehensive educational opportunities for all students

Equity

Engineering and sustaining an environment where student success is realized by all groups with proportionate outcomes

Student Success

Being an institution that places high value on the academic and personal success of students in and outside of the classroom and where meeting student needs drives all decisions regarding educational programs and services

Expertise

Committing to ongoing improvement of teaching, service and leadership as core institutional skills

Mutual Respect

Belief in the personal dignity and full potential of every individual and in fostering positive human values in the classroom and in all interactions

Quality

Achieving excellence in the broad range of academic programs and services provided to students and to the community, fostering an environment of inquiry, learning and culture, and providing professional development opportunities for faculty and staff

Inclusiveness

Embracing diversity in all its forms - global as well as local - and creating a supportive climate that encourages a variety of perspectives and opinions

Integrity

Maintaining an open, honest, and ethical environment

Collegiality

Being a supportive community that is distinctive in its civility, where the views of each individual are respected, humor and enjoyment of work are encouraged, and success is celebrated

Environmental Stewardship

Being mindful of the impact we have on the environment, as individuals and as a community, and fostering environmental responsibility among students.

Innovation

Valuing creative solutions and continuing to seek inventive ways to improve instruction and service to students and to the community

Civic Engagement

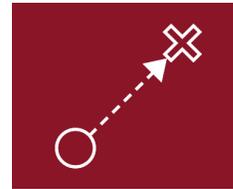
Being fully engaged with the local community by listening to needs; establishing programs and partnerships to meet regional needs; forming alliances with other educational institutions to create a continuum of educational opportunities; and communicating information about Norco College programs and services to the external community

FACILITIES MASTER PLAN

The **Facilities Master Plan** is the physical manifestation of **Educational Master Plan**. The Educational Master Plan outlines three Strategic Directions that align with goals that impact students, the College, and the region. Each have been addressed as part of the Facilities Master Plan and become the critical drivers in the formation of the document.

Norco College will build a comprehensive and inspiring campus integrated into the region that serves as a destination for education, commerce, life, and the arts.

GOAL OF THE FACILITIES MASTER PLAN



STRATEGIC DIRECTION #1 STUDENT TRANSFORMATION

Norco College will focus on changing the trajectory of students' lives through expanding access to education by increasing enrollment, implementing the Guided Pathway framework, closing equity gaps, and fostering a culture of ongoing improvement for students, faculty, and staff alike.

Facilities Master Plan Alignment:

- » Increase student services footprint to meet the needs of a growing student body
- » Embed student services within each of the academic buildings
- » Centralized student services as a campus-front door
- » Embed study spaces within each of the academic buildings
- » Centralized study space in expanded Learning Resource Center



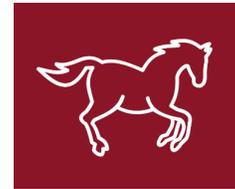
STRATEGIC DIRECTION #2 COLLEGE TRANSFORMATION

As Norco College seeks to become a comprehensive college with capacity to serve the entire service area by 2030, a framework for the College transformation will expand the range of academic programs and organizing the campus' governance, staffing, operations, resources, facilities to support this expansion.

Facilities Master Plan Alignment:

New and expanded facilities for:

- » STEM
- » Health industries technology
- » Agriculture
- » Computer science
- » Natural sciences
- » Physical education
- » Kinesiology, and athletics
- » Visual and performing arts
- » Create spaces for interdisciplinary learning and crossover programs between schools



STRATEGIC DIRECTION #3 REGIONAL TRANSFORMATION

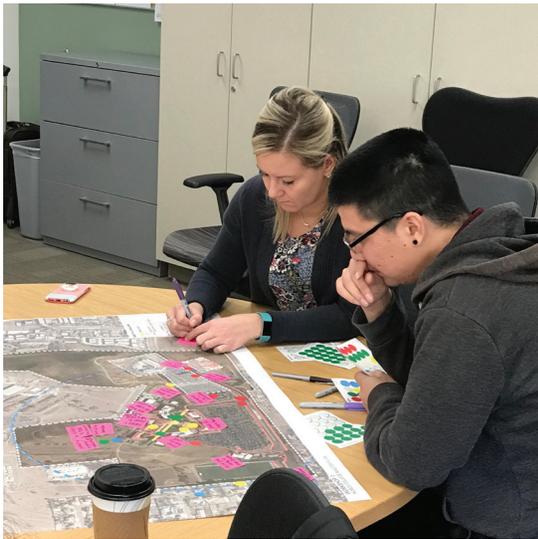
Norco College is positioning itself to be a major contributor to regional organization and workforce development. The college will play a key role in the region with academic, community, and economic development by reducing poverty and the skills gap, and by pursuing, developing, and sustaining collaborative partnerships.

Facilities Master Plan Alignment:

- » Create spaces and facilities for veterans education and resources, expanded high school partnerships, inmate education, workforce development, lifelong learning, and regional arts
- » Create a development framework that supports a vibrant, mixed-use academic community featuring educational activities, incubator space, industry partnerships, and retail.

INTEGRATED PLANNING PROCESS

To create a successful Facilities Master Plan, critical input from students, faculty, staff, administrators, and community members was solicited throughout the entirety of the planning process through a series of on-campus workshops. The primary goal of the workshops was to receive input, feedback, and direction to drive the planning process. *More information on each of the workshops is located in the Appendix.*



WORKSHOP 1: SWOT ANALYSIS

The primary goal of the SWOT Analysis workshop was to attain information about the existing college campus by identifying strengths, weaknesses, opportunities, and off-campus points of interest. Activities included Headlines, College Continuum, The College Experience, SWOT diagrams, and numerous interviews.



WORKSHOP 2: BIG IDEAS

The Big Ideas workshop focused on having stakeholders dream big and develop a future Norco College. These ideas informed the direction of the planning concepts.



WORKSHOP 2.1: SUSTAINABILITY

Over two days, a group of students, faculty, staff, and administrators gathered to determine their top sustainability initiatives tied to the 2030 Education and Facilities Master Plan. Through an interactive gaming session, participants prioritized and strategized on how sustainability ties into the larger vision for the campus to become a Comprehensive College.



WORKSHOP 3: CONCEPTS

During the concepts review workshop, the planning team presented three site planning concepts for the future development of the campus. Participants provided feedback on each concept. The team analyzed all of the feedback to revise and produce a single draft site plan.



WORKSHOP 4: DRAFT PLAN

During the draft plan workshop, stakeholders reviewed the draft site plan in an open house setting for the campus and community stakeholders. Attendees again provided feedback on the strengths and weaknesses for the planning team to analyze and revise for the final draft.



WORKSHOP 5: FINAL PLAN

The final plan open house workshop presented the final master plan of the campus for final approval. The plan was unanimously approved in each of the shared governance sessions.



CITY OF NORCO

A rectangular sign with the text "SHOP NORCO" in bold, uppercase letters. Below the text are silhouettes of several horses running. To the left of the text is a smaller, less legible image.

SPEED LIMIT 35



CHAPTER 02: THE CAMPUS TODAY

Norco College is located within the town of Norco, California in the Inland Empire. This unique city is well-known for being an equestrian-oriented community where majority of the residents are animal-owners. Large networks of horse trails connect hundreds of acres of parkland throughout the city. It's earned the nickname "Horsetown USA" and boasts a great quality of life for the small town feel in California.

The College's property sits within a larger section of land that includes the California Rehabilitation Center (CRC), Lake Norconian, the Lake Norconian Club. Along the northern edge of the campus property is the U.S. Navy's Naval Surface Warfare Center, Corona Division. Both southern and western edges of the property are adjacent to residential subdivisions aligned with wide multi-use trails for equestrian use. (Diagram 2.0)

The Corona-Norco Unified School District (CNUSD) leases approximately 12.63 acres of land located on the Norco College campus for a Middle College High School. JFK High School is strategically located on the campus to encourage students to pursue post-secondary education.

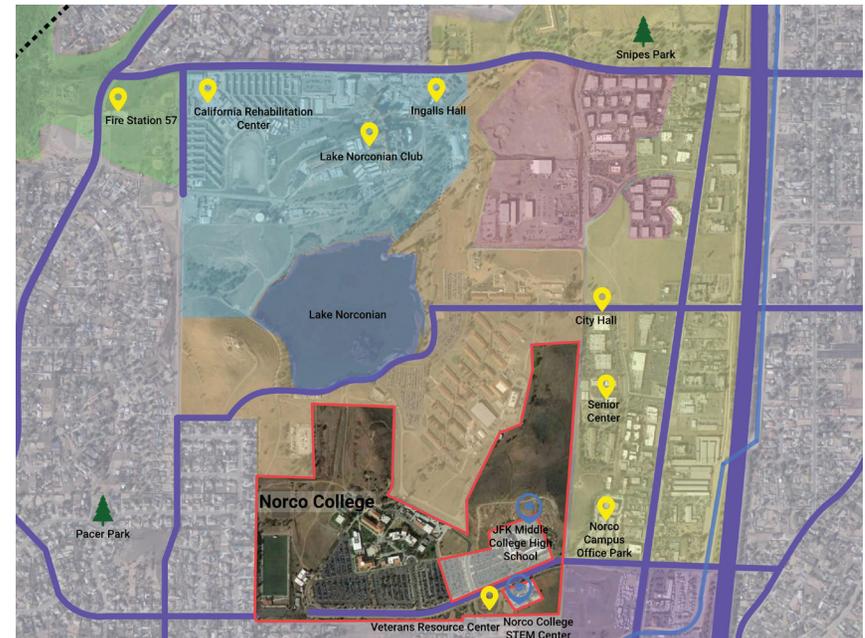


Diagram 2.0



A majority of the 141-acres is undeveloped due to the circulation inaccessibility and steep topography; approximately 55-acres of the is developed today.

The campus contains approximately 238,000 gross square feet (GSF) as of 2019. According to the FUSION system (Campus & Building Details List - 6/12/2017) all of the existing buildings are in Satisfactory condition. Since the campus is less than 30 years old, this may be true from a building operations perspective, however it is important to note that this assessment does not take into account the impacts of space that is inadequate from a programmatic perspective.

Much of the existing campus development is centralized in one-and-two story buildings. There is a significant amount of the space inventory in portable or modular buildings, and most of that space is instructional and faculty office space. Once the current deficit is addressed, the long-term plan is to replace all portable or modular buildings with larger, permanent, and flexible buildings.

BUILDING ABBREV.	BUILDING NAME	YEAR BUILT	csf	GSF	BUILDING TYPE
A	STUDENT SERVICES	1991	9,276	14,357	PERMANENT
B	SCIENCE & TECHNOLOGY	1991	11,157	14,588	PERMANENT
C	THEATER	1991	5,054	9,277	PERMANENT
D	HUMANITIES	1991	10,496	14,496	PERMANENT
E	COLLEGE RESOURCE CTR	1991	2,067	2,785	PERMANENT
F1	CENTRAL PLANT F1	1991	1,444	1,518	PERMANENT
M1/M2		1991	1,800	2,427	PERMANENT
G	LIBRARY (AIREY)	1995	19,559	30,740	PERMANENT
N	APPLIED TECH	1995	13,431	20,019	PERMANENT
F2	CENTRAL PLANT F2	1994	1,444	1,518	PERMANENT
I	BOOKSTORE	1999	3,099	3,600	MODULAR
H/J	STEM CENTER 100/200/300	2004	10,061	13,035	MODULAR
K	CTR. APPLIED & COMP TECH	1999	4,893	5,435	PERMANENT
L	WEST END QUAD	2007	12,224	13,710	MODULAR
P	PORTABLES	2005	1,699	1,920	MODULAR
Q	INDUSTRIAL TECH	2009	29,716	44,862	PERMANENT
R	SOCCER SUPPORT	2010	1,924	2,820	PERMANENT
S	CTR FOR STUDENT SUCCESS	2010	14,414	25,025	PERMANENT
T	OPERATIONS	2013	12,460	15,468	PERMANENT
			156.167	237,600	



BUILDING USE

- Academics / Research
- Administration / Office
- Library / Study
- Facility Support / Storage
- Student Life
- Athletics/Rec/ Kinesiology

PRIMARY BUILDING USE

The majority of academic and service buildings are focused around a central amphitheater, plaza and promenade. There are some academic and service functions, such as the West End Quad and STEM 100-300, that are disconnected from the campus core by parking lots, major roadways, or vacant land. These outlier programs create large physical gaps between academic and service functions for students and create unintentional silos on the campus, isolating students, faculty, and staff.

One of the largest needs on the campus today is student-focused spaces, including gathering, studying, collaboration, exhibitions, events. Students who travel to campus through public transportation or get dropped off have very limited choices of spaces to utilize in between their classes, or to study, collaborate, and socialize. Many students who drive to campus either leave or spend time in their cars in-between classes.

Library and study space is not central to the campus and is the largest space need on the campus today. When the campus was created as a Center, the library was a satellite to a larger Riverside College library, however, a more comprehensive and expanded library is now needed to support students.

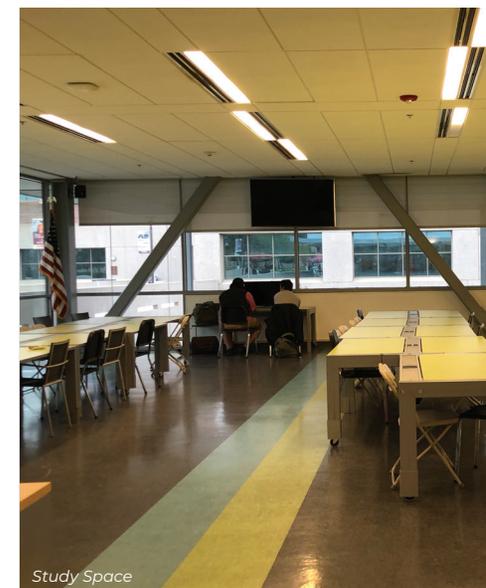
Another remnant of the campus' history as a Center is the lack of physical education and arts/cultural spaces on the campus. The addition of recreation/fitness-focused facilities can be used by both campus and community, and to support collegiate athletics. The addition of a Visual and Performing Arts programs on the campus could also support both academic and community based arts and cultural programs, as well as large events.



Library Space



Student Center



Study Space



Diagram 2.3

OPEN SPACE AND LANDSCAPE

A pedestrian promenade connects numerous open space features and plazas throughout the central campus. The various spaces include a large concrete amphitheater, several seating areas, and small pockets of open lawn. Students can typically be found utilizing the tables and chairs throughout the seating areas covered with shade. Flexible Adirondack chairs in the open lawn are a popular open space amenity. The large concrete amphitheater is underutilized as no shade or vegetative relief is provided. Site furnishings throughout campus are limited.

The landscaping on campus is not expansive, yet, well-maintained including a variety of shrubs and perennials. The landscaping locations and planting varieties could be expanded in the future for additional interest. Plants are either planted in mulch or decomposed granite, depending on location. Palm trees create visual interest down the central pedestrian spine, while other shade trees are planted throughout the campus.

A large area of the campus has yet to be developed, due to the steep topography, particularly on the north end of campus. Trails in the northwest corner of the site lead to beautiful scenic views of Lake Norconian and mountains. Many students and faculty utilize the trails to enjoy the views. There is a large undeveloped open space that is non-irrigated native lawn, with meandering foot paths for pedestrians.

The western edge of the campus comprises of an athletic soccer field and a multi-purpose field. The multi-purpose field is underutilized because of its lack of competitive condition for athletic standards. Fields are open to all students and to the public through facility use agreements.



Small Seating Plaza



Views of Lake Norconian + Mountains



Concrete Amphitheater



Under-utilized open space



Palm Tree Allée

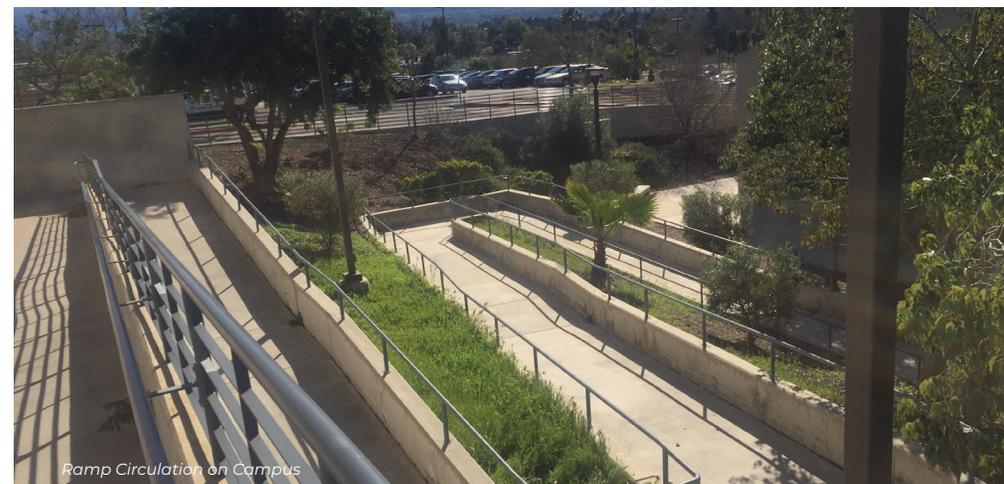


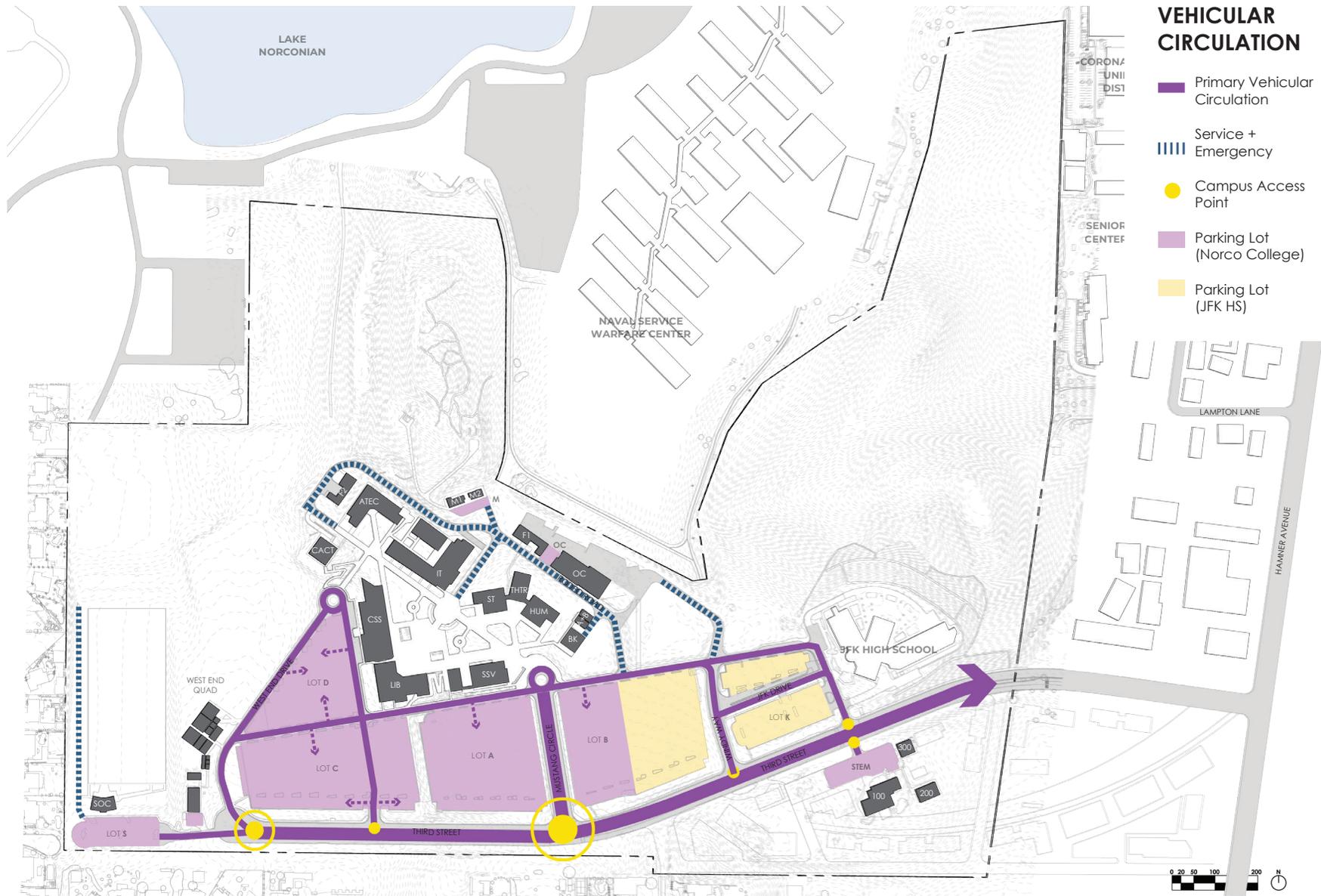
PEDESTRIAN CIRCULATION

Pedestrian circulation throughout campus is organized from one central promenade from the northwest to the southeast corners. The promenade begins at the primary drop-off circle along Mustang Circle and terminates adjacent to the existing Applied Technology building. Although the promenade extends through central campus, wayfinding and signage are not prevalent making it difficult to navigate to individual buildings. Many students noted difficulty finding specific academic buildings during their first visit to campus.

As campus users transition from their vehicle to walk from the surface parking lots to the campus core, they must cross a heavy-use drive lanes with limited striped crosswalks. A clear pedestrian access point from the surface lots into the campus is not distinguished. Many of the walkways have stairs or extensive ramp systems which are difficult to navigate and separate able bodied users from users with physical disabilities. Future planning should be mindful of universal design for everyone to access the campus in the same way.

As noted in the open space section, numerous trails wander through the undeveloped areas on campus. However, they are not-marked and difficult to find. These natural assets on the campus should be highlighted and distinguished for both campus and community use. Because the community is equestrian-oriented and currently has numerous multi-use trails throughout the city and adjacent to the campus, additional access points and connections to the existing trail system should be explored as the campus develops overtime.





VEHICULAR CIRCULATION

Hamner Road is the major arterial street running North-South through the City of Norco, parallel to Interstate 15. Third Street runs east-west and is the sole vehicular access to the College. Vehicular circulation is a large concern for all campus users, visitors, along with JFK High School staff and parents. Traffic congests at the traffic light along Third Street, causing waits of up to twenty-minutes to access Hamner Road. The most frequently used entrance into the campus is along Mustang Circle, which leads to a drop-off area or access into the surface parking lots. A secondary drop-off area is located in the southwest area of campus and less frequently used. This secondary drop-off is also host to the Riverside Transit Agency bus stop. Currently, the RTA #3 Route (EASTVALE - NORCO - CORONA) serves the campus.

Service / emergency routes located throughout campus are not clearly delineated or restricted, causing personal vehicles to occasionally end up on central campus along the pedestrian spine.



Primary Drop-off Drive



Emergency Route / Pedestrian Walkway



Main Vehicular Entry - Mustang Circle



PARKING

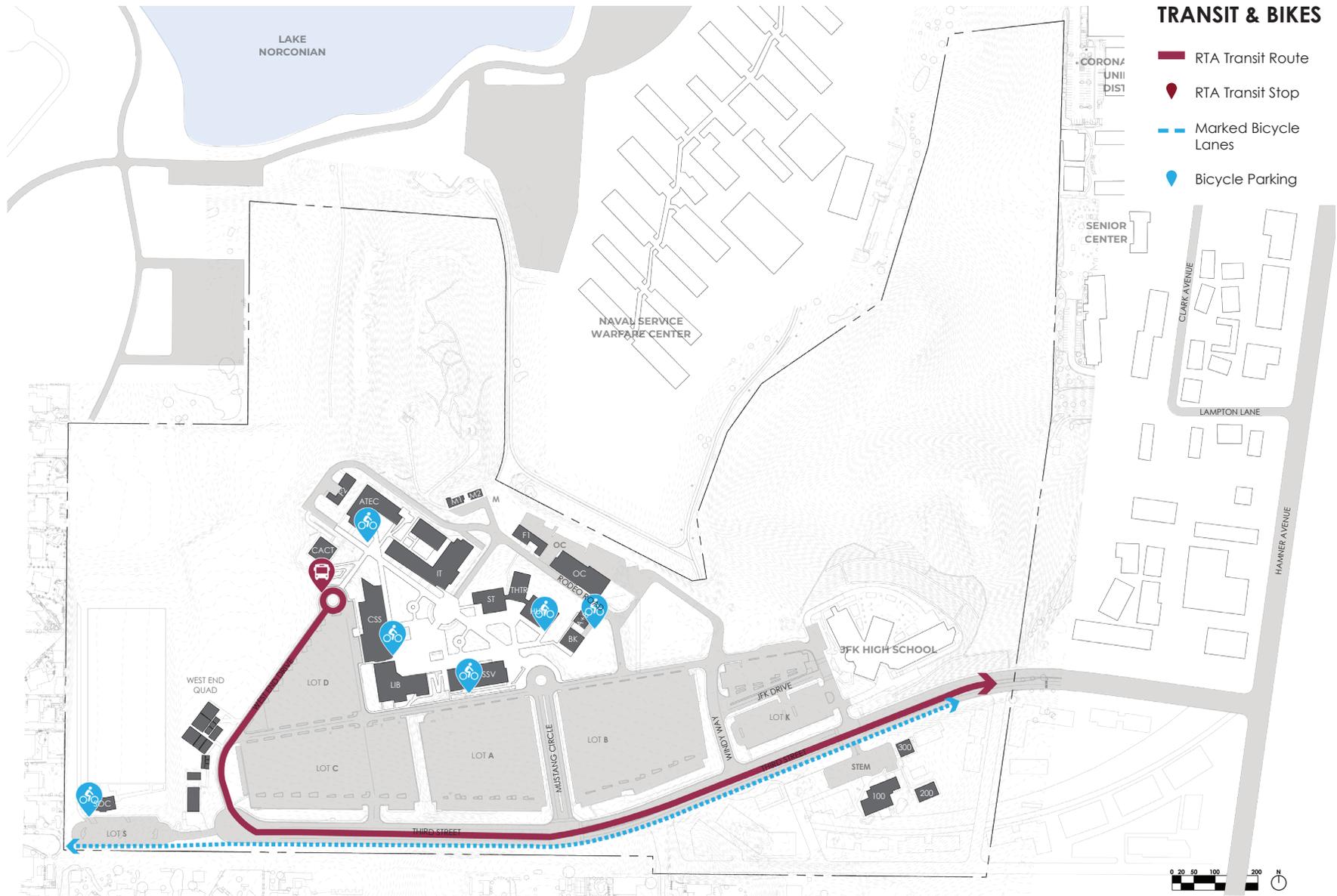
The campus has sufficient parking stalls to accommodate the campus population today; however, stakeholders noted that parking stalls are not conveniently located adjacent to the most frequently used buildings on the campus, such as ATEC and IT buildings. Parking stalls closest to the drop-off area are most desirable for students, while faculty and staff prefer to park close to their offices.

Surface Lot B is shared parking between the College and JFK HS. The surface lot directly in front of JFK High School is reserved for high school staff, faculty, and students.

LOT	COUNT
A	509
B	535
C	538
D	297
M	11
S	70
STEM	44
OC	5
TOTAL	2,009
K	191

Table 2.1: Existing Campus Parking





TRANSIT

The campus is serviced by Riverside Transit Agency (RTA), which operates four bus lines with stops adjacent to or on campus. Bus line 3 stops at the traffic circle at the culmination of West End Drive. RTA bus passes are included in fees for all students.



RTA Bus Stop

BICYCLE CIRCULATION

Bike lanes are provided along Third Street providing direct access to the campus. The campus does not provide bicycle facilities on internal roadways or on-campus pathways. Bicycle parking is strategically located near frequently used buildings throughout campus. Few students/faculty noted that they travel to campus by bicycle.



RESOURCE CENT

CHAPTER 03: SPACE NEEDS ANALYSIS

DEFINING COMPREHENSIVENESS

There are two core elements Norco College must develop to become comprehensive. First, the College will need to develop enough capacity to meet the needs of the residents who live in the service area. Second, the College will need to develop enough programs to serve students' academic and professional needs. Two methodologies of enrollment and facility/space needs were completed as part of the Educational Master Plan and the Facilities Master Plan.

As outlined in the Educational Master Plan, Methodology #1 used benchmarking from nearby comprehensive community colleges to understand how these colleges are serving the residents in their service areas. These ratios were applied to Norco College and its region's residential growth to generate the future enrollment, staffing, and space needs of the campus.

Methodology #2 was two-fold. For enrollment projections, RCCD's stated projections of 3% annual increase for student headcount were applied, along with the 3% increase of the ratio between headcount and FTES. For

space projections, the planning team completed a comprehensive space analysis as part of the Facilities Master Plan. The space analysis includes an examination of the distribution of existing space on Norco College's campus, utilization of instructional spaces, and the quantity of space need.

While these analyses were different, it is critical to note that both demonstrate a significant need for growth. Table 1.0 outlines the results of each methodology for enrollment projections and the need for space compared to the baseline, which is Fall 2018 data provided by Norco College.

NORCO COLLEGE (2018)	METHODOLOGY #1 2030 ENROLLMENT/NEEDS CAPACITY/RESIDENT RATIO	METHODOLOGY #2 2030 ENROLLMENT/NEEDS PER DISTRICT & CAP LOAD
7,364 FTES	12,767 FTES	13,970 FTES
168,870 ASF	402,370 ASF	467,800 ASF

Table 1.0

METHODOLOGY #1: CAPACITY-PER-RESIDENT RATIO

Using two well-known comprehensive colleges, Riverside City College (RCC) and Santa Ana College (SAC), the first method measured these colleges' capacities relative to the residents who live within their service areas. (Table 1.1) Using RCC's current ratios, the comparison to Norco College illustrates the current deficits, as well as calculates the deficit over time as growth occurs in the College's service area. (Table 1.2)

As shown in Table 1.2, as of Fall 2018, the College does not have enough capacity to serve its current residents. **There is a current need to grow its capacity by over 3,000 FTE, and add nearly 160,000 asf to the campus' physical space inventory.** Based on the planned increase of residents** by the year 2030, **the College will need to increase its enrollment capacity by over 5,000 FTES to 12,676 FTES, and add over 230,000 asf to the campus' physical space inventory to reach 402,370 asf.**

		NORCO COLLEGE	RCC*	SAC
TOTAL RESIDENTS	People who live in service area	306,846	500,847	458,760
FTES/RESIDENT	Full-time equivalent students funded per 100 residents	2.4	3.4	3.5
FTE/RESIDENT	Full-time equivalent employees per 100 residents	0.11	0.16	0.17
ASF/RESIDENT	Assignable square footage developed per resident	0.55	1.07	1.09

Table 1.1

	NORCO COLLEGE (2018)	BASED ON RATIOS, TODAY NORCO COLLEGE SHOULD HAVE...	CURRENT DEFICIT*	PLANNED FOR 2030*	2030 DEFICIT
RESIDENTS	306,846			376,047**	
STUDENTS	7,364 FTES	10,433 FTES	(3,069) FTES	12,767 FTES	(5,403) FTES
EMPLOYEES	348 FTE	491 FTE	(143) FTE	602 FTE	(254) FTE
PHYSICAL SPACE	168,870 ASF	328,325 ASF	(159,455) ASF	402,370 ASF	(233,500) ASF

Table 1.2

*DEFICITS WERE CALCULATED USING THE RATIOS FROM RCC

**RESIDENT GROWTH BASED ON REAL ESTATE ASSESSMENT DATA

METHODOLOGY #2: STUDENT ENROLLMENT GROWTH PER RCCD

Riverside Community College District stated that Norco College should plan for a 3% annual growth in headcount and a 3% annual increase in Headcount/ FTES ratio from 2019-2027. This timeline correlates directly to the timing of major “WSCH-intensive” buildings coming online.

The higher the number in the ratio indicates that more students are taking larger course loads, resulting in less part-time students, closing the differential gaps between FTE and headcount. (Table 1.3) The justification for the 3% increase in headcount/FTES ratio is based upon:

- » As the College is becoming more comprehensive, it will create more opportunities for students to take larger course loads since additional programs of study are being offered

- » The College's continued success in implementing Guided Pathways framework will result in more students taking more classes to align with their planned pathway to completion.
- » The plan to scale up existing programs that bring in full-time students, such as Athletics and Visual and Performing Arts, etc. **This projection methodology results in 13,970 FTES for the 2029-2030 academic year, which is a 93% increase in enrollment growth from 2018.**

YEAR	2017-2018	2018-2019	2019-2020	2020-2021	2021-2022	2022-2023	2023-2024	2024-2025	2025-2026	2026-2027	2027-2028	2028-2029	2029-2030
HEADCOUNT*	14,624	15,063	15,515	15,980	16,459	16,953	17,462	17,986	18,525	19,081	19,653	20,243	20,850
FTES***	7,248	7,689	8,158	8,654	9,182	9,741	10,334	10,963	11,631	12,339	13,091	13,563	13,970
FTES/ HEADCOUNT**	0.50	0.51	0.53	0.54	0.56	0.57	0.59	0.61	0.63	0.65	0.67	0.67	0.67

Table 1.3

Notes:

*Assume headcount increase at rate of 3% per RCCD projections.

**Assumes FTES/Headcount ratio increases at rate of 3% of year to 2027 and then stays the same from 2028-2030.

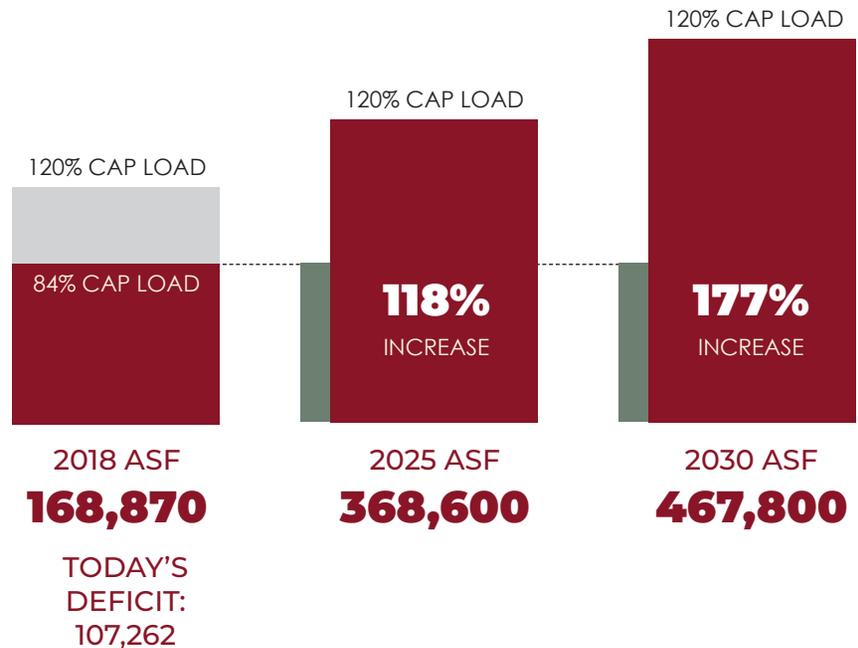
***2017-2018 FTES based on historic data.

FTES data post 2017-2018 is found by multiplying RCCD annual headcount projections by annual FTES/Headcount ratio.

METHODOLOGY #2 CONTINUED: SPACE NEEDS PER CAP LOAD RATIO

The space needs analysis includes an examination of the distribution of existing space on Norco College's campus, utilization of instructional spaces, and the quantity of space need. The study analyzed spaces as measured by Cap Load targets created by the California Community Colleges Chancellor's Office. In addition several 'other' space categories were analyzed using current, classification-specific metrics informed by CEFPI (Association for Learning Environments) standards, peer institutions, and national trends in higher education as defined by organizations such as SCUP (Society for College and University Planning), NIRSA (National Intramural and Recreational Sports Association), APPA (Leadership in Educational Facilities), and others. These metrics determine whether a surplus or deficit of space exists.

The study shows that Norco College has a deficit of space for Fall 2018 of over 100,000 asf. This deficit grows significantly in scale for the College to meet its 2030 enrollment growth targets. **By the 2029-2030 academic year, Norco College will need 467,800 asf, which is a 177% (nearly quadrupling) in physical space on the campus.** *The remainder of this chapter outlines the complete results of the space needs analysis.*

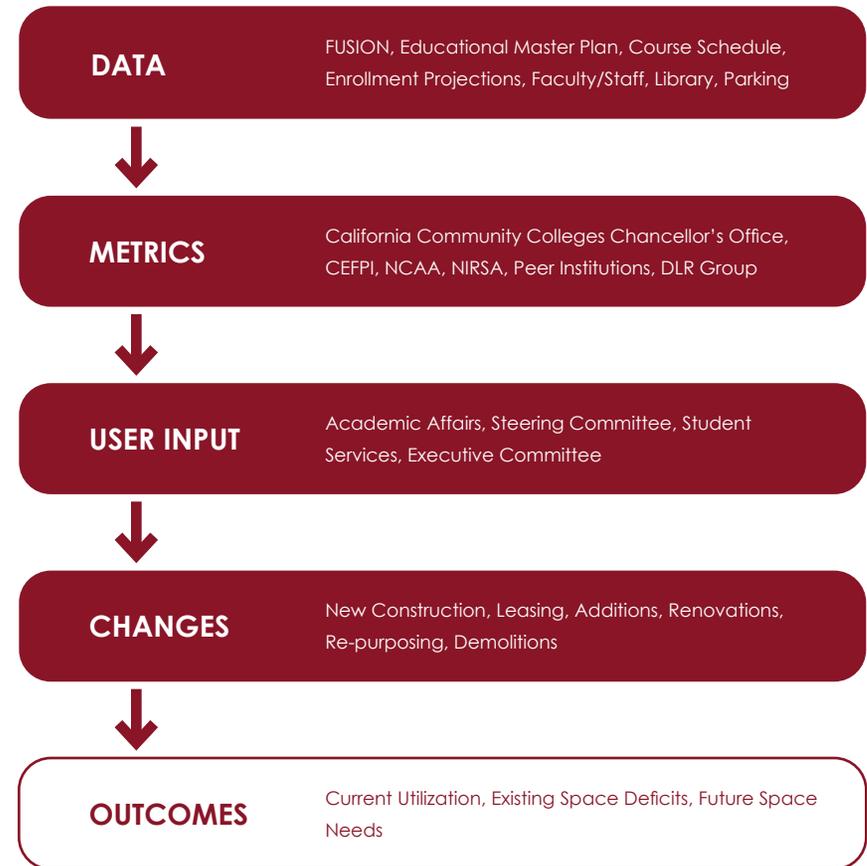


SPACE NEEDS ANALYSIS

The Space Needs Analysis analyzed classrooms, instructional labs, offices, library & study, and AV / TV as measured by Capacity Load (CAP Load) targets created by the California Community Colleges Chancellor's Office.

For state-mandated Cap Load categories (Instructional, Lab, Office, AV/TV and Library), a Cap Load Ratio of 120% was chosen as a planning target. While a 100% Cap Load theoretically meets the existing demand for a campus population in any given space category, there are some limitations to using this as a planning target. Increasing the number up to 120% provides the flexibility that is needed when envisioning the future of Norco College's campus. This increased planning target provides space for additional growth should enrollments exceed expectations, and also allows for innovation in program offerings and/or potential partnerships not yet defined.

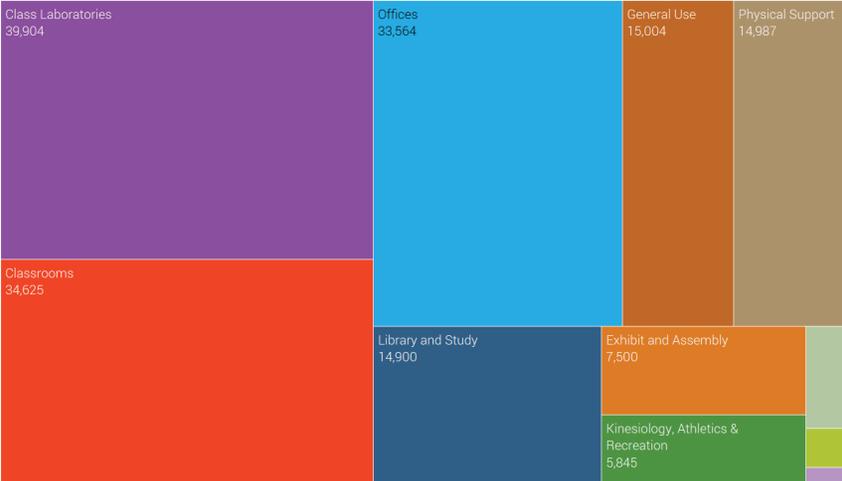
'Other' space types are not analyzed by the CCCCCO in relation to utilization and efficiency, but are important as part of the college's inventory related to campus experience and operations. These spaces include athletics and recreation space, student space, exhibit and assembly space, and campus support space.



EXISTING SPACE DISTRIBUTION

The College maintains a detailed space inventory of all buildings on the campus. The Facilities Utilization Space Inventory Options Net (FUSION) is a database maintained by the California Community Colleges Chancellor Office (CCCCO), and includes data on buildings and rooms for each college and district within the state. As required by the state standards, it is updated and submitted to the State Chancellor's office annually to reflect the current usage of facilities and space on campus. The 2018 Space Inventory Report was used as the basis for the analysis of space.

The largest category overall is Class Laboratories, followed closely by Classrooms and Offices. Offices are typically among the largest space categories as most institutions of a similar size and scope have 15-25% of their total area in offices – Norco College currently at 20% for office space. The Instructional space categories, however, are not typically this high at 24% and 21% respectively for Class Laboratories and Classrooms. This imbalance does not indicate a need for less instructional space, but rather a need to increase the other space types. For example, as a result of Norco College's history as a College Center rather than a Comprehensive College, the support spaces were not built up to a point to provide a holistic experience. As a result, many of these supporting space categories such as Library and Study space, Student space, and Exhibit and Assembly are below their expected share.



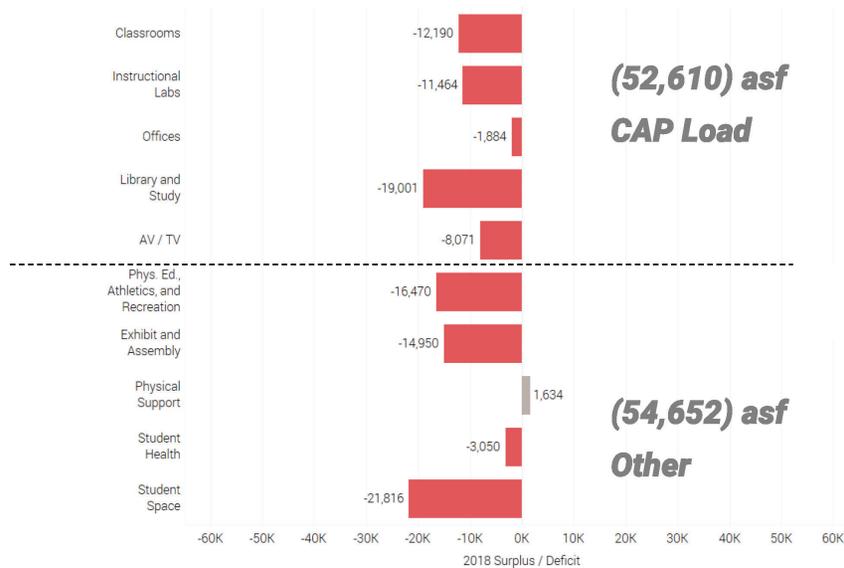
SPACE NEEDS OVERVIEW

The study shows that Norco College has a deficit of space for Fall 2018 of over 100,000 asf. As outlined in the chart below, the largest needs are in Library and Study Space, and Student Space. These two categories are a direct reflection of Norco College's history as a center to the larger Riverside City College. The only category within metric is Physical Support space. The recently completed Operations Building is responsible for the addition of this space type. Across the board, there are critical space needs today that affect the experiences of students, faculty, and staff.

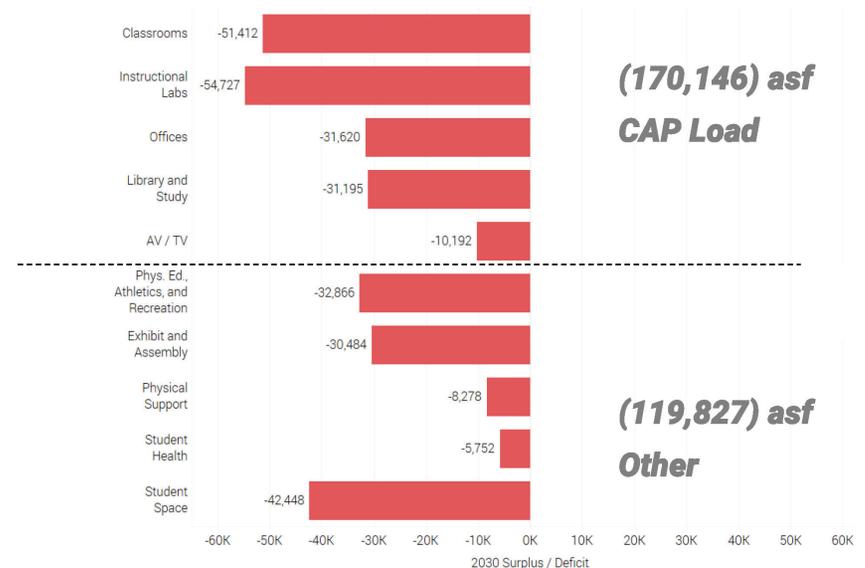
This deficit grows significantly in scale for the College to meet its 2030 enrollment growth targets. By the 2029-2030 academic year, Norco College will need 467,800 asf, which is a 177% (nearly quadrupling) in physical space on the campus. Instructional Labs is the largest need, followed by classrooms. These new instructional spaces will be critical to transforming into a comprehensive college.

Each space type is outlined in the following pages.

SPACE NEEDS TODAY (2018)



FUTURE SPACE NEEDS (2030)



INSTRUCTIONAL SPACE UTILIZATION AND NEEDS

Capacity (CAP) load ratios represent the direct relationship between the amount of space available by type, which is used to serve students, and the number of students participating or planned to be participating in campus programs.

DEFINITIONS

Instructional Space Utilization refers to the use of classrooms and class laboratories for academic coursework. Several key metrics impact instructional space utilization, including:

- » Weekly Room Hours/Room Utilization – the number of hours per week that an instructional space is in use for academic coursework on average. Room Utilization represents this as a percentage.
- » Seat Utilization – the percentage of seats occupied when an instructional space is in use.
- » Weekly Seat Hours – the average number of hours per week that a seat is in use in a given instructional space. This metric combines Weekly Room Hours and Seat Utilization.
- » Weekly Student Contact Hours – the number of class contact hours a class is scheduled to meet per week multiplied by the number of students in the class.
- » ASF per Station – the amount of assignable square footage per student seat on average in the room.

CLASSROOMS

The Classroom Utilization Analysis looks at the following key metrics, with the expectations as follows:

**48 WEEKLY
ROOM HOURS**

**66% SEAT
UTILIZATION**

**15 ASF PER
STATION**

**31.7 WEEKLY
SEAT HOURS**

The metrics are based upon the Cap Load targets as defined by the California Community Colleges Chancellor's Office. These metrics are combined to project the amount of classroom space needed, drawing on data provided by the institution as well as data presented in the Education Master Plan.

This data shows Norco College is exceeding these metrics in terms of classroom use, as such there is an identified need for additional classroom space today of over 12,000 asf, which grows to over 50,000 asf in 2030.

INSTRUCTIONAL LABORATORIES

As with classrooms, the Class Laboratory Utilization Analysis examined four key metrics, with the expectations as follows:

**27.5 WEEKLY
ROOM HOURS**

**85% SEAT
UTILIZATION**

**47 ASF PER
STATION**

**23.4 WEEKLY
SEAT HOURS**

The use expectations for Instructional Laboratories are different from Classrooms in several ways. First, the expectation for weekly room hours is significantly lower, which allows for student access outside of scheduled course hours. The unscheduled periods enable students to access specialized lab equipment to complete assigned project work. Also, instructional labs often require additional prep time as compared to typical classrooms. To balance this lower weekly use, and to acknowledge the considerable cost of building and maintaining this space, the seat utilization expectation is higher. Finally, ASF per Station is higher to account for equipment in the room, expanded workspaces per student, and additional support space. These lab metrics are intended to serve as averages—especially in the case of ASF per Station: A computer lab for the Business Administration program may require +-35 ASF per student station vs. a Welding lab that would need +-120 ASF per student station.

For Fall 2018, the metrics when applied show a need for additional class laboratory space of close of 12,000 asf. It is important to note that this is only taking into account only the courses that are currently being taught on campus. There is additional demand for lab sections even beyond the current waiting list, and Norco College simply does not have the facilities currently to meet this demand today. By 2030, it is estimated that will be a deficit of space of close to 55,000 asf for instructional labs.

CAP LOAD ANALYSIS, CONTINUED

OFFICES

The space needs analysis approaches offices based on the Cap Load metrics set out by the California Community Colleges Chancellor’s Office (CCCCO). This method simply applies a 140 ASF guideline for each Full Time Equivalent Faculty member employed at Norco College.

140 ASF/FTEF

The outcomes of the space need analysis for offices show a small deficit (approximately 1,880 asf) of space in the baseline year, which falls within the +/- 10% threshold and is therefore considered within metrics. By 2030, there will be a deficit of office space over 31,000 asf.

LIBRARY AND STUDY

Similar to Offices and Instructional space, the metrics for Library and Study space were driven by the Cap Load targets from the CCCCCO. For Library Collections space, the Cap Load metrics provide a baseline amount of space with an additional ASF allotment per Day Generated Enrollment (DGE) that scales down as the campus population gets larger. This is done on a district-wide level and then distributed to each campus based on proportional enrollment activity.

**15,180 ASF
BASELINE**

**7,844
DGE**

For the baseline scenario, the analysis indicates a significant deficit of library and study space of over 19,000 asf. The Library as it exists at Norco College today is undersized, due in part to a larger library being built on the Riverside City College campus. As Norco College’s student population has grown and will continue to grow, the footprint of the current Library is significantly undersized to provide Norco College’s students with adequate resources. By 2030, the deficit grows to over 31,000 asf.

AV / TV

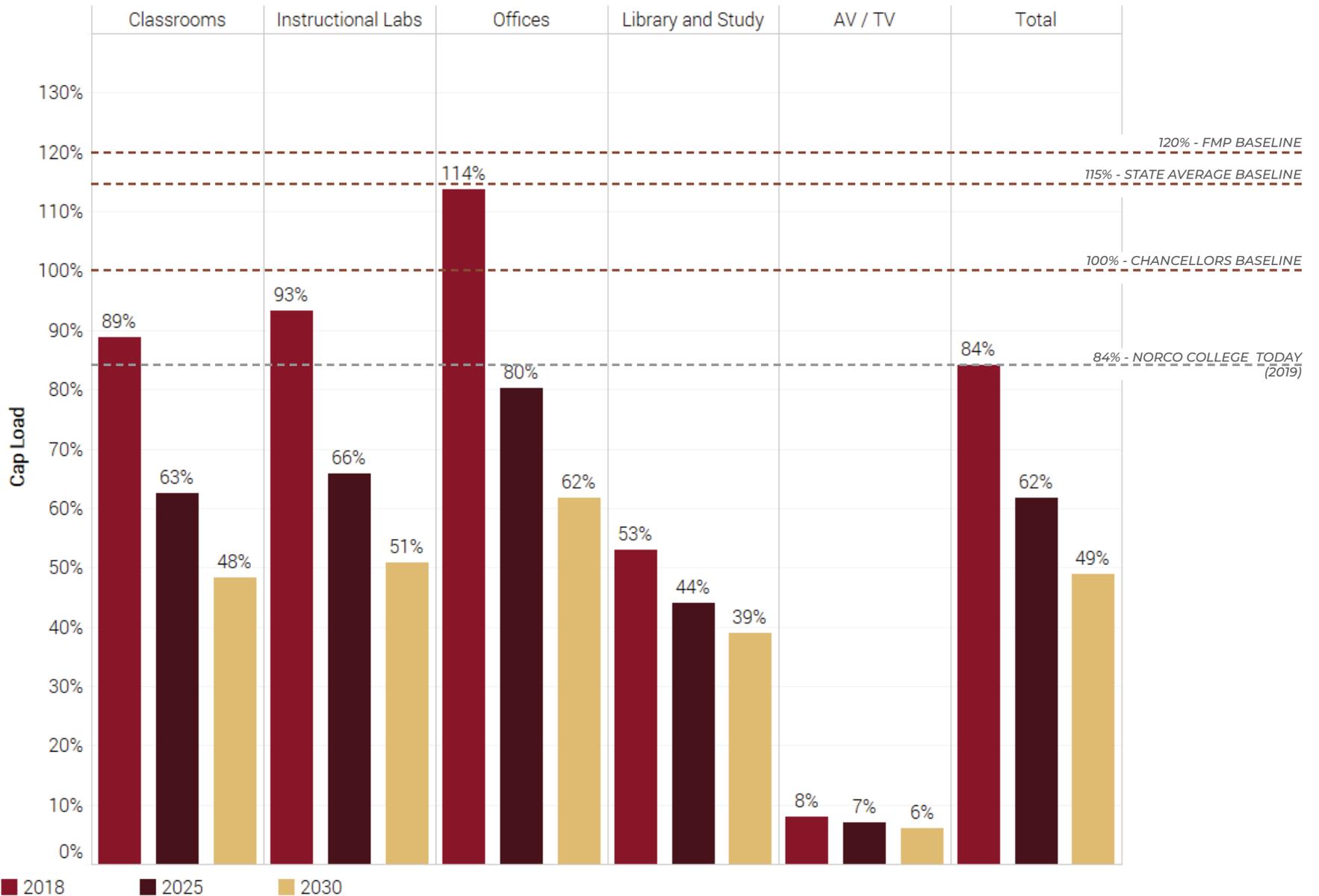
This category includes specialized uses primarily focused around audiovisual and media production space. The metrics were again driven by Cap Load targets as defined by the CCCCCO. The methodology here is similar to Library and Study space – a baseline amount is allotted per district, then additional space is added based on Day Generated Enrollment. This amount of space is then prorated for each campus.

**3,500 ASF
BASELINE**

**7,844
DGE**

At Norco College, this type of space shows a significant deficit of approximately 8,000 asf for the baseline year, and 10,000 asf in 2030. There is almost no existing space within this category on the campus as it exists today.

CAP LOADS PER SPACE TYPE OVER TIME



Graph 3.2

'OTHER SPACE' ANALYSIS

The space type "other" includes a number of spaces on campus that are considered to be non-capacity load categories. These are spaces that are not analyzed by the CCCCO in relation to utilization and efficiency, but are important as part of the college's inventory and add to the success of students and enhance their student experience.

KINESIOLOGY, ATHLETICS AND RECREATION

The assessment of athletics and recreation differs, as athletics space is directly supporting intercollegiate, competitive sports, while recreation space, often of similar types, is a support function for general student and community use. At Norco College, the Kinesiology program will also utilize these spaces. Needs for athletics are determined based on the type of sports offered, level of competition, and types of space required to support the activities being performed. For recreation/kinesiology space, an allotment of 3 ASF was made for each eligible person – this includes all students and 15% of non-student employees.

Quantitatively, this type of space shows a deficit at the baseline year over 16,000 asf, which grows significantly by 2030 to nearly 33,000 asf. The gap is primarily in kinesiology/recreation space, but there is a need for additional athletic support space, such as locker rooms and restrooms, adjacent to the athletic fields.

EXHIBIT AND ASSEMBLY

The exhibit and assembly space guidelines set a baseline amount of exhibit and assembly space needed for this type of space to support the programs that draw on this space, with an additional allotment of 2 ASF for each FTE student above 5,000. The majority of this space today is within the School of Arts and Humanities, but this type of space can also serve a purpose as a centralized resource for the College.

Space for exhibition and assembly shows a deficit of nearly 15,000 asf in the baseline year that doubles to over 30,000 asf in 2030.

STUDENT SPACE

This category accounts for space primarily used by students for gathering, studying, collaboration. The largest need on the campus is for student-focused spaces, including dining, retail, club and organization space, and lounges. Students who travel to campus through public transportation or get dropped off have very limited choice of spaces to utilize in between classes. Even students who drive to campus chose to leave or spend time in their cars in-between classes. Student support is a space type where economy of scale comes into play – smaller student populations require more space per student, but as enrollment grows that per student metric is gradually reduced. The need in this area was generated by applying a 5 ASF allotment for each FTE student.

Student space is the largest of space need on the campus today of any category, totaling nearly 22,000 asf. This need increases significantly to nearly 43,000 asf.

PHYSICAL SUPPORT

Physical Support space includes the centralized areas that service the College's grounds and facilities, which provides for shop spaces, equipment storage space, and central services such as mail-rooms. Physical Support space need is generated by applying an additional 5% ASF allotment to the total amount of generated space need in all other categories.

Physical support space is the only category not showing a deficit of space in the baseline year – it is however within metrics as the small surplus shown is within 10%. However, by 2030, the need is approximately 8,200 asf.

SPACE NEEDS BY CATEGORY SUMMARY

	EXISTING ASF	2018 ASF	CURRENT CAP LOAD DEFICIT	2025 SPACE NEEDS (FMP)	2025 SPACE NEEDS DEFICIT	2030 SPACE NEEDS (FMP)	2030 SPACE NEEDS DEFICIT
CLASSROOMS	34,625	46,815	(-12,190)	66,426	(31,801)	86,037	(51,412)
INSTRUCTIONAL LABS	40,173	51,637	(11,464)	73,268	(33,095)	94,900	(54,727)
OFFICE	33,564	35,448	(1,884)	50,232	(16,668)	65,184	(31,620)
LIBRARY / STUDY	14,900	33,901	(19,001)	40,760	(25,860)	46,095	(31,195)
AV / TV	569	8,640	(8,071)	9,851	(9,282)	10,761	(10,192)
OTHER <i>Physical Ed, Athletics, Rec- reation, Exhibit + Assembly, Physical Support, Student Health, Student Space</i>	45,039	99,691	(54,652)	128,096	(83,057)	164,866	(119,827)
TOTALS	168,670	276,132	(107,262)	368,633	(199,763)	467,843	(298,973)

Table 3.0

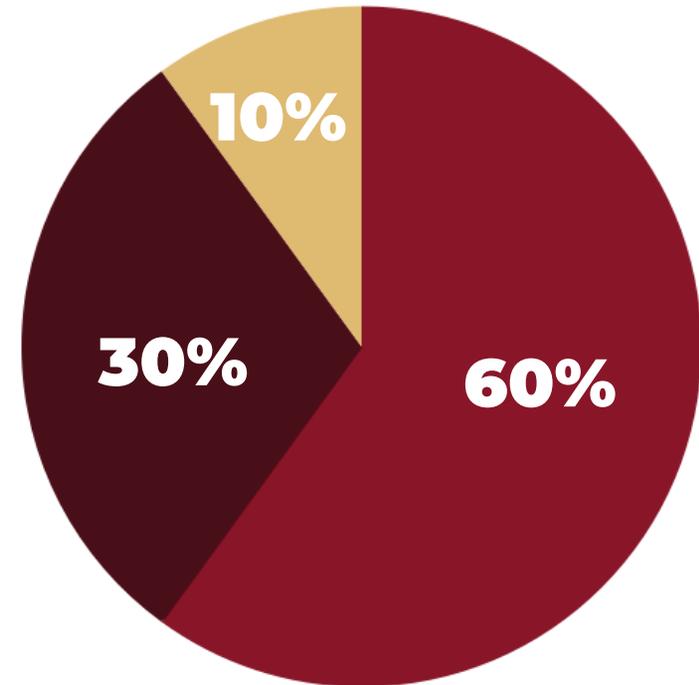
GUIDED PATHWAYS

Guided Pathways Project established within California community colleges will implement an integrated, institution-wide approach to student success by creating structured educational experiences that support each student from point of entry to attainment of high-quality postsecondary credentials and careers. Guided Pathways provides students with clear, educationally coherent program maps that include specific course sequences, progress milestones, and program learning outcomes.

To align with the goals established by Guided Pathways, the generated need for study space, student-centered (e.g. meeting, hangout, dining) space, and office space for student services needs was pro-rated and allocated to specific uses into the needs of each of the schools that tie in to Guided Pathways. The pro-ration was made into three overarching groups:

- » **60% was pro-rated for centralized needs** in the campus core and/or the "front door" of Norco College.
- » **30% was distributed across the four schools.** This allocation of space was then pro-rated within the schools based upon Weekly Student Contact Hour (WSCH) contribution.
- » The remaining **10% was allocated for vulnerable populations** – such as Veterans, Foster Youth, DACA, LGBTQ+, Umoja, and others.

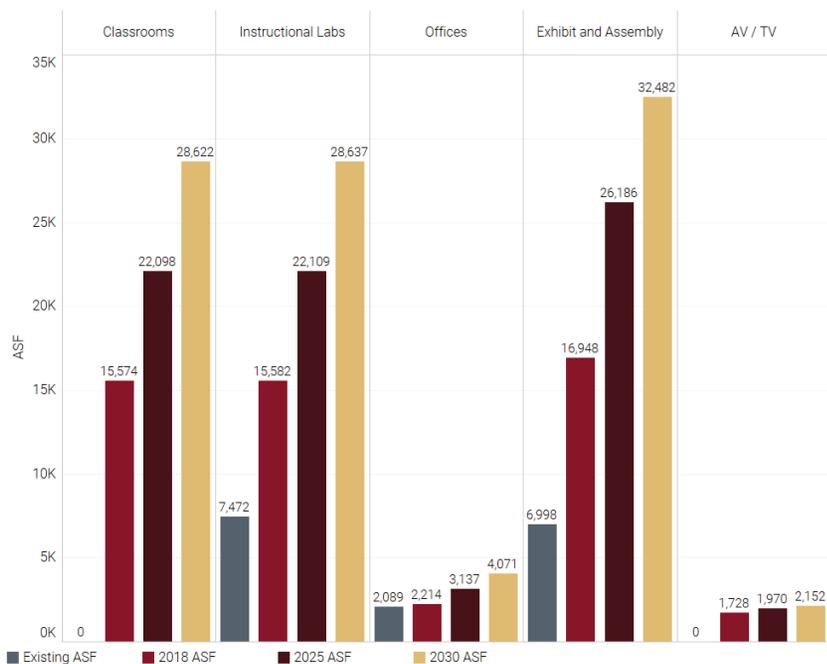
This methodology and distribution of space was generated and approved by multiple Norco College stakeholder groups throughout the master plan process. The intent of this method was to provide dedicated spaces for each group to directly support student success.



SPACE NEEDS BY SCHOOL/UNIT

ARTS AND HUMANITIES

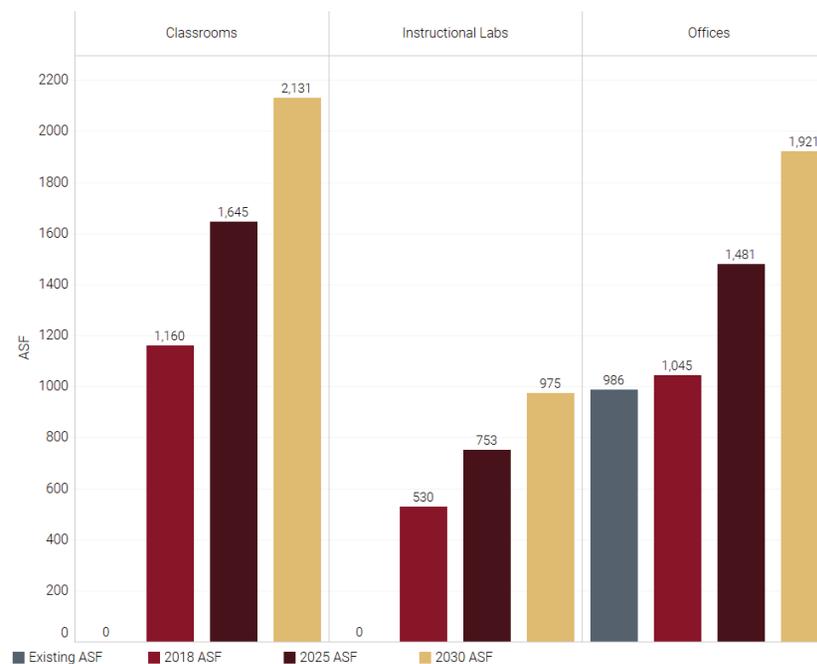
Arts & Humanities is the second largest academic unit on the Norco College campus. As it currently exists, there are deficits of space essentially across all space type categories. As we move towards 2025 and 2030, accounting for the planned growth outlined in the Education Master Plan, these deficits grow. The largest deficits are in instructional space – both classrooms and class/open laboratories. There is also a significant deficit in Exhibit and Assembly space, specifically to support the needs of Norco College's Arts programs. Smaller scale needs exist in Offices, spaces pro-rated for the Guided Pathways initiative, and AV/TV space.



Graph 3.3

BUSINESS MANAGEMENT

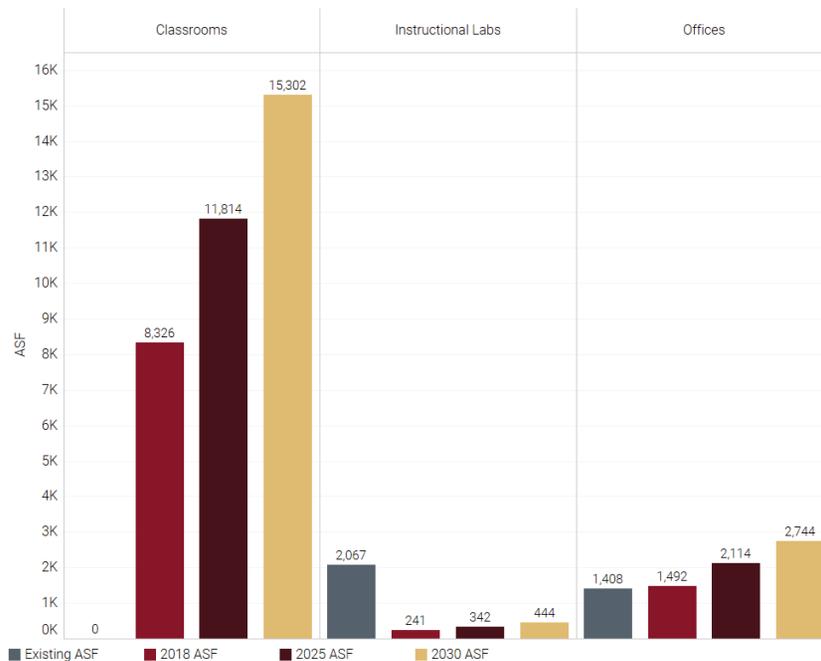
As the sole occupant of a very small footprint of space currently, the School of Business & Management is the smallest unit on campus. Despite its relatively small size and student population (in the context of its peer Schools), there are still significant needs. The largest need is in Classrooms, with smaller deficits existing in Instructional Labs, Offices, and the Guided Pathways pro-rated spaces.



Graph 3.4

SOCIAL AND BEHAVIORAL SCIENCES

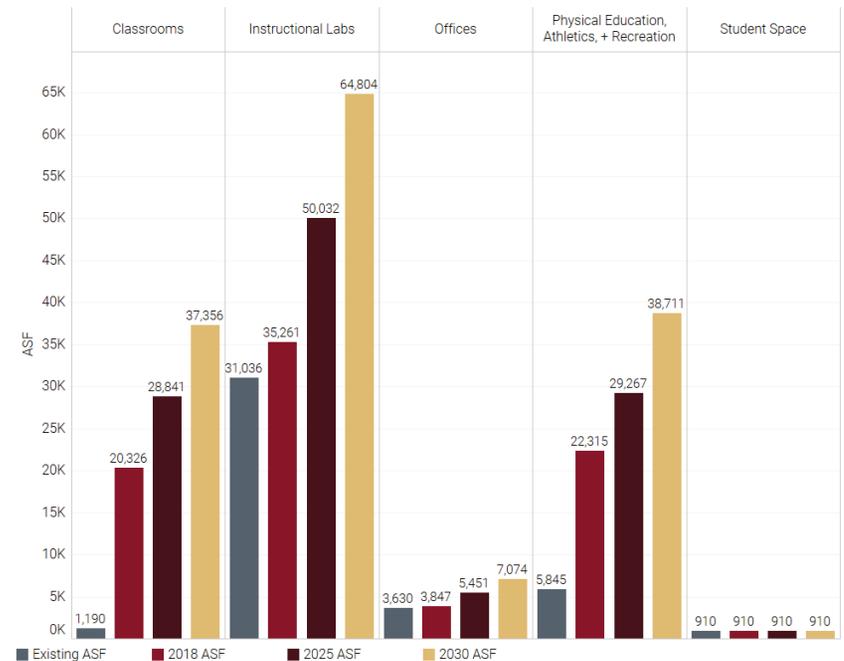
Like Business & Management, the School of Social and Behavioral Sciences (SBS) has a relatively small footprint in comparison to the other two academic units. However, the School of SBS is contributing a significant portion of the Classroom Weekly Student Contact Hours offered at Norco College with nearly 20%. As a result, by far the largest area of need is in Classrooms. This need increases significantly looking towards 2025 and 2030. Needs also exist in Offices and the Guided Pathways pro-rated areas. There is, however, a small-scale surplus in Instructional Labs in this area.



Graph 3.5

STEM

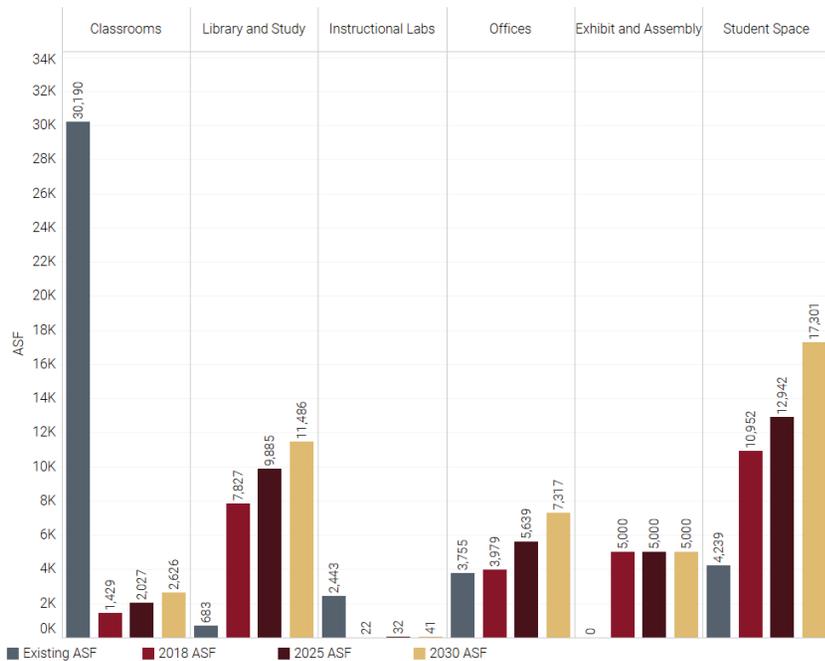
The School of STEM currently occupies the largest amount of space on Norco College's campus at just over 42,000 ASF. Despite this relatively large footprint in comparison to the College's other academic units, there are still needs in every space category in which they occupy space – especially as we look towards the two future scenarios. The largest areas of need are focused on instructional space types. In order of magnitude, the largest deficits in the 2030 scenario for STEM are Classrooms, Instructional Labs, and Physical Education/Athletics/Recreation space. There are also smaller scale deficits in Offices and the Guided Pathways pro-rated areas.



Graph 3.6

ACADEMIC AFFAIRS

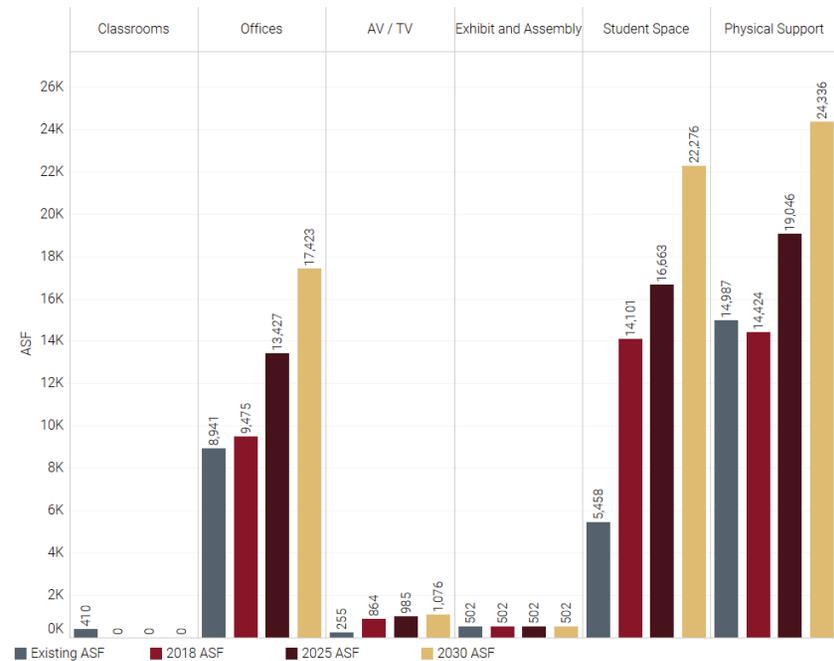
This unit accounts for the administrative side of Academics – i.e. units reporting to the VP of Academic Affairs. There are several areas of need here – including, in order of magnitude, Library and Study, Student space, Exhibit and Assembly, and Offices. There are surpluses in both Classrooms and Instructional Labs – however, these surpluses do not indicate that Norco College has “too much” instructional space. The need for this type of space is generated within each school, while the majority of the space is held centrally by Academic Affairs. This is not uncommon among institutions of higher education. If we look to the overall scale of need holistically, the surplus in this area does not outweigh the combined deficits from the four Schools.



Graph 3.7

BUSINESS SERVICES

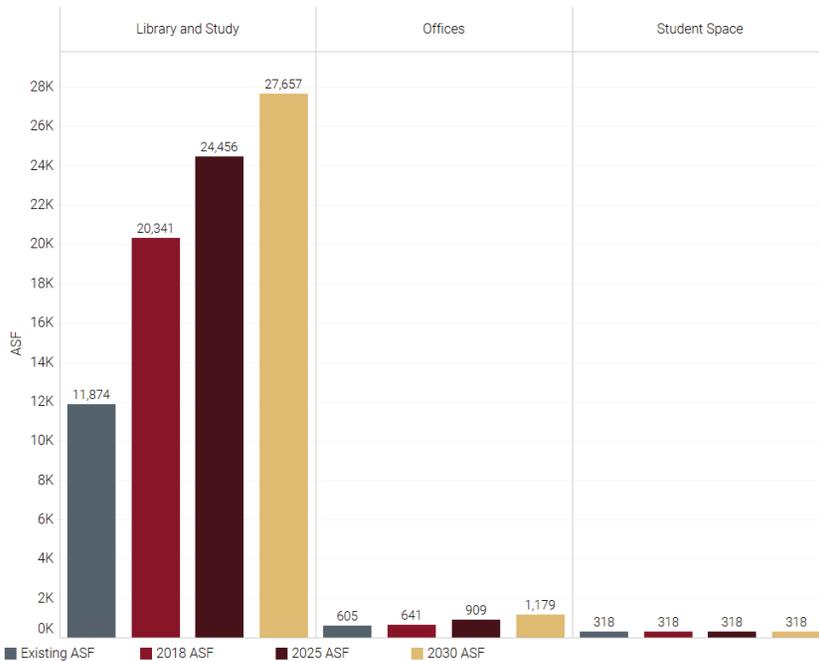
This unit houses administrative functions which report through the Vice President of Business Services. Much like the other academic and administrative units discussed thus far, Business Services is showing needs essentially in all space types it occupies. The largest needs are in Student Space, Physical Support, and Offices for the two future scenarios. There is also a deficit in AV/TV space, although it is significantly smaller in scale comparatively. Exhibit and Assembly and Classrooms are in relative balance.



Graph 3.8

LIBRARY

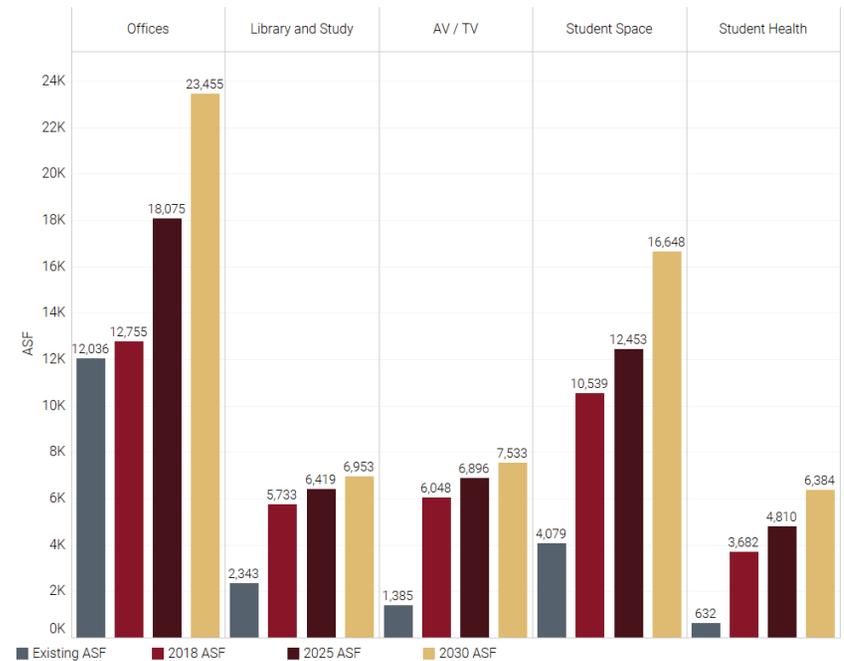
The Library holds space in just three categories – with the vast majority in Library and Study space, and smaller portions in Offices and Student space. There is a small-scale need showing in Offices across all scenarios, while Student space is in relative balance. Library and Study space, however, is showing a significant need that grows as we add students in 2025 and 2030. This represents a need for more than double the current Library's footprint in 2030.



Graph 3.9

STUDENT SERVICES

Similar to Business Services, this unit comprises all administrative functions which report through the Vice President of Student Services. While the space allocated is primarily comprised of Offices, these units also occupy Library and Study space, AV/TV, Student space, and Student Health space. In terms of the administrative units, the needs of Student Services are the largest overall. There are significant deficits in all space types, starting with Student space as the largest followed by Offices, AV/TV, Student Health, and Library and Study respectively. This accounts for needs that were pro-rated based on the Guided Pathways model as well as the generated needs for existing and future projected staff/students.



Graph 3.10



CHAPTER 04: CAMPUS VISION PLAN

The Campus Vision Plan aligns with the space needs and the strategic direction as defined by College leadership of student, college, and regional transformation. The 2030 Campus Vision Plan outlines the approach for the development over the next 10+ years. **The planned buildings represent both space needs as defined by the College as well as space for potential partnerships with community and industry.** In addition to buildings and facility projects, open space, pedestrian circulation, and vehicular circulation projects are also identified to enhance the physical environment and experience for campus users.

PLANNING PRINCIPLES

A set of principles were established based on the planning team's observations and analysis, along with stakeholder input and feedback for the purpose of informing the develop and evaluation of possible planning concepts and final site plan. They provide the framework for identifying the required improvements and additions to the campus environment, facilities and infrastructure. As the College implements the projects, the planning principles should be the framework for all design decisions. With a flexible site plan, these principles are the consistency and framework that will ensure the College fulfills the vision of this plan in the next decade.

- 1** **EQUITABLE STUDENT SUCCESS**
Ensure equitable student success and well-being through high-quality and appropriate teaching, support, study, and collaboration spaces.
- 2** **STRATEGIC PARTNERSHIPS**
Develop regional partnerships to create facilities, open space, and programs that benefit the campus and community alike.
- 3** **SUSTAINABILITY**
Prioritize sustainability strategies in all decision-making.
- 4** **CRITICAL FACILITIES**
Plan for critical facilities that address current space needs while also addressing for future initiatives.
- 5** **OPEN SPACE**
Use outdoor space to celebrate and enhance Norco College's unique setting.
- 6** **CIRCULATION AND SAFETY**
Promote a walkable, accessible, safe campus which is easy to navigate for the entire Norco community.

The 2030 Campus Vision Plan was developed based upon:

- » Listening to the needs of campus and community stakeholders
- » An analysis of campus space needs and the physical campus conditions
- » The intent to address each of the planning principles and planning objectives

The framework of the plan seeks to honor the natural settings of the campus and region while creating an active, urban environment with-use buildings lining Third Street, transitioning of vast surface parking lots into dense parking structures, and creating a pedestrian-focused environment with lush open space and pathways that knit the campus together. With the framework of Guided pathways as an organizing factor, the development of the campus is situated around two main pedestrian spines that provide the connectivity needed for collaborative environments.

- A** VETERANS RESOURCE CENTER (PHASE 1)
- B** TEMPORARY ACADEMIC VILLAGE SITE
- C** EARLY CHILDHOOD EDUCATION CENTER
- D** STEM (PHASE 1)
- E** RECONSTRUCT ATEC / IT > ARTS AND HUM.
- F** KINESIOLOGY (PHASE 1)
- G** SOFTBALL COMPLEX
- H** WELCOME CENTER / STUDENT SERVICES
- I** LINER BUILDING
- J** DEMOLISH STUDENT SERVICES AND CRC
- K** LLRC EXPANSION PROJECT
- L** RECONSTRUCT EXISTING LIBRARY LLRC
- M** DEMOLISH BOOKSTORE + BUNGALOWS
- N** SCIENCE & TECH. / HUMANITIES
- O** STEM (PHASE 2)
- P** DEMOLISH STEM 100 + 200 + 300
- Q** SOCIAL + BEHAVIORAL SCIENCES (PH. 1)
- R** BUSINESS / CLASSROOMS
- S** LINER BUILDING
- T** OPERATIONS + MAINTENANCE BUILDING
- U** DEMOLISH M1 + M2
- V** DEMO WEST END QUAD
- W** PERFORMING ARTS CENTER
- X** LINEAR BUILDING
- Y** DEMOLISH STEM VILLAGE PORTABLES
- Z** STEM (PHASE 3)
- AA** SOCIAL + BEHAVIORAL SCIENCES (PHASE 2)
- BB** KINESIOLOGY (PHASE 2)
- CC** DEMO CACT BUILDINGS
- DD** COMMUNITY / STUDENT CENTER
- EE** ARTS + HUMANITIES BUILDING
- FF** VETERANS RESOURCE CENTER (PHASE 2)

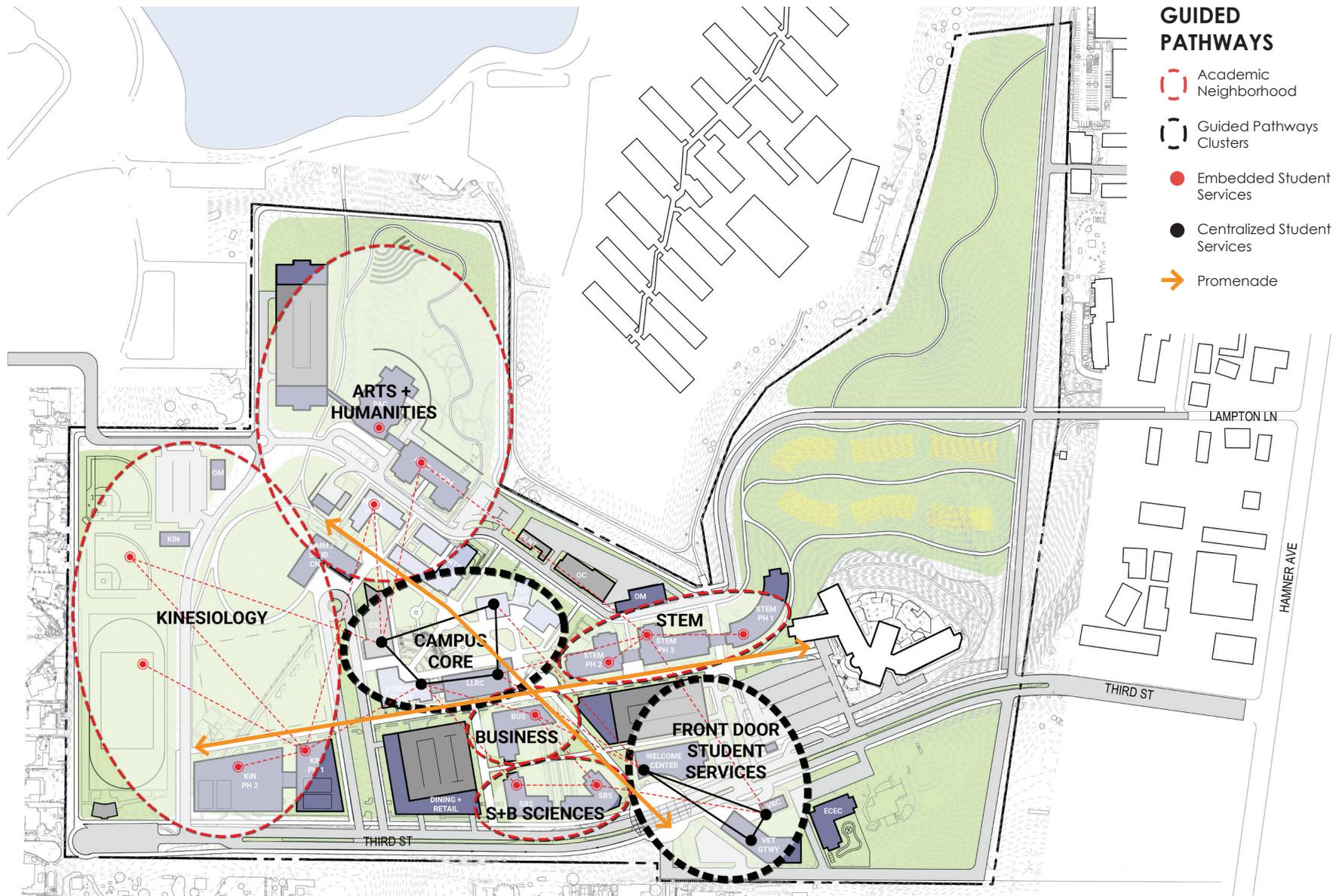
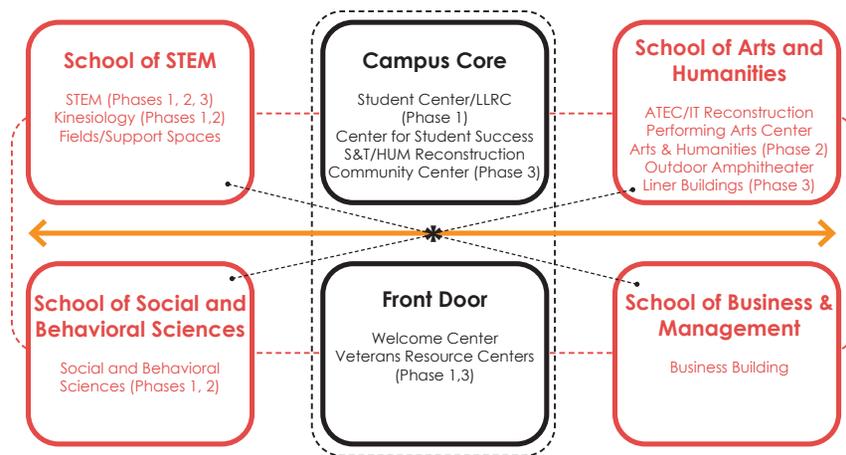


Diagram 4.1

GUIDED PATHWAYS FRAMEWORK

The Guided Pathways elements define the organization of the site plan to support the academic success for students. The four schools are each connected to a strong core and front door. The connections provide clear wayfinding and access to services and academic functions located around the campus.



Promenades: The pedestrian promenades begins at the front door and lead on to each of the academic neighborhoods. These major pedestrian corridors provide ease of access and direction for campus visitors and new students.

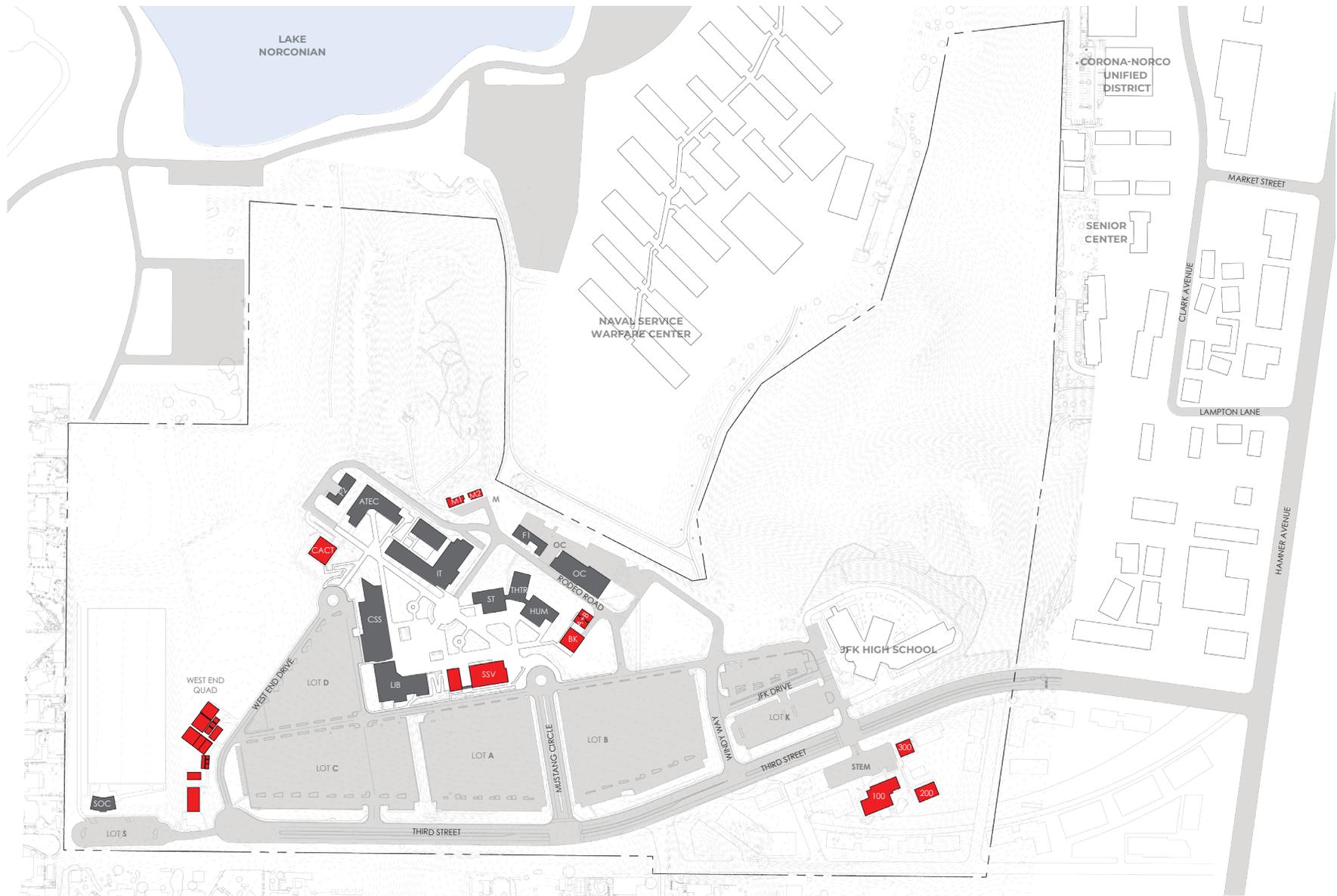
Front Door: The Welcome Center housing front-door, one-stop student services, Engagement Centers, and the Guided Pathway Advancement Center, as well as the two new Veterans Resource Centers, will serve as a

new front door to the College. These programs are placed intentionally at the front of the campus along the main access drive and adjacent to convenient parking. The prominent location identifies a clear location to start the college experience.

Campus Core: A dynamic and vibrant campus core contains student life uses including dining, learning resources, study spaces, and administrative functions. A new Library Learning Resource Center (LLRC) is essential for student learning, growth, success, equity, and completion. The existing Library will be renovated into a Student Center and house student-focused space such as dining, meeting rooms, and informal collaboration spaces.

Academic Neighborhoods: Each school is strategically located to maximize interdisciplinary learning and collaboration. Kinesiology is expanded from the current sports field location, and provides the community convenient access to indoor and outdoor recreation. The Arts and Humanities neighborhood is anchored by placing the Performing Arts Center atop the hill, providing magnificent views to the north. The STEM neighborhood is located in close proximity to the Naval Base for potential collaboration; And Business and Social & Behavioral Sciences form a campus quad and provide both specialty uses for their programs as well as general instructional spaces

To provide services directly where the student population spends time, a portion of academic support and counseling school-based, cross-functional success teams will be embedded directly within the academic buildings for each of the four schools.



DEMOLITIONS

Today, 14% of the existing space inventory is currently in portable or modular buildings, and most of that space is instructional space and faculty offices. Based on the analysis of existing conditions and discussions regarding the effectiveness of space all temporary and modular buildings have been identified to be removed from the campus. A high priority for the College is to replace all portable and modular buildings with larger, permanent, and flexible buildings so all students, disciplines, and programs have an equitable experience.

The graphic on the facing page highlights the buildings on the campus that are planned to be demolished. It is important to note that the removal of the buildings will occur over an extended period of time in order to limit disruption and minimize the need for swing space.

The table at right identifies each of the buildings to be demolished, the programs within, and the planned relocation for those programs. It also indicates the phase in which the building is planned to be demolished.

BUILDING	EXISTING PROGRAM	ASF	GSF	PROGRAM RELOCATED TO:	PHASE
CRC	College Police	2,067	2,785	Liner Building A	1
SSV	Student Services, Administrative Offices	9,276	14,357	S&T, HM, Welcome Center	1
BK	Bookstore	3,099	3,600	Liner Building A	1
A&B	Offices	1,699	960	Academic Buildings	1
M1/M2	Facilities	1,620	2,229	New M&O Building	2
STEM 100, 200, 300	Instructional Space	10,061	13,035	S&T, HM, Welcome Center	2
WEST END QUAD	Instruction Space, Faculty Offices	9,793	11,063	Academic Buildings	2
CACT	Instruction Space, Faculty Offices	4,561	5,020	STEM Phase 2	3
Academic Portable Village (Ph 1)	Instruction Space, Faculty Offices	22,800	22,800	Academic Buildings	3

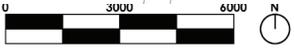
Table 4.0



BUILDING USE

- Academics / Research
- Administration / Office/Student Services
- Facility Support / Storage
- Student Life/ General Use
- Athletics/Rec/ Kinesiology
- Community / Corporate / Education Partners

Diagram 4.3



BUILDING AND FACILITIES

In its vision to become a comprehensive college, and as outlined within the Education Plan, several new facilities will be added to the campus that showcase the enhanced academic offerings such as a Visual and Performing Arts Complex, Kinesiology Building, and several new STEM Buildings.

In effort to bring the community onto campus more frequently, community-focused programs are placed at the perimeters of the campus, such as the Veterans Resource Center, Early Childhood Education Center, the Performing Arts Center, and the Kinesiology Phase II building. The programs will host frequent visitors to the campus, and have convenient access points and adjacent parking.

New buildings and renovations should plan for a mixed-use program that intentionally places programs within a single structure that enhance collaboration and reduce redundancies. To support the Guided Pathways Framework, all academic facilities should house both academic functions such as classrooms, class labs, and faculty offices, but also academic and student support spaces such as tutoring, advisement, and counseling.

All the low density modular and temporary buildings have been replaced into high-quality, permanent structures. All new buildings will each have a minimum height of two stories, and a maximum height of four stories. No buildings is planned to be less than two stories. This added height allows the opportunity for the campus to increase its open space, and leave room for future development beyond 2030. The massing of the buildings should align the pedagogical or functional needs of the program/use while relating to both the campus context and immediate context. It is imperative that building massing and interior spaces utilize simple forms and proportions to ensure long-term flexibility as programs change in the future. A larger discussion of campus architectural guidelines is located in the appendix.



Diagram 4.4



OPEN SPACE AND LANDSCAPE

The plan calls for the development of the campus to be focused around the formation of new and improved open spaces. As a campus set within a "regional park", these critical open spaces help create a vibrant and comfortable campus environment that extend learning and socializing from the indoors to the outdoors. The master plan sites various types of open spaces including: quads, plazas, open lawns, amphitheater, walking trails, and recreation space.

Adjacent to the elongated promenade, an enhanced campus plaza and new campus quad will provide comfortable places enhanced with shade and improved site furnishes, as noted in the landscape site guidelines.

Multi-use trails for pedestrians and equestrians wind through the campus and provide beautiful views of the surrounding mountains, Lake Norconian, and the newly development agricultural fields. A new open lawn / park space is a space for students, campus users, and the community to come together in a peaceful environment.

An outdoor amphitheater will be built into the existing topography on the north side of the property adjacent to the Lake. Its proximity to the Performing Arts Center will lend itself to programmed outdoor performances, with the backdrop overlooking the Lake.

Athletic/Recreation field improvements and additions include new softball fields, new multi-purpose fields, and an improved soccer field with new track. These facilities will be open for use to the students and surrounding community.



Diagram 4.5

PEDESTRIAN CIRCULATION

Pedestrian circulation is the primary organizational component of the plan. The existing promenade is extended south to Third Street, engaging the new Welcome Center / Student Services building. This prominent connection provides clarity on circulation for any new visitor to the campus. Connecting at a central location, the promenade also extends east to west, providing connection from the JFK High School to the Athletics/Recreation/Kinesiology facilities.

Various routes of pedestrian circulation are also enhanced throughout campus, connecting one to each program. Primary pedestrian circulation routes should be clearly defined and kept clear from vehicular activity (excluding service and emergency vehicles).

A unique element to this campus is the multi-purpose trail along the perimeter. As the City of Norco is a prominent equestrian community, it is important to engage horse circulation on the campus. This multi-purpose trail will be wide enough to accommodate horses, pedestrians, and bicyclists.

An enhanced pedestrian crossing will be located on Third Street, to connect central campus to the Veterans Resource Center and other facilities. The enhancement requires further study into traffic considerations but should include following considerations for improvement: decorative pavement, elevated pavement, gateway signage, bump-outs, planters, or bollards.

VEHICULAR CIRCULATION

-  Existing Roadway
-  Potential New Roadway
-  Parking (Lot + Structure)
-  Demolish Roadway + Parking
-  Potential Campus Access Point



Diagram 4.6

VEHICULAR CIRCULATION

Currently, the campus is limited to one entry/exit point off of Third Street. With a growing population and a focus on safety, potential campus access points are identified, as shown on the diagram. To develop the access points, varying levels or relationships or partnerships are needed with the City of Norco, CNUSD, Navy, Riverside County Transportation Authority, and potentially others. The District will work with the partners indicated above to understand the feasibility of each location and study traffic and other considerations.

A new loop road is proposed located on the exterior of the central campus. The loop road increases safety greatly throughout campus by eliminating conflicts with pedestrians and vehicles in the core of the campus.

Two new drop-off loops are provided along Third Street - one on the eastern edge leading to the Welcome Center / STEM buildings, and one on the western edge leading to Arts + Humanities / Kinesiology buildings. Drop-off loops shall alleviate congestion during heavy times of pick up and drop-off on campus. Safety and security of the on-campus roadways will be addressed, including clear delineation between public roads versus access/service drives.



Diagram 4.7



PARKING

A parking model was developed to estimate the future parking demand on campus. Forecasts estimate that based on an increase in enrollment to nearly 14,000 FTES, a minimum of 3,100 spaces will be needed for typical day operations.

With the presence of venues for large campus and/or community events and the first week of school which typically experiences higher parking demand, an additional 150 parking spaces will be added to the campus. A parking management plan is recommended to control the increased demand during these events, as it is also expected to be more congested on campus and around campus if not properly addressed.

Most of the surface lots will be removed and those spaces will be held in new parking structures. All parking structures will have adjacent liner buildings that includes space for campus units such as operations and business services, along with various potential partnerships. The liner buildings creates aesthetic backdrops for the campus and shields the view of the utilitarian parking structure form.

Project	Parking	Number of Spaces
-	Lot S (Soccer)	70
-	Operation Center	5
R1	Parking Structure A	840
R2	Surface Lot - ECEC	60
R3	Surface Lot - Softball	155
R10	Parking Structure B	835
R11	Surface Lot- Arts&Hum	83
R12	Parking Structure C	920
R13	Surface Lot - VRC Phase 2	47
-	JFK Lot	235
		3,250

Table 4.1



Diagram 4.8

TRANSIT

With the reconfiguration of West End Drive into the traffic circle, the RTA bus route will be re-routed accordingly, however the stop will remain in the existing location. As part of the feasibility studies for potential campus entrances, corresponding studies should be completed to see how RTA routes may be adapted with the additional access points and the presence of large venues such as the Performing Arts Center.

BICYCLE CIRCULATION

Bicycle circulation around the campus will be extended with the addition of the multi-purpose trail. Bicycle parking stations should be located outside of all new and renovated academic and student-focused buildings.



CHAPTER 05: IMPLEMENTATION PLAN

The Facilities Master Plan recommendations outlined in the previous chapter represent an overall picture of the future developed campus and includes recommendations for renovation, replacement of facilities, and campus-wide site and systems improvements. It is critical to understand that the transformation of the campus will occur in a series of phases over the next decade and beyond. The three phases and the subsequent projects are outlined within this section.

In order to be successful and practical, a master plan must be flexible and responsive to the changing dynamics that are extremely prevalent in higher education today. Shifts in funding availability, program changes, enrollment fluctuations, etc. may cause a plan to occur out of sequence or differently than imagined within this document.

With flexibility and responsiveness underpinning the implementation strategy, the sequence of projects has been developed based on the following parameters:

- » Address today's critical spaces needs early in the phasing
- » Limit the number of moves and reduce the need for swing space
- » Position Norco College to maximize opportunities for funding



R6

R3

G

R5

OS1

E

N

M

B

D

R4

R7

OS3

KIN

OM

OS2

CSS

K

L

LLRC

I

PH 2

PORT-ABLES

R8

STEM PH 1

OS1

R1

WELCOME CENTER

H

R2

A

YRC

C

ECEC

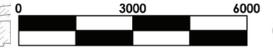
THIRD ST

THIRD ST

CLARK AVE

LAMPTON LN

MARKE



PHASE 01 PLAN

- BUILDINGS**
 - A** VETERANS RESOURCE CENTER (PHASE 1)
 - B** ACADEMIC VILLAGE
 - C** EARLY CHILDHOOD EDUCATION CENTER
 - D** STEM (PHASE 1)
 - E** RECONSTRUCT ATEC / IT > ARTS AND HUM.
 - F** KINESIOLOGY (PHASE 1)
 - G** SOFTBALL COMPLEX
 - H** WELCOME CENTER / STUDENT SERVICES
 - I** LINER BUILDING
 - J** DEMOLISH STUDENT SERVICES AND CRC
 - K** LLRC EXPANSION PROJECT
 - L** RECONSTRUCT EXISTING LIBRARY LLRC
 - M** DEMOLISH BOOKSTORE + BUNGALOWS
 - N** SCIENCE & TECH. / HUMANITIES
- OPEN SPACE**
 - OS1** PROMENADE (N/S)
 - OS2** CAMPUS AMPHITHEATER AND PLAZA
 - OS3** SOFTBALL FIELDS
- PARKING & ROADS**
 - R1** PARKING STRUCTURE A
 - R2** SURFACE LOT - ECEC
 - R3** SURFACE LOT - SOFTBALL
 - R4** ROADWAY - PROPERTY TO STEM
 - R5** ROADWAY - NORTH CONNECTOR
 - R6** ROADWAY - WEST CONNECTOR
 - R7** ROADWAY - PROPERTY TO LAMPTON
 - R8** ROADWAY - DROP OFF 1
 - R9** ROADWAY - DROP OFF 2

A VETERANS RESOURCES CENTER (PHASE 1)

Size: 2,530 ASF; 4,200 GSF

Program: Student Services

Total Project Cost*: \$3.6-3.8M (funded)

Project Description: The new Veterans Resource Center will expand and enhance programs and services to student veterans entering civilian life through military service to college credit articulation, counseling, health services, housing, child care and access to community and veterans resources. This first phase of the Veterans Resource Center also offers veteran students assistance with financial aid, military benefits, counseling, and academic support.

Open Space and Infrastructure: In addition to the structure, this project includes a drop-off area off of Third Street.

Related Projects:

» N/A



* Includes soft costs and escalation



ACADEMIC VILLAGE PORTABLES

Size: 22,800 ASF

Program: Instructional Space (Classrooms, Science Labs), Faculty Offices

Total Project Cost*: \$11.8M

Project Description: The temporary village will be implemented as a high priority project to ease the existing campus deficit. The portable structures will include instructional labs, classrooms, and offices for a total of 22,800 ASF. These portables will also serve as swing space as future renovations and relocations occur around the campus.

Open Space and Infrastructure:

As part of the academic temporary village, a central open space should be planned that provides outdoor gathering space for campus users. The design of this open space should align with the Campus Experience Guidelines listed at the end of this chapter.

Related Projects:

» N/A



* Includes soft costs and escalation

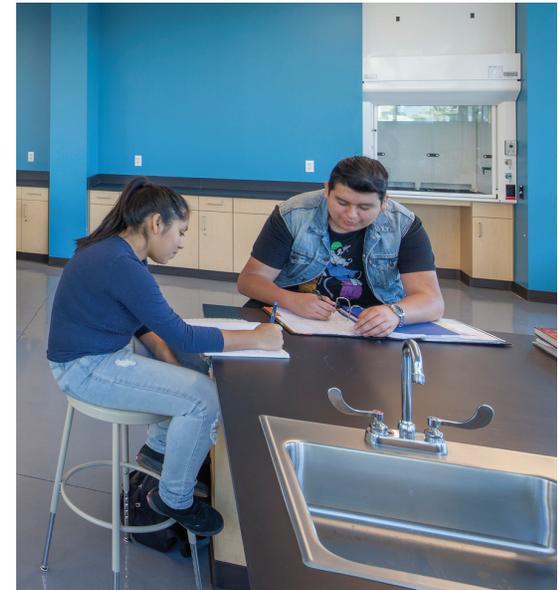
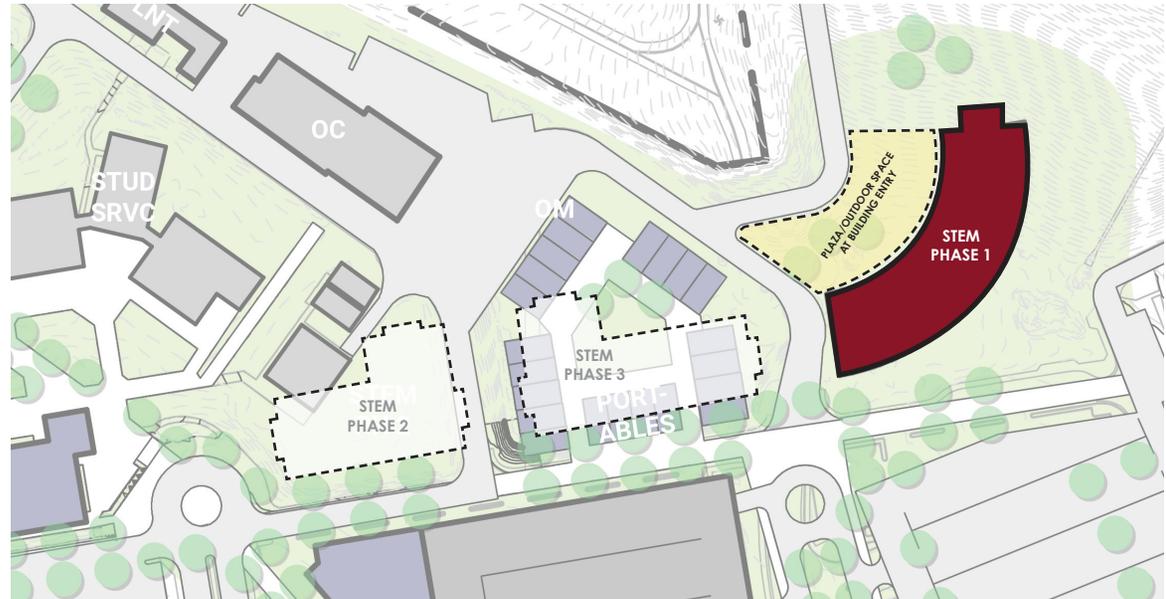
D STEM (PHASE 1)

Size: 47,700 ASF; 79,500 GSF

Program: STEM Instructional Classrooms, Science Labs, Engineering Labs, Maker Space

Total Project Cost*: \$49.8M

Project Description: The first of three STEM buildings will hold relocated programs from ATEC and IT, along with space for the growth and expansion of science and engineering programs. Instructional spaces support active, technology rich teaching and learning through large classrooms, and flexible labs. Embedded student service and student collaboration spaces provide space for Guided Pathways Initiatives to be housed directly within the building.

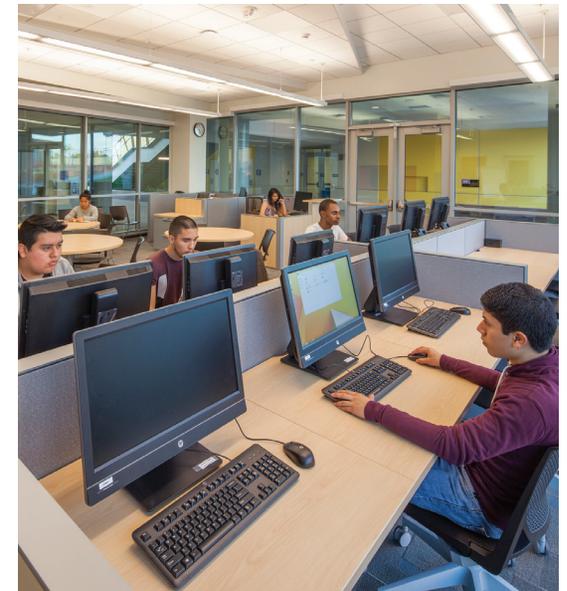


Open Space and Infrastructure:

This project includes the creation of open space and pedestrian seating areas at the building's entry. The design of this space should align with the Campus Experience Guidelines listed at the end of this chapter.

Related Projects:

- » Backfill Project: Renovation of ATEC/IT Buildings



** Includes soft costs and escalation*

EARLY CHILDHOOD EDUCATION CENTER

Size: 10,060 ASF; 16,930 GSF

Program: Early Childhood Education

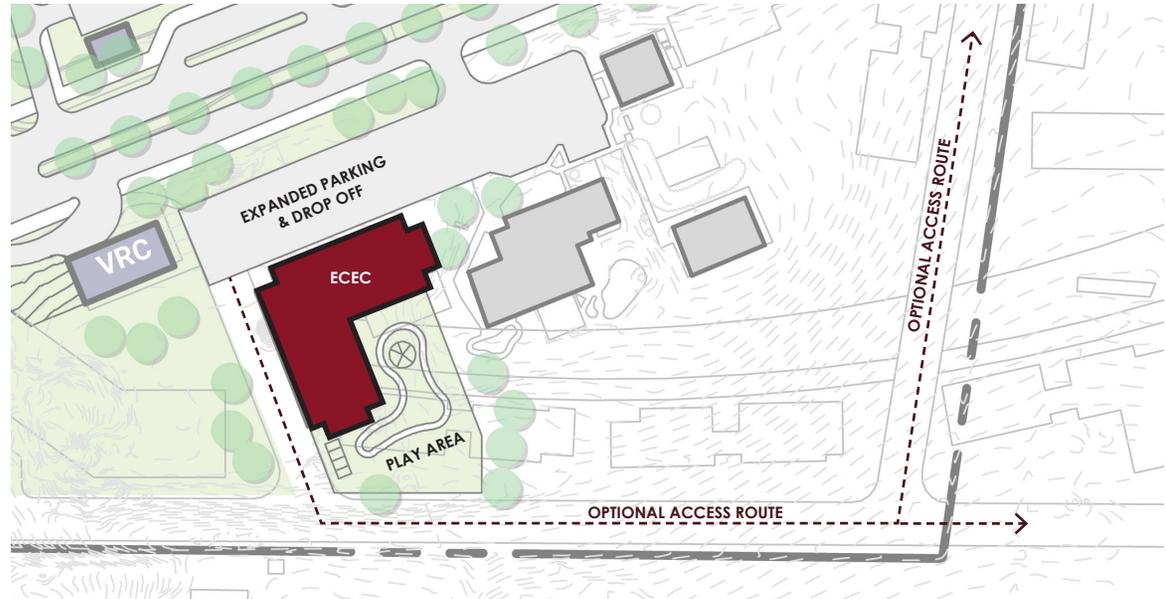
Total Project Cost*: \$11.2M

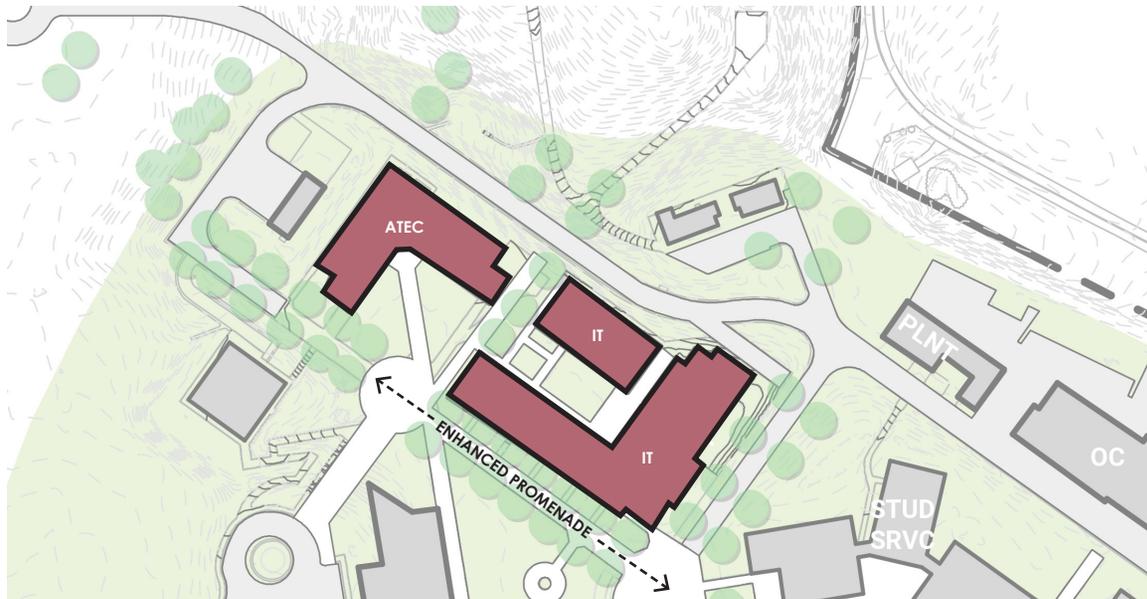
Project Description: As part of the existing early childhood education program, a new facility will become a home for child care services paired with academic space for both observation and instruction. At the front door of the campus the location is convenient for drop-off and pick-up, as well as provides ample open space for expanded parking and open space for outdoor play areas.

Open Space and Infrastructure: The project includes an outdoor play space that is appropriate for the age groups served at the Center. The outdoor space should be enclosed, shaded, and include plantings and shade trees. A surface parking lot should be adjacent to the new building for staff parking and parent drop off. To reduce traffic along Third Street, additional access routes to Third Street and Hamner Avenue should be studied for feasibility.

Related Projects:

- » Surface Parking Lot





RECONSTRUCT ATEC AND IT (OCCURS OVER PHASE 1, 2, AND 3)

Size: 43,140 ASF; 64,880 GSF

Program: Arts and Humanities Instructional and Studio space

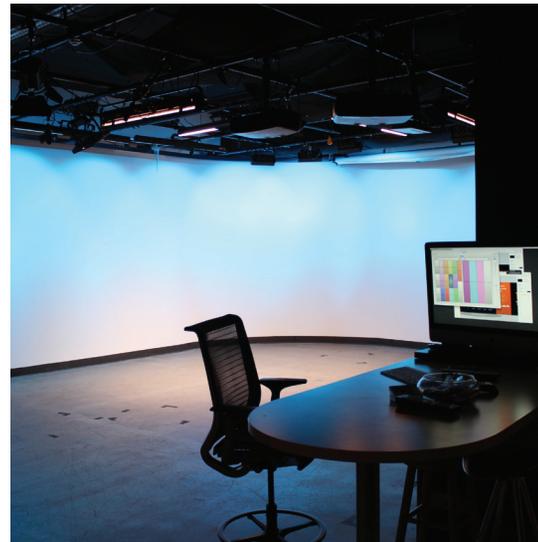
Total Project Cost*: \$23.4M

Project Description: With the relocation of programs from ATEC/IT buildings into the STEM Phase I building, these spaces will be vacant and available for reconstruction into instructional space and studios for Arts and Humanities. Instructional spaces support active, technology rich teaching and learning through large classrooms, and flexible labs. Embedded student service and student collaboration spaces provide space for Guided Pathways Initiatives to be housed directly within the building.

Open Space and Infrastructure: The courtyard space will be enhanced and should be a place to display student projects and include outdoor learning environments.

Related Projects:

- » STEM Phase 1
- » Promenade N/S



* Includes soft costs and escalation

F KINESIOLOGY + ATHLETICS (PHASE 1)

R9 **Size:** 38,700 ASF; 64,000 GSF

Program: Kinesiology/Athletics

Total Project Cost*: \$37.6M

Project Description: The facility will include Kinesiology classrooms, classroom labs, offices, conferences rooms, a gymnasium for both academic use and Athletics programs, locker rooms, and student space. Embedded student service and student collaboration spaces provide space for Guided Pathways Initiatives to be housed directly within the building.

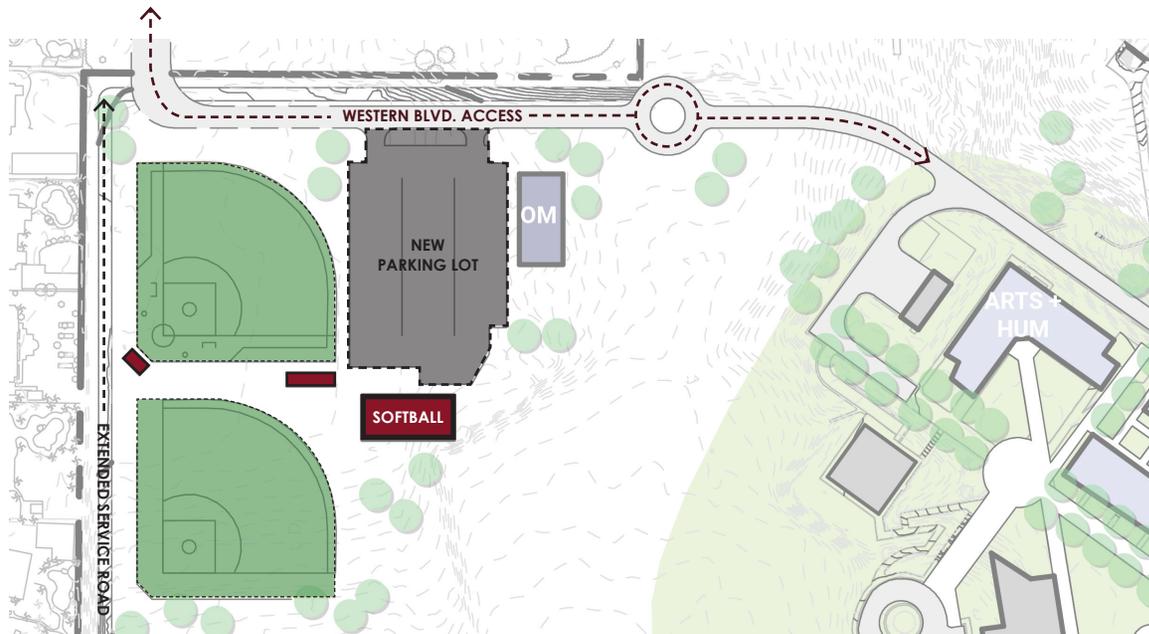
Open Space and Infrastructure:

Along with the building, the campus entry and drive way will be reconstructed to the east side of the new Kinesiology Building. The existing surface parking lot will be reconfigured.

Related Projects:

- » Reconfigured campus entrance
- » Reconfigured surface parking lot





SOFTBALL COMPLEX

Size: 1,800 ASF; 3,000 GSF

Program: Athletics and Community Use

Total Project Cost*: \$7.3M

Project Description: Two regulation competition softball fields will be located in the northwest corner of the campus. A small support building will be located adjacent to the fields to provide space for storage, restrooms, concessions, and a satellite training room.

Open Space and Infrastructure:

A new surface parking lot will be constructed as part of this project. The Western Boulevard access road should be studied to understand its feasibility to be completed as part of this project to provide access to the northwest corner of the campus. An extension of the service drive will connect the complex into the infrastructure of the campus.

Related Projects:

» N/A



* Includes soft costs and escalation

G

OS3

R3

R5

R6

H WELCOME CENTER / STUDENT SERVICES

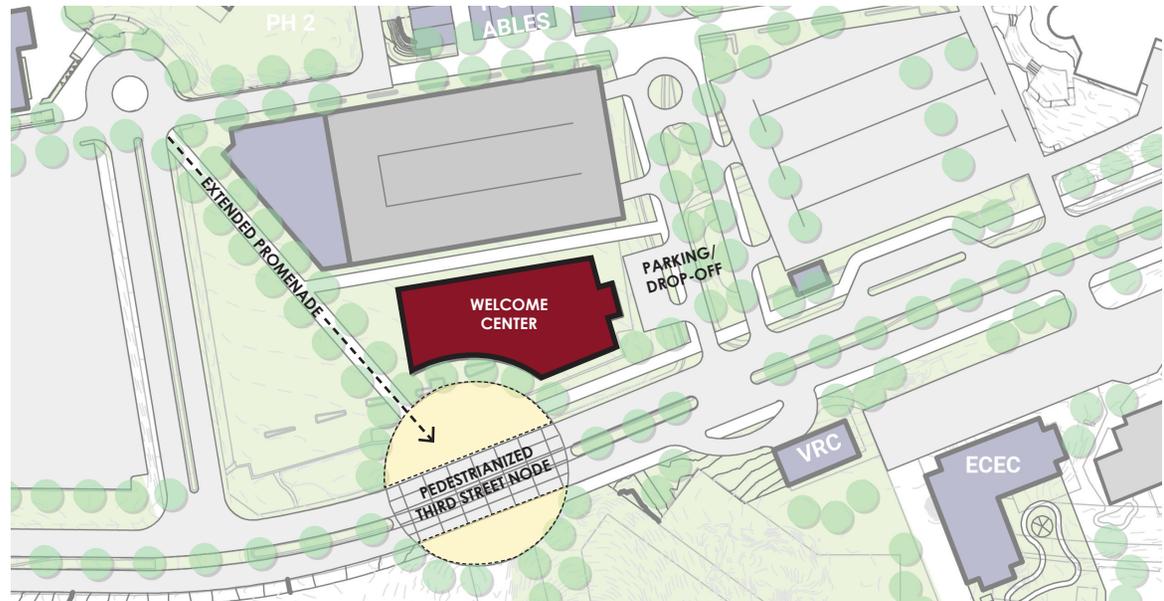
OS1

Size: 30,000 ASF; 50,000 GSF

Program: Student Services

Total Project Cost*: \$29.2M

Project Description: The Welcome Center will serve as the new front door of the College. Focused on matriculation services, the building is designed to welcome students, allow student ambassadors to guide and aid first time students, provide clear and easy wayfinding to service desks and departments, and support the student services department in its mission of Student Success. The building will be the home to the one-stop shop for student services, a Cultural Center which will provide support for affinity groups such as Umoja, LGBTQ+, and others, as well as the Guided Pathway Advancement Center.



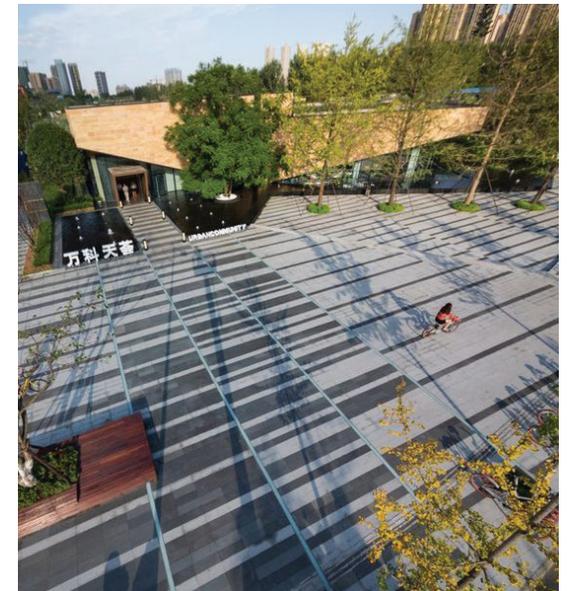
* Includes soft costs and escalation

Open Space and Infrastructure: An extension of the campus promenade will extend the existing campus framework to connect Third Street into the core of the campus. In addition, an enhanced pedestrian crossing will be located on Third Street, to connect central campus to the Veterans Resource Center and other facilities south of Third Street. The enhancement requires further study into traffic considerations but should include following considerations for improvement: decorative pavement, elevated pavement, gateway signage, bump-outs, planters, or bollards.



Related Projects:

- » Parking Structure / Liner Building
- » Relocation of functions from Student Services Building and Center for Student Success



J **NEW LIBRARY LEARNING RESOURCE CENTER AND STUDENT CENTER RECONSTRUCTION**

K

L

M

OS2

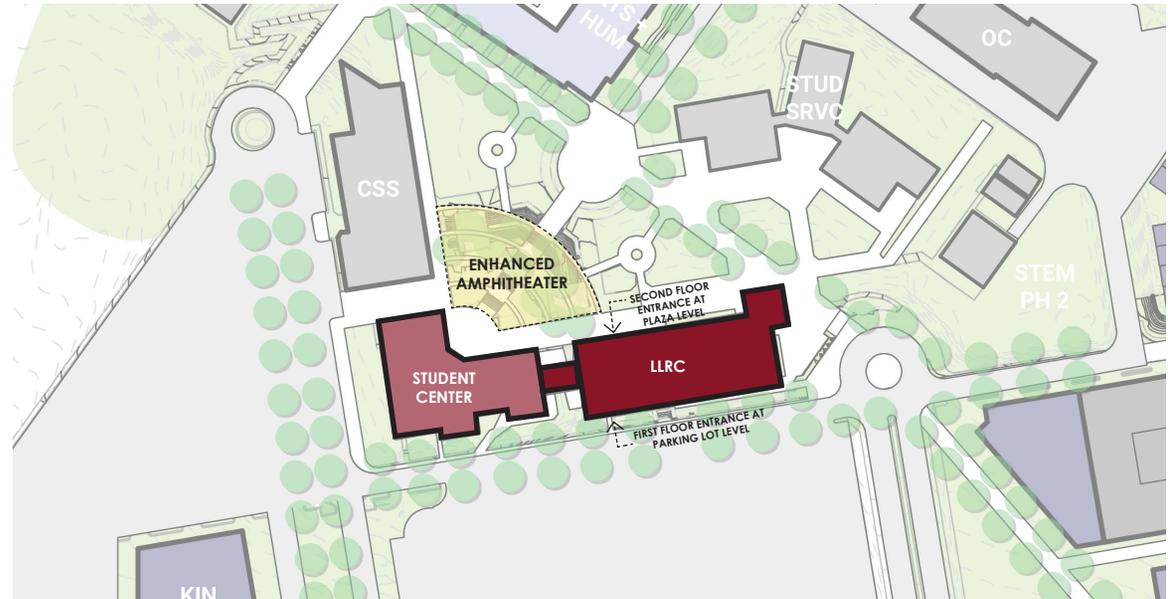
Size: 45,000 ASF, 75,000 GSF (New Construction)

19,560 ASF, 30,740 GSF (Reconstruction)

Program: Library, Study, Academic Resource Center, Dining, Student Focused Space

Total Project Cost*: \$63.1M

Project Description: Construction of the new Library Learning Resource Center will expand much needed library and academic support space on the campus. The existing Student Services and CRC buildings will be demolished to accommodate the new LLRC expansion. (Programs within those buildings will be relocated into STEM Phase 1, the Welcome Center, and the Liner Building earlier in Phase 01.) The new LLRC building will be three stories, and to aid in accessibility, the building will have internal circulation patterns that bridge from the lower parking level to the plaza level, eliminating the need for large outdoor ramps.

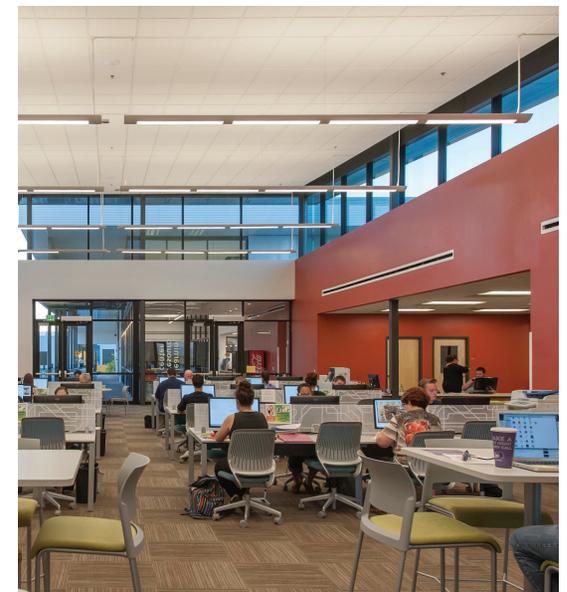


The construction of the new LLRC will occur while the existing Library is still online and supporting the campus. Once the new LLRC is complete, the existing Library will be renovated into a Student Center and house student-focused space such as dining, meeting rooms, and informal collaboration spaces. A pedestrian bridge will connect the two structures.

Open Space and Infrastructure: The existing concrete amphitheater will become an enhanced campus plaza.

Related Projects:

- » Demolition of CRC, Student Services Building, Bookstore, and Bungalows



** Includes soft costs and escalation*

I PARKING STRUCTURE/LINER BUILDING

R1 **Size:** 23,400 ASF; 39,000 GSF

R8 **Program:** Business Service space, Center for Workforce Innovation, and Partnership space

Total Project Cost*: \$30.9M

(\$54.8M with Liner Building)

Project Description: Due to the reduction in surface parking spaces to make way for new buildings, a critical part of phase one is a new four-level parking structure. The structure will have an adjacent Liner Building that includes space for business services such as the bookstore, campus police, parking services, food services, as well as the Center for Workforce Innovation, and partnerships space, swing space, and/or space for future growth.

Open Space and Infrastructure: Along with the parking structure, a new drive way and drop-off to the east side of the parking structure becomes the main visitors entrance to the campus.

Related Projects:

- » Reconfigured campus entrance and drop-off
- » Welcome Center





SCIENCE + TECHNOLOGY & HUMANITIES RECONSTRUCTION

Size: 21,650 asf

Program: Relocations from CRC and Student Services buildings

Total Project Cost*: \$10.5M

Project Description: With the demolition of the CRC and Student services buildings, administrative and back-of-house student services programs will relocate into Science + Technology and Humanities buildings. These spaces are primarily offices.



PHASE 02 PLAN

BUILDINGS

- O STEM (PHASE 2)
- P DEMOLISH STEM 100 + 200 + 300
- Q SOCIAL + BEHAVIORAL SCIENCES (PH. 1)
- R BUSINESS / CLASSROOMS
- S LINER BUILDING
- T OPERATIONS + MAINTENANCE BUILDING

OPEN SPACE

- U DEMOLISH M1 + M2
- V DEMO WEST END QUAD
- OS4 AGRICULTURE LAND
- OS5 CAMPUS QUAD
- OS6 PROMENADE (E/W)

PARKING

- R10 PARKING STRUCTURE B
- R11 SURFACE LOT - ARTS & HUM



STEM (PHASE 2)

Size: 37,440 ASF; 62,400 GSF

Program: STEM Instructional Classrooms, Science Labs, Engineering Labs, Maker Space

Total Project Cost*: \$49.4M

Project Description: The second STEM building will hold the remainder of relocated programs from ATEC, IT, STEM 100, 200, and 300 buildings, along with space for the growth and expansion of science and engineering programs. Instructional spaces support active, technology rich teaching and learning through large classrooms, and flexible labs. Embedded student service and student collaboration spaces provide space for Guided Pathways Initiatives to be housed directly within the building.

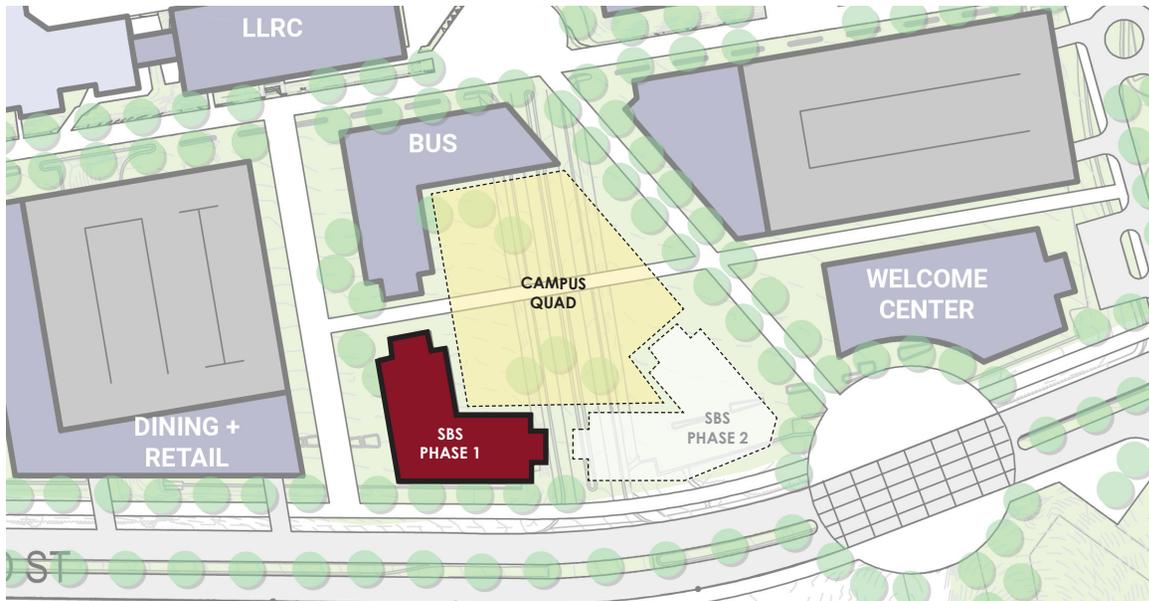
Open Space and Infrastructure:

This project includes the creation of open space and pedestrian seating areas at the entry of the building. The E/W campus promenade should be established as part of this project which creates a pedestrian connection from JKF HS into the campus core.

Related Projects:

- » Renovation of ATEC/IT Buildings
- » Demo STEM 100,200, 300





SOCIAL + BEHAVIORAL SCIENCES (PHASE 1)



Size: 22,920 ASF; 38,200 GSF

Program: Social Behavioral Sciences Academic Space and General Purpose Instructional Space

Total Project Cost*: \$26.8M

Project Description: As an anchor for the Social and Behavioral Sciences programs, this building will house the specialty spaces required for those programs, as well as faculty members supporting the programs. In addition, the building will house general purpose classrooms and labs such as open use computer labs. Embedded student service and student collaboration spaces provide space for Guided Pathways Initiatives to be housed directly within the building.

Open Space and Infrastructure:

As part of this project, a new campus quad will be constructed in the front of the campus directly adjacent to the N-S promenade. This open space will create new outdoor learning and gathering spaces for students. The design of this space should align with the Campus Experience Guidelines listed at the end of this chapter.

Related Projects:

» n/a



R

BUSINESS

OS6

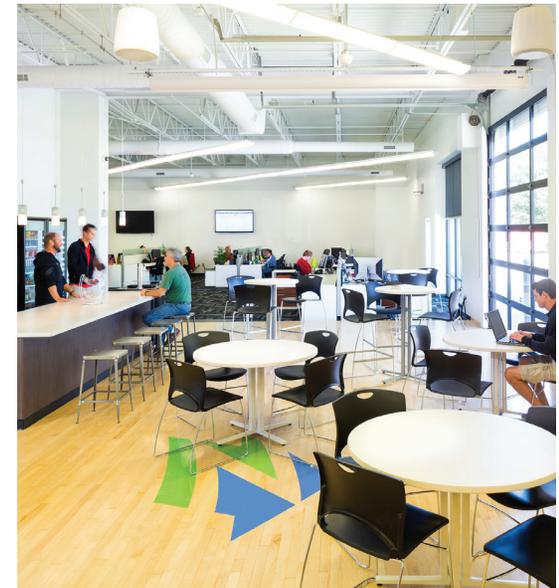
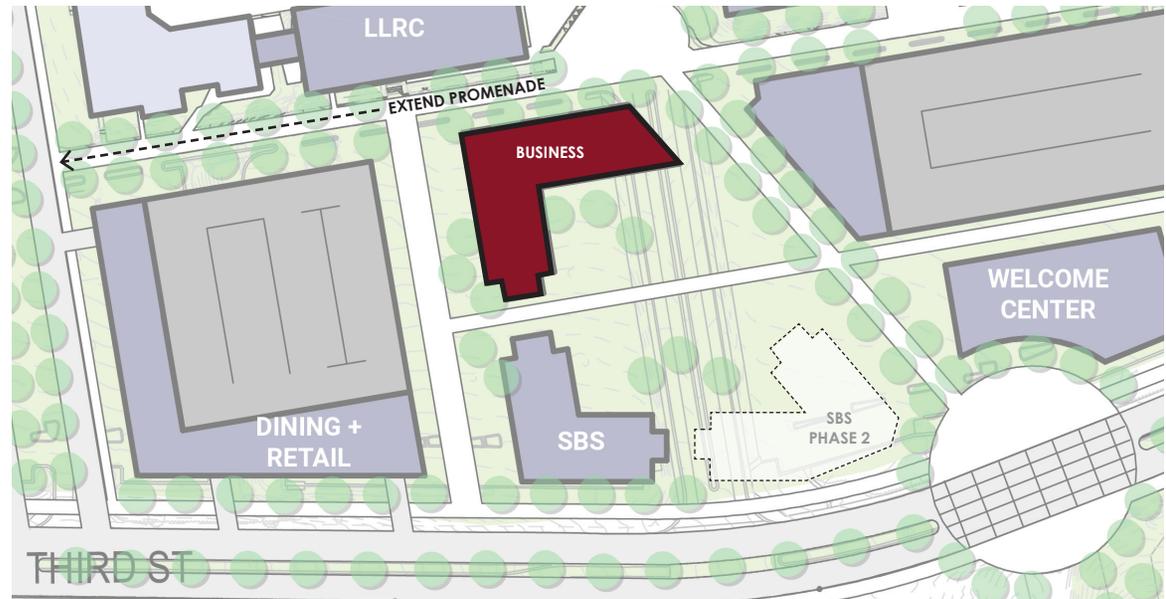
Size: 24,480 ASF; 41,400 GSF**Program:** Business Academic Space and General Purpose Instructional Space**Total Project Cost*:** \$27.9M

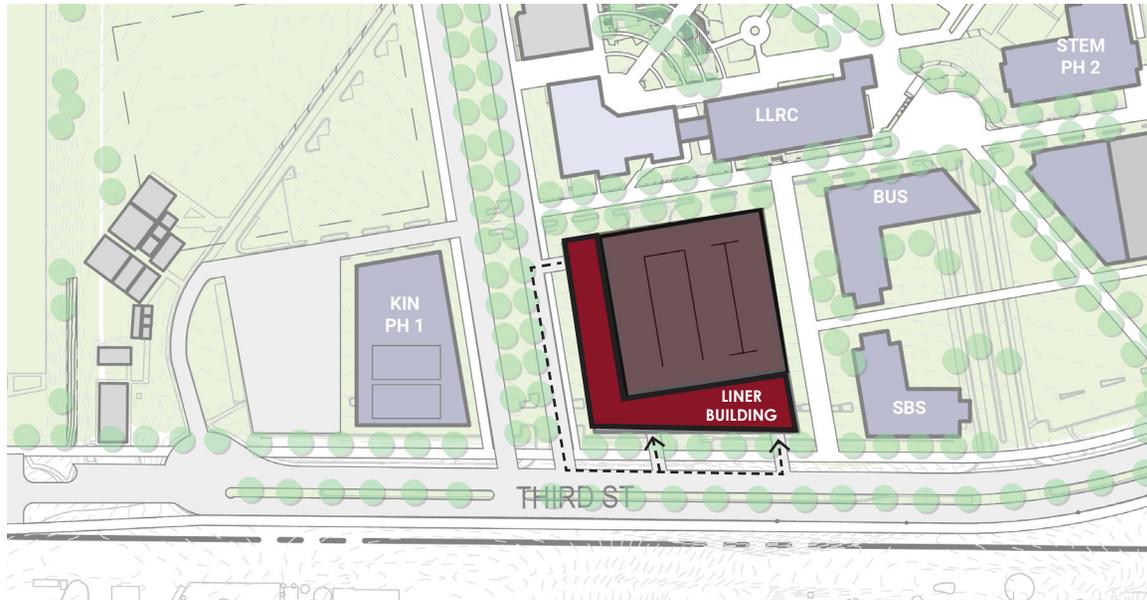
Project Description: As an anchor for the Business and Management programs, this building will house the specialty spaces required for those programs, as well as faculty members supporting the programs. In addition, the building will house general purpose classrooms and labs such as open use computer labs. Embedded student service and student collaboration spaces provide space for Guided Pathways Initiatives to be housed directly within the building.

Open Space and Infrastructure: The E/W campus promenade should be extended west as part of this project. This pedestrian link creates a connection from JFK HS into the campus core to the Kinesiology and Athletics zone.

Related Projects:

» n/a





PARKING STRUCTURE/LINER BUILDING

S

V

R10

Size: 32,400 ASF; 54,000 GSF

Program: Business Service space, Partnership space

Total Project Cost*: \$25.5M
(\$61.9M with Liner Building)

Project Description: Due to the reduction in surface parking spaces to make way for new buildings, a critical part of phase two is a new four-level parking structure. The structure will have an adjacent Liner Building that includes dining, retail, and space for partnerships space, swing space, and/or space for future growth. At the completion of this project the remaining programs within the West End Quad can be relocated and the temporary structures can be demolished.

Open Space and Infrastructure:

» n/a

Related Projects:

» Demolish West End Quad

T MAINTENANCE AND OPERATIONS

U **Size:** 9,350 ASF; 14,500 GSF

Program: Expanded Campus Operations Space

R11 **Total Project Cost*:** \$9.6M

Project Description: With a growing campus, expanded operations and maintenance space will be needed during phase 02. This building includes space for maintenance shops, storage, offices and meeting spaces. At the completion of this project temporary structures M1 and M2 will be demolished.

Open Space and Infrastructure: n/a

Related Projects:

- » Demo M1 and M2



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PHASE 03 PLAN

- BUILDINGS**
 - W PERFORMING ARTS CENTER
 - X LINEAR BUILDING
 - Y DEMOLISH STEM VILLAGE PORTABLES
 - Z STEM (PHASE 3)
 - AA SOCIAL + BEHAVIORAL SCIENCES (PHASE 2)
 - BB KINESIOLOGY (PHASE 2)
 - CC DEMO CACT BUILDINGS
 - DD COMMUNITY / STUDENT CENTER
 - EE ARTS + HUMANITIES BUILDING
 - FF VETERANS RESOURCE CENTER (PHASE 2)
- OPEN SPACE**
 - OS7 PARK SPACE
 - OS8 OUTDOOR AMPHITHEATER
 - OS9 MULTIPURPOSE FIELDS
 - OS10 MULTIPURPOSE TRAIL
 - OS11 SOCCER FIELD & TRACK
- PARKING**
 - R12 PARKING STRUCTURE C
 - R13 SURFACE LOT - VETERANS GATEWAY
 - R14 ROADWAY - PAC GARAGE
 - R15 ROADWAY - WEST DRIVE
 - R16 ROADWAY - VRC DRIVE
 - R17 ROADWAY - N/S CONNECTOR
 - R18 ROADWAY - CONNECTOR TO MARKET

FINE AND PERFORMING ARTS PRECINCT

A new complex for the Fine and Performing Arts precinct will add the facilities needed to provide comprehensive program offerings the College is planning for. This complex includes a performing arts complex for both campus and community use will hold large events and performances, as well as expanded instructional space, partnership space, a parking structure, and outdoor amphitheater.



Performing Arts Center

Size: 32,480 ASF; 54,000 GSF

Program: Theater, and Fine and Performing Arts Academic Space

Total Project Cost*: \$54.7M

A new performing arts center will house a 500-seat theater as well as instructional space, art gallery, and meeting/conferencing spaces.



Outdoor Amphitheater

Total Project Cost*: \$1.2M

An outdoor amphitheater will be built into the existing topography on the north side of the property adjacent to the Lake. Its proximity to the Performing Arts Center will lend itself to programmed outdoor performances, with the backdrop overlooking the Lake.





Parking Structure/Liner Building

Size: 28,350 ASF; 47,250 GSF

Program: Arts and Humanities Academic space, and/or Partnership space

Total Project Cost*: \$63.9M
 (\$89.3M with north liner building)

A new parking structure will support the Performing Arts Center and Art and Humanities cluster as the campus continues to grow its population and bring large events onto the campus. A third parking structure, approximately 900+ spaces has adjacent Liner Buildings that includes space for campus needs such as Arts and Humanities program space administrative and staff offices, meeting rooms, etc, along with the opportunity for partnerships space.

X

R12

R14



Arts and Humanities Expansion

Size: 58,830 ASF; 98,050 GSF

Program: Arts and Humanities Academic space, and/or Partnership space

Total Project Cost*: \$88.7M

EE

Y STEM
(PHASE 3)

Z

Size: 44,820ASF; 74,700 GSF

CC

Program: STEM Instructional Classrooms, Science Labs, Engineering Labs, Maker Space

Total Project Cost*: \$60.6M

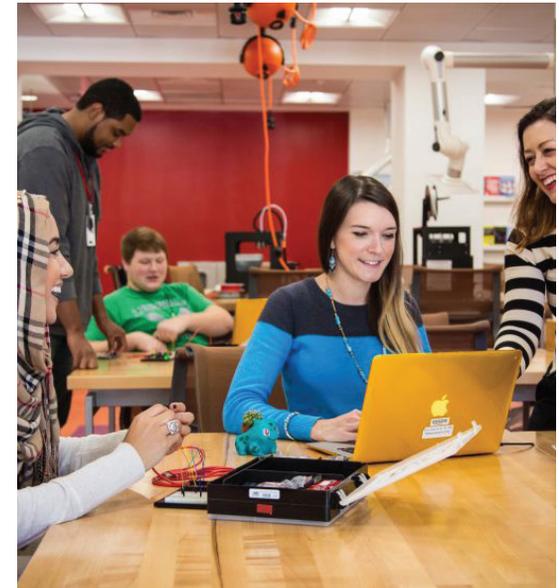
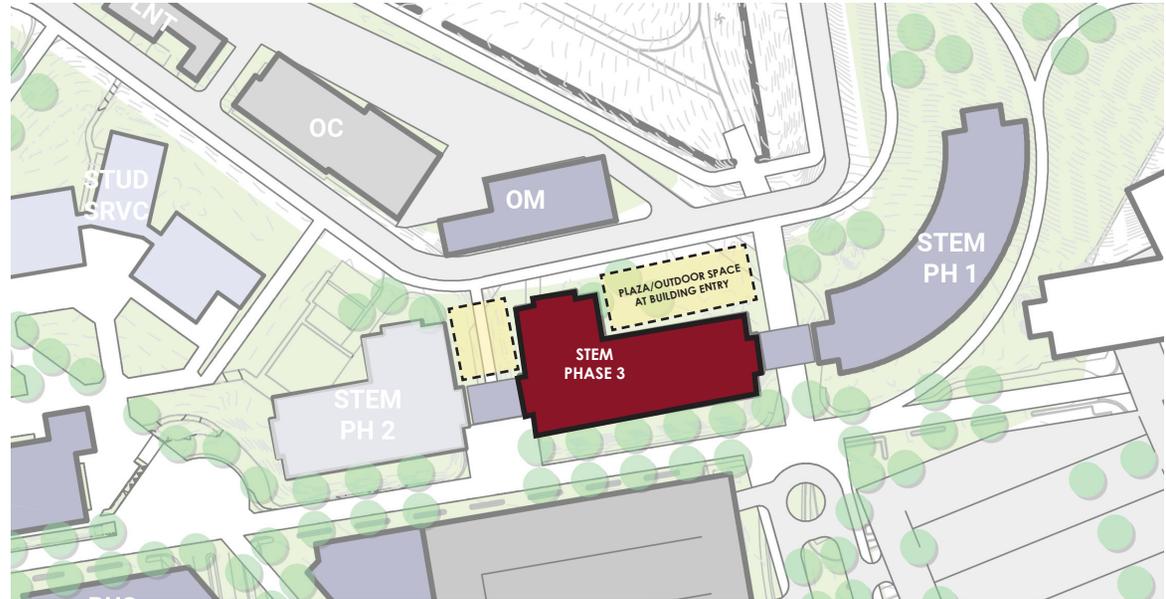
Project Description: The final STEM building will hold the remainder of relocated programs from CACT, along with space for the growth and expansion of science and engineering programs. Instructional spaces support active, technology rich teaching and learning through large classrooms, and flexible labs. Embedded student service and student collaboration spaces provide space for Guided Pathways Initiatives to be housed directly within the building.

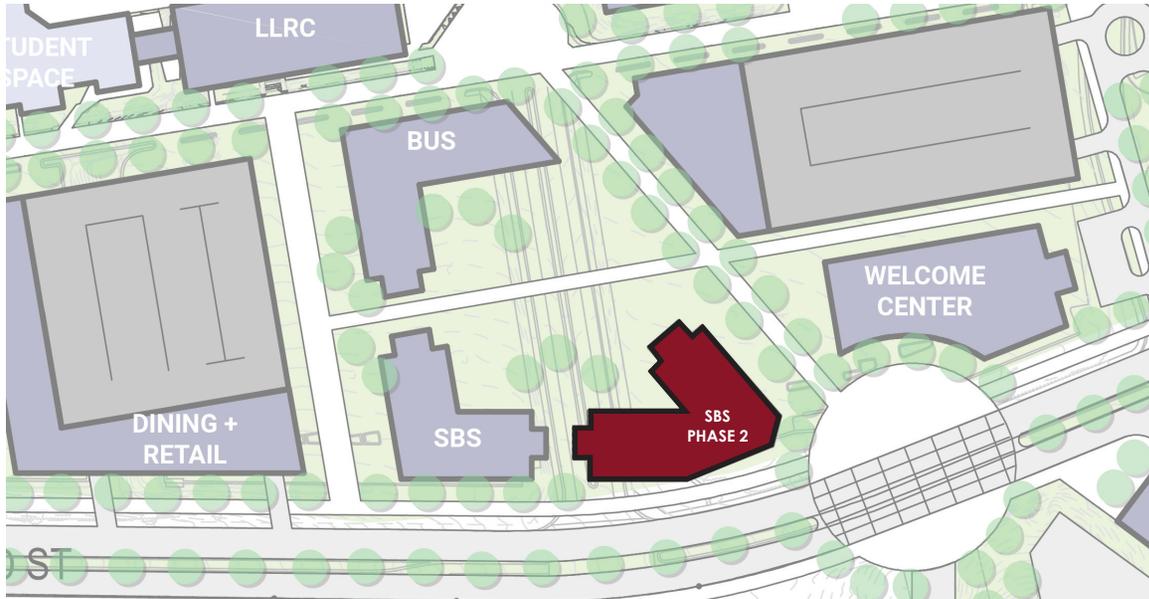
Open Space and Infrastructure:

This project includes the creation of open space and pedestrian seating areas at the entry of the building.

Related Projects:

- » Demo Academic Portable Village
- » Demo CACT





SOCIAL + BEHAVIORAL SCIENCES (PHASE 2)

Size: 18,720 ASF; 31,200 GSF

Program: Social Behavioral Sciences Academic Space and General Purpose Classrooms and Labs

Total Project Cost*: \$22.6M

Project Description: As the Social and Behavioral Sciences programs continue to grow, this building will house the specialty spaces required for those programs, as well as faculty members supporting the programs. In addition, the building will house general purpose classrooms and labs such as open use computer labs. Embedded student service and student collaboration spaces provide space for Guided Pathways Initiatives to be housed directly within the building.

Open Space and Infrastructure: n/a

Related Projects:

» n/a



BB KINESIOLOGY + TRACK (PHASE 2)

OS9

Size: 38,600 ASF, 64,350 GSF

OS11

Program: Kinesiology, Athletics, Community

R15

Recreation and Wellness

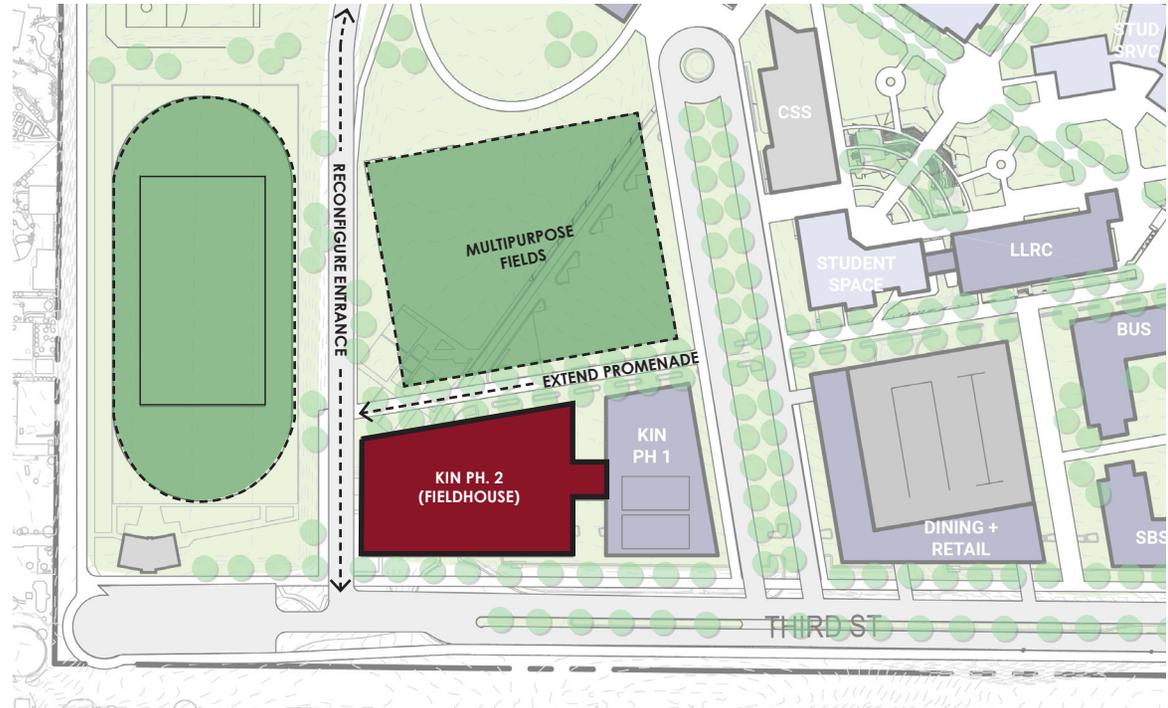
Total Project Cost*: \$51.7M

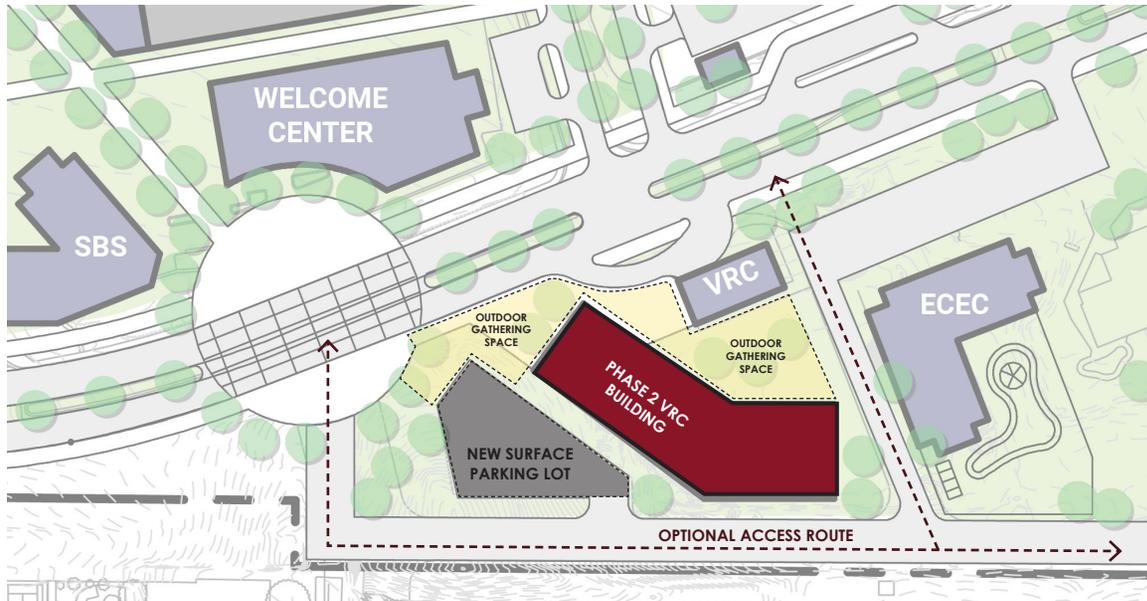
Project Description: With the College bringing on additional programs to become comprehensive, a new Fieldhouse building will provide space for campus programs such as physical education, athletics, as well as community recreation and wellness space such as fitness and weight training, gymnasiums, and indoor practice fields.

Open Space and Infrastructure: Part of the project will include a renovated competition sized soccer field with a surrounding track and bleachers for spectator viewing. Across the entry drive land will be leveled to accommodate two multi-purpose fields for academic, athletics, and recreation/community use. In addition, the final link of the E/W promenade completes the connection from JFK HS to the Athletics precinct.

Related Projects:

» n/a





**VETERANS RESOURCES CENTER
(PHASE 2)**

Size: 14,550 ASF, 24,250 GSF

Program: Student Services

Total Project Cost*: \$19.8M

FF

R13

R16

Project Description: The Veterans Resource Center will expand and enhance programs and services to both student veterans entering civilian life and veterans in the region.

Open Space and Infrastructure: In addition to the structure, this project includes a surface parking lot and an outdoor gathering space.

Related Projects:

» N/A





COMMUNITY + STUDENT CENTER

Size: 28,830 ASF; 41,380 GSF

Program: Student Focused Spaces

Total Project Cost*: \$32.8M

Project Description: As the College continues to grow, additional space for students will be critical for the success and experience of the students. This new structure will hold programs such as dining, space for clubs and organizations, meeting spaces, study and collaboration spaces, and office for student life staff. If funded sooner than phase 3, this project can be completed after the construction of the STEM Phase 1 and the demolition of the CACT building.

Open Space and Infrastructure: As part of this project, a new open lawn / park space is a space for students, campus users, and the community to come together in a peaceful environment. In addition, new multi-use trails for pedestrians and equestrians wind through the campus and provide to beautiful views of the surrounding mountains, Lake Norconian, and the newly development agricultural fields. The design of this space should align with the Campus Experience Guidelines listed at the end of this chapter.

Related Projects:

- » Demo CACT building and storage



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FACILITIES MASTER PLAN PROJECTS - BUILDINGS

Ph.	Project	Project Indicator	Project Name	Program	ASF	Eff %	Stories	Footprint	GSF	Cost Per Unit	Construction Cost	Soft Cost %	Total Project Cost	Escalated Cost
BUILDINGS DEMOLITIONS														
1	9	J	DEMO CRC	-	(2,067)	-	-	-	(2,785)	\$60.00	\$167,100	-	\$167,100	\$200,520.00
1	9	J	DEMO SSB	-	(9,276)	-	-	-	(14,357)	\$60.00	\$861,420	-	\$861,420	\$1,033,704.00
1	9	M	DEMO Bookstore	-	(3,099)	-	-	-	(3,600)	\$60.00	\$216,000	-	\$216,000	\$259,200.00
1	9	M	DEMO Portables A&B	-	(1,699)	-	-	-	(1,920)	\$60.00	\$115,200	-	\$115,200	\$138,240.00
2	12	P	DEMO STEM 100 + 200 + 300	-	(10,061)	-	-	-	(13,035)	\$60.00	\$782,100	-	\$782,100	\$1,016,730.00
2	16	U	DEMO M1 + M2	-	(1,620)	-	-	-	(2,229)	\$60.00	\$133,740	-	\$133,740	\$173,862.00
2	15	V	DEMO West End Quad	-	(9,793)	-	-	-	(11,063)	\$60.00	\$663,780	-	\$663,780	\$862,914.00
3	20	CC	DEMO CACT	-	(4,561)	-	-	-	(5,020)	\$60.00	\$301,200	-	\$301,200	\$421,680.00
3	20	Y	DEMO Academic Village	-	(23,000)	-	-	-	(23,000)	\$60.00	\$1,380,000	-	1,380,000	\$1,932,000.00

Ph.	Project	Project Indicator	Project Name	Program	ASF	Eff %	Stories	Footprint	GSF	Cost Per Unit	Construction Cost	Soft Cost %	Total Project Cost	Escalated Cost
BUILDING RECONSTRUCTIONS														
1	5	E	ATEC/IT > Arts & Humanities	-	43,147	67%	-	-	64,881	\$250.00	\$16,220,250	20%	\$19,464,300	\$23,357,160.00
1	9	N	S+T/HUM > Student Services	-	21,653	74%	-	-	29,084	\$250.00	\$7,271,000	20%	\$8,725,200	\$10,470,240.00
1	11	L	Library > Student Center	-	19,559	64%	-	-	30,740	\$250.00	\$7,685,000	20%	\$9,222,000	\$11,066,400.00

Ph.	Project	Project Indicator	Project Name	Program	ASF	Eff %	Stories	Footprint	GSF	Cost Per Unit	Construction Cost	Soft Cost %	Total Project Cost	Escalated Cost
NEW CONSTRUCTION (GENERATING NEED)														
1	1	A	VRC (Ph 1)	STUDENT SERVICES	2,527	60%	1	4,214	4,214	\$620.00	\$2,612,680	20%	\$3,135,216	\$3,762,259.20
1	2	B	Academic Village	GEN. ACADEMIC	23,000	-	1	23,000	23,000	\$355.00	\$8,165,000	20%	\$9,798,000	\$11,757,600.00
1	3	D	Early Childhood Center	STUDENT SERVICES	10,161	60%	1	16,936	16,936	\$435.00	\$34,582,500	20%	\$41,499,000	\$49,798,800.00
1	4	C	STEM (Ph 1)	STEM	47,700	60%	3	26,500	79,500	\$405.00	\$6,859,080	20%	\$8,230,896	\$9,877,075.20
1	6	F	Kinesiology (Ph 1)	STEM	38,711	60%	2	32,000	64,000	\$405.00	\$25,920,000	20%	\$31,104,000	\$37,324,800.00
1	7	G	Softball Support Building	ATHLETICS	1,800	60%	1	3,000	3,000	\$405.00	\$1,215,000	28%	\$1,549,125	\$1,858,950.00
1	8	H	Welcome Center	STUDENT SERVICES	30,000	60%	2	25,000	50,000	\$405.00	\$20,250,000	20%	\$24,300,000	\$29,160,000.00
1	9	K	Liner Building (A)	STUDENT SERVICES	7,800	60%	1	13,000	13,000	\$455.00	\$34,125,000	20%	\$40,950,000	\$49,140,000.00
1	10	I	LLRC Expansion	LLRC	45,000	60%	3	25,000	75,000	\$405.00	\$5,265,000	20%	\$6,318,000	\$7,581,600.00
2	12	O	STEM (Ph 2)	STEM	37,440	60%	3	20,800	62,400	\$435.00	\$27,144,000	28%	\$34,744,320	\$45,167,616.00
2	13	Q	Social + Beh. Sciences (Ph 1)	SCIENCES	22,920	60%	2	19,100	38,200	\$405.00	\$15,471,000	28%	\$19,802,880	\$25,743,744.00
2	14	R	Business Building	BUSINESS	24,840	60%	2	20,700	41,400	\$405.00	\$16,767,000	28%	\$21,461,760	\$27,900,288.00
2	16	T	Operations + Maintenance	OM	9,349	64%	2.5	5,800	14,500	\$305.00	\$4,422,500	28%	\$5,660,800	\$7,359,040.00
3	18	X	Liner Building (C)	ARTS + HUMANITIES	28,350	60%	3.5	13,500	47,250	\$405.00	\$19,136,250	28%	\$24,494,400	\$34,292,160.00
3	20	Z	STEM (Ph 3)	STEM	44,820	60%	3	24,900	74,700	\$435.00	\$32,494,500	28%	\$41,592,960	\$58,230,144.00

Ph.	Project	Project Indicator	Project Name	Program	ASF	Eff %	Stories	Footprint	GSF	Cost Per Unit	Construction Cost	Soft Cost %	Total Project Cost	Escalated Cost
NEW CONSTRUCTION (PARTNERSHIP/COMMUNITY)														
1	10	I	Liner Building (A)	PARTNERSHIP	23,400	60%	3	13,000	39,000	\$400.00	\$15,600,000	28%	\$19,890,000	\$23,868,000.00
2	15	S	Liner Building (B)	PARTNERSHIP	32,400	60%	4	13,500	54,000	\$405.00	\$21,870,000	28%	\$27,993,600	\$36,391,680.00
3	17	W	Performing Arts Center	ARTS + HUMANITIES	32,482	60%	1.5	36,000	54,000	\$565.00	\$30,510,000	28%	\$39,052,800	\$54,673,920.00
3	18	X	Liner Building (C)	PARTNERSHIP	21,000	60%	1	35,000	35,000	\$405.00	\$14,175,000	28%	\$18,144,000	\$25,401,600.00
3	19	EE	Generic Arts and Humanities	PARTNERSHIP	58,831	60%	3	32,684	98,052	\$505.00	\$49,516,260	28%	\$63,380,813	\$88,733,137.92
3	21	AA	Social + Beh Sciences 2	ACADEMIC	18,720	60%	2	15,600	31,200	\$405.00	\$12,636,000	28%	\$16,174,080	\$22,643,712.00
3	22	BB	Kinesiology Ph 2	PARTNERSHIP	38,608	60%	1	64,348	64,348	\$405.00	\$26,060,940	28%	\$33,358,003	\$46,701,204.48
3	23	FF	Veterans Gateway Phase 2	PARTNERSHIP	14,552	60%	1	24,254	24,254	\$405.00	\$9,822,870	28%	\$12,573,274	\$17,602,583.04
3	24	DD	New Student Center	PARTNERSHIP	24,828	60%	2	20,690	41,380	\$405.00	\$16,758,900	28%	\$21,451,392	\$30,031,948.80

FACILITIES MASTER PLAN PROJECTS, PARKING/ROADS

Ph.	Project	Project Indicator	Project Name	Stories	Stalls	SF	Cost Per Unit	Construction Cost	Soft Cost %	Total Project Cost	Escalated Cost
PARKING											
1	10	R1	Parking Structure A	5	840	-	\$19,000/STALL	\$15,960,000	20%	\$19,152,000	\$22,982,400.00
1	4	R2	Surface Lot - ECEC	-	60	19,250	\$45/SF	\$866,250	20%	\$1,039,500	\$1,247,400.00
1	7	R3	Surface Lot - Softball	-	155	54,250	\$45/SF	\$2,441,250	20%	\$2,929,500	\$3,515,400.00
2	15	R10	Parking Structure B	5	835	-	\$19,000/STALL	\$15,770,000	20%	\$18,924,000	\$24,601,200.00
3	18	R12	Parking Structure C	5	920	-	\$19,000/STALL	\$17,480,000	20%	\$20,976,000	\$29,366,400.00
3	16	R11	Surface Lot Arts & Hum.	-	83	29,050	\$45/SF	\$1,307,250	20%	\$1,568,700	\$2,039,310.00
3	23	R13	Surface Lot - VRC	-	47	16,450	\$45/SF	\$740,250	20%	\$888,300	\$1,243,620.00

Ph.	Project	Project Indicator	Project Name	LINEAR FEET	Cost Per Unit	Construction Cost	Soft Cost %	Total Project Cost	Escalated Cost
ROADWAYS									
1	26	R4	Roadway 1 - EAst CONNECTOR	1,980	\$300.00	\$594,000	20%	\$712,800	\$926,640.00
1	7	R5	Roadway 2 - NORTH CONNECTOR	798	\$300.00	\$239,400	20%	\$287,280	\$344,736.00
1	7	R6	Roadway 3 - WEST CONNECTOR	630	\$300.00	\$189,000	20%	\$226,800	\$272,160.00
1	26	R7	Roadway 9 - CONNECTOR TO LAMPTON	520	\$300.00	\$156,000	20%	\$187,200	\$243,360.00
1	10	R8	Roadway 10 - DROP OFF 1	840	\$300.00	\$252,000	20%	\$302,400	\$362,880.00
1	6	R9	Roadway 11 - DROP OFF 2	720	\$300.00	\$216,000	20%	\$259,200	\$311,040.00
3	18	R14	Roadway 4 - PAC GARAGE	415	\$300.00	\$124,500	20%	\$149,400	\$209,160.00
3	22	R15	Roadway 5 - WEST DRIVE	1,396	\$300.00	\$418,800	20%	\$502,560	\$703,584.00
3	23	R16	Roadway 6 - VRC DRIVE	1,835	\$300.00	\$550,500	20%	\$660,600	\$924,840.00
3	25	R17	Roadway 7 - N/S CONNECTOR	2,310	\$300.00	\$693,000	20%	\$831,600	\$1,164,240.00
3	25	R18	Roadway 8 - CONNECTOR TO MARKET	550	\$300.00	\$165,000	20%	\$198,000	\$277,200.00

FACILITIES MASTER PLAN PROJECTS - OPEN SPACE

Ph.	Project	Project Indicator	Project Name	SF	Cost Per Unit	Construction Cost	Soft Cost %	Total Project Cost	Escalated Cost
OPEN SPACE									
1	5	OS1 (ph 1)	Promenade (NS)	815	\$25.00	\$20,375	20%	\$24,450	\$29,340.00
1	7	OS3	Softball Fields	73,400	\$12.00	\$880,800	20%	\$1,056,960	\$1,268,352.00
1	8	OS1 (ph 2)	Promenade (NS)	815	\$25.00	\$20,375	20%	\$24,450	\$29,340.00
1	9	OS2	Campus Amphitheater & Plaza	35,000	\$25.00	\$875,000	20%	\$1,050,000	\$1,260,000.00
2	12	OS4	Agriculture Land	500,000	\$4.00	\$2,000,000	20%	\$2,400,000	\$3,120,000.00
2	13	OS5	Campus Quad	64,000	\$10.00	\$640,000	20%	\$768,000	\$998,400.00
2	12	OS6 (ph 1)	Promenade (EW)	1,150	\$25.00	\$28,750	20%	\$34,500	\$44,850.00
2	14	OS6 (ph 2)	Promenade (EW)	1,150	\$25.00	\$28,750	20%	\$34,500	\$44,850.00
3	17	OS8	Outdoor Amphitheater	45,000	\$15.00	\$675,000	20%	\$810,000	\$1,134,000.00
3	22	OS11	Soccer Field and Track	180,000	\$10.00	\$1,800,000	20%	\$2,160,000	\$3,024,000.00
3	22	OS9	Multipurpose Fields	150,000	\$5.00	\$750,000	20%	\$900,000	\$1,260,000.00
3	24	OS10	Multipurpose Trail (10' wide)	8,200	\$45.00	\$369,000	20%	\$442,800	\$619,920.00
3	24	OS7	Park Space	215,000	\$6.00	\$1,290,000	20%	\$1,548,000	\$2,167,200.00

FACILITIES MASTER PLAN PROJECTS - INFRASTRUCTURE

Ph.	Project	Project Indicator	Project Name	Construction Cost	Soft Cost %	Total Project Cost	Escalated Cost
INFRASTRUCTURE							
1	29	ELEC - 1	Generators (1MW)	\$2,000,000	20%	\$2,400,000	\$2,400,000
1	29	ELEC - 1	Demo existing SCE 12KV distribution feeders	\$87,500	20%	\$105,000	\$126,000
1	29	ELEC - 1	Add Main MeterBoard	\$100,000	20%	\$120,000	\$144,000
1	29	ELEC - 1	Add Selector Switches	\$200,000	20%	\$240,000	\$288,000
1	29	ELEC - 1	Add 12KV to 480V transformers	\$210,000	20%	\$252,000	\$302,400
1	29	ELEC - 1	Add MVC 12 KV Feeder Loop	\$1,100,000	20%	\$1,320,000	\$1,584,000
1	30	ELEC - 2	Phase 01 Electrical Upgrades	\$370,000	20%	\$444,000	\$532,800
2	31	ELEC - 3	Phase 02 Electrical Upgrades	\$245,000	20%	\$294,000	\$382,200
3	32	ELEC - 4	Phase 03 Electrical Upgrades	\$490,000	20%	\$588,000	\$823,200.00
1	27	HCW-1	Demolish Existing Plant F1 Equipment	\$320,000	45%	\$464,000	\$556,800
2	28	HCW-10	Demolish F1 Pumps	\$25,000	45%	\$36,250	\$47,125
2	28	HCW-11	New Plant F2 Infrastructure	\$1,443,750	45%	\$2,093,438	\$2,721,469
1	27	HCW-2	Demolish Underground Piping	\$250,000	45%	\$362,500	\$435,000
1	27	HCW-3	New Underground Piping Loop	\$2,100,000	45%	\$3,045,000	\$3,654,000
1	27	HCW-4	New Plant F1 Infrastructure	\$3,675,000	45%	\$5,328,750	\$6,394,500
2	28	HCW-9	Demolish Existing Plant F2 Equipment	\$225,000	45%	\$326,250	\$424,125

CAMPUS EXPERIENCE GUIDELINES

The campus experience guidelines provide standards and direction for future development on the campuses. The guidelines are determined by the necessity to conform to the principles established by the approved Master Plan. The over-arching factor for their inclusion is to safeguard the framework of the campus plans by providing a coherent approach to the physical plan including access, circulation and open space. Specific criteria are designed for flexibility, allowing a range of creative solutions to be applied for each proposed project. Each project site is defined by:

PROJECT SITE BOUNDARY

A project site boundary includes the building site as well as its associated open spaces and circulation requirements as defined by this document. In the project descriptions, these are outlined and should be implemented as a single project whenever possible.

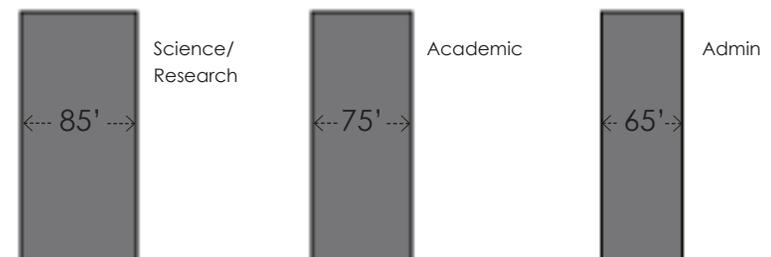
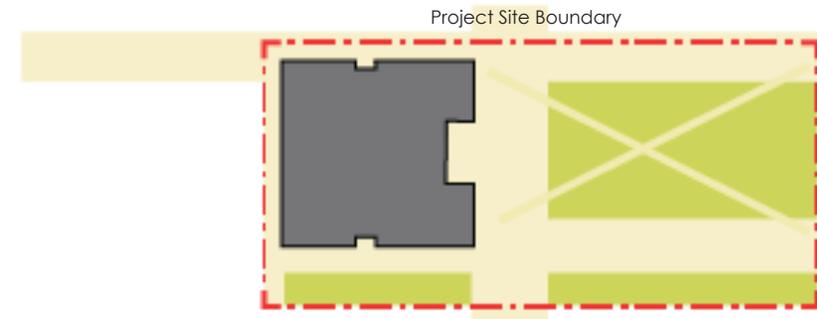
BUILDING MASSING

The massing of the building will align the pedagogical or functional needs of the program/use while relating to both the campus context and immediate context by utilizing appropriate forms, heights and proportions. Typical building footprint modules were used to form the site plans. New buildings should be planned to similar modules:

Academic Buildings - 75' - 80'

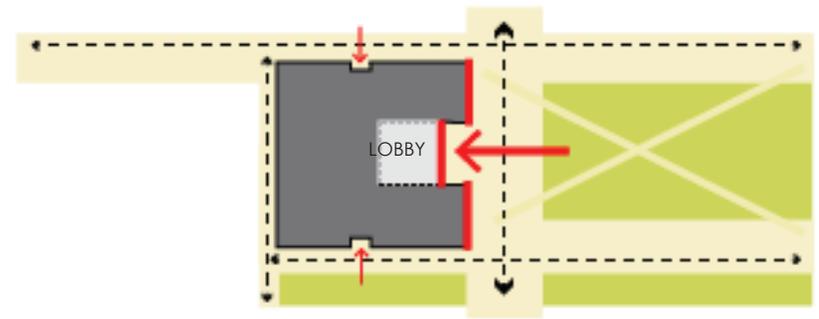
Science/Research Buildings: Approx. 85'

Administrative Buildings - 65 - 75'



BUILDING SITING, ORIENTATION, AND ENTRY

Siting and orientation of buildings should strengthen the definition of the adjacent open space, with particular emphasis given to the relationship to maintaining and creating intuitive pedestrian pathways. The building orientation influences the character, perception, and activity of the campus. The main entry should connect interior public spaces, such as an atrium or lobby or exterior public spaces such as a major plaza, street or pedestrian-oriented corridor. The main entry point to buildings should be clearly defined, accessible to all. Additional entries will align with secondary opens spaces and pathways as necessary.



MAXIMUM BUILDING HEIGHT

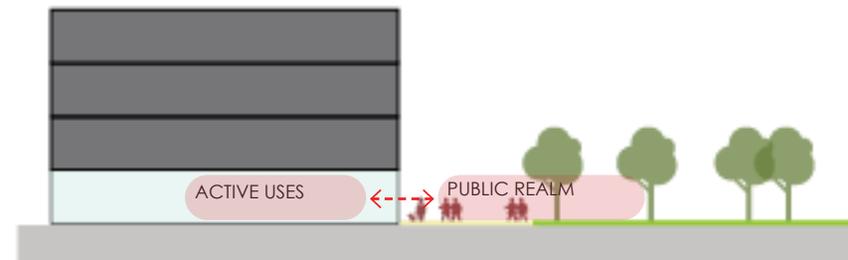
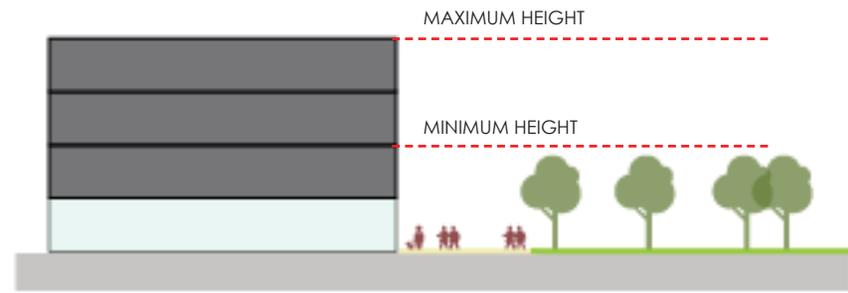
The Maximum Building Height is defined by the maximum building stories. In the 2030 campus development plan, there are no buildings over four stories. To maintain the highest and best use of the land, no new building should be one-story - the exception is the Maintenance and Operations building,

ACTIVE USE

How a building engages the pedestrian is a critical piece of an activated public realm. Buildings, as much as possible, should orient active uses toward major pedestrian-oriented corridors and plazas, specifically on the ground floor. Fenestration defines the amount of windows, doors, or transparency on a building's facade. Minimum target fenestrations for new buildings fronting public spaces should be 60% at the ground level along major pedestrian-oriented corridors and plazas in order to provide a level of permeability between the inside and outside space.

SERVICE AREA

Service and mechanical screening should be integrated into the building design. If it is not possible to incorporate the screening into the building, service and mechanical spaces shall be screened with built enclosures, softscape, or fencing, such as a louvered metal fence system. Screening should keep service areas out of sight, while providing proper ventilation for the equipment.



SITE DESIGN GUIDELINES

Providing development guidelines for outdoor spaces is essential to creating the look and feel for the Norco College Campus. A unified appearance can be attained by following the general guidelines which include the following:

- » Promenade
- » Quad & Open Lawn
- » Outdoor Gathering Space
- » Outdoor Learning Space
- » Enhanced Pedestrian Crossing
- » Multi-Use Trails
- » Planting Aesthetics
- » Site Furnishings / Way-finding / Signage

PROMENADE

The promenade is the main connector throughout the entire site. Pedestrian corridors provide a beautiful, safe, and enjoyable entrance into campus and throughout the college. The promenade serves to enhance way-finding as each guided pathway cluster is located adjacent to the corridor. Decorative pavement is designed along the wide pathway, along with integrated seating areas. Pedestrian lighting establishes a safe experience, while unique planting design creates a welcoming feeling. The promenade must be kept clear of all vehicular traffic unless an emergency situation.





Example: Quad

QUAD / OPEN GREEN

Quads and green spaces are an important feature in the campus setting. Campus quads are generally large, formal expanses of green lawn and landscape plantings surrounded by buildings on three to four sides. Quads can provide a unique campus identity to the College. Open green lawns are more flexible and can be of large or small space. These areas provide students an space for reading, gathering, or light recreational use. They can also function as great locations for events such as graduation, performances, and festivals. Maintaining the lawn is essential for a successful quad space to encourage use. Large over-story trees provide a great shade canopy and create a 'room' feeling. Additional plantings should be kept to a minimum.

OUTDOOR GATHERING SPACE

Outdoor gathering spaces are areas where students, faculty, or the community can socialize whether in large or small groups. These spaces should be located outside frequented campus buildings, such as the Student Center and LLRC. Various types of flexible seating are essential for a successful gathering node, refer to site furnishings for recommendations. Seating areas must be flexible and accommodate various size groups. Over-story trees should be included to provide shade in addition to ornamental flowering trees for aesthetic interest. Additional low-height grasses and perennials are used to enhance visual interest throughout the year.

LEARNING SPACE

Flexible learning spaces are important to the campus setting to provide a different learning atmosphere for all students. Natural elements, materials, and landscaping all enhance the experience of learning outdoors. Learning spaces are to be strategically placed on campus adjacent to academic building with classrooms or labs. Typically, they're located adjacent to corridors or quads, but should not be adjacent to loud gathering spaces.

Spaces should be flexible in nature and designed with work areas and seating to accommodate small groups or a full size class. Seating can either be movable tables/chairs or large permanent features with ample space. Large over-story trees can provide shade, while creating a "room" feeling. Surrounding the learning space with medium-height plants creates an enclosed feeling, but views should be kept open to surrounding walkways for safety.





Example: Enhanced Pedestrian Crossing

ENHANCED PEDESTRIAN CROSSING

The master plan proposes an enhanced pedestrian crossing along Third Street, connecting the main campus to the Veterans Resource Center along the promenade. The design of the pedestrian crossing should be studied and determined during the design process of the Promenade and the Welcome Center building. Numerous traffic calming measures are available for the designer to consider to provide a safer crossing atmosphere. Examples include the following: curb bump-outs, elevated driveway surface (to match walkway elevation), narrow street lanes, bollards and planters, different pavement material/color/texture, unique graphics, elevated signage over the street, flashing pedestrian crossing signals, pedestrian-scale light fixtures, and pedestrian refuge islands.



Example: Multi-Use Trail

MULTI-USE TRAIL

An important element for connecting the Norco College to the surrounding community is the multi-purpose trail. The equestrian culture in Norco is important to embrace and integrate throughout the campus. Design details and alignment of the trail should be considered in each project added in the master plan. The trail should connect to the existing trail system at strategic locations to promote use throughout the campus. The material of the trail should be coordinated with local equestrian experts, but consider using a looser surface such as decomposed granite or compacted gravel. The material of the trail must also support other activities such as walking, running, and biking. Width of the trail should be kept consistent throughout, ranging from 8' - 15' wide.

LANDSCAPE AESTHETICS

This section provides guidelines on landscape aesthetics; however, all current local and state law requirements must be followed and take precedent. Norco College should develop a Landscape Master Plan for the entire campus to follow, including a comprehensive planting palette. The planting palette throughout campus should be simple, uniform, and connecting to all campus spaces. A cohesive and similar aesthetic is to be maintained throughout the entire campus. As the surrounding landscape faces environmental challenges, native low-maintenance plants should be used to the fullest extent. All plant materials used should have a proven good record of survivability, low-water requirements, and no fire risk. Plantings in decomposed granite / gravel material should be kept to back-of-house locations, while plantings in mulch and turf should be located in more prominent locations on campus.

Incorporating innovative design for storm water management is essential for a healthy, maintainable campus plan. Numerous storm-water management designs are available, and they should be designed by a Civil Engineer with a Landscape Architect to maximize function and aesthetic effectiveness. These practices should be considered for each new building/project implemented on campus. A comprehensive storm water analysis and study is recommended for the campus to show the existing drainage system, storm-water collection opportunities, and proposed calculations for Best Management Practices.





STORMWATER

While no stormwater management system can operate indefinitely without maintenance, the LID strategies identified below require less maintenance than stormwater management practices to support turf grass. Incorporating innovative design for stormwater management is essential for a healthy, maintainable campus plan. Numerous stormwater management designs are feasible. The College should work with a Civil Engineer and Landscape Architect to maximize function and aesthetic effectiveness of current and future stormwater management practices. These practices should be considered for each new building/project implemented on campus. A comprehensive stormwater analysis and study is recommended for the campus to show the existing drainage system, stormwater collection opportunities, and proposed calculations for Best Management Practices.



Bioswales and Rain Gardens: These features can be designed to include water storage substrates and native, deep-rooted vegetation. Strategically placing these stormwater management features could help the College remediate polluted water before it makes its way into underground infrastructure and add aesthetic value to the campus's overall landscape vision. The native planting these features use would also create habitat for birds, butterflies, and insects. Bioswales and rain gardens could be successfully used in medians, parking lot edges, and buffers between sidewalks and vehicle traffic. When supported by signage, bioswales and rain gardens offer great public education opportunities.

Permeable Paving: While traditional hardscape materials do not allow water to infiltrate the soil, permeable paving allows stormwater to percolate and infiltrate the ground surface. The goal of permeable paving is to control and

mitigate stormwater at the source, reducing runoff and improving water quality in substrata layers. Permeable paving requires regular maintenance which needs to be detailed in the project specifications as suggested by the system manufacturer. There are many paved areas on campus that would be excellent locations to implement permeable paving including parking lots, service roads, and pedestrian and bicycle paths through campus.

Consider Tree Wells or Trenches: Tree wells and trenches use trees planted in amended soils and rocks to capture runoff from surrounding hard surfaces and store it underground. These features can be single (tree wells) or interconnected (tree trenches) and may have grates over the top to allow pedestrians to walk up to the trees or be open earth when protected from foot traffic by seat walls or other barriers.

Consider Rainwater Harvesting: Rainwater harvesting is the collection and redistribution of rainwater for reuse on-site through the use of cisterns. Cisterns can be above or below grade and have been used effectively on many campuses. By capturing rainwater from roofs before it crosses the ground, rainwater is kept cleaner and thus is appropriate for reuse in irrigation. This alternative water supply can be particularly important during times of drought when mandatory water restrictions may be in place. Reducing the demand for potable water on campus decreases expense and minimizes the strain communities experience when potable water supplies are overused.

Consider Vegetated or Green Roofs: Green roofs manage the urban heat island effect, retain stormwater, provide habitat for insects and birds, add aesthetic value, lengthen the life of roofing materials, and add insulation to decrease heating and cooling costs. These systems can be extensive or intensive depending on the amount of growing medium required to support plant life year round.





Example: Site Furnishings Family

SITE FURNISHINGS & WAYFINDING & SIGNAGE

An important component of creating a unique campus feeling is a complimentary family of site furnishings, along with wayfinding and signage. These elements strategically located throughout the campus will create a higher quality experience for both students and visitors, as it will compliment the look and feel of the Norco College campus experience. Having a consistent appearance is important, as it does not lead to confusion or appear as visual clutter. The style and design should be timeless and match the surrounding architecture, along with being low-maintenance.

Norco College must develop a standard of site furnishings family to include but not limited to the following items:

- » Fixed Tables & Chairs
- » Flexible Tables & Chairs
- » Benches
- » Bike Racks
- » Litter & Recycling Receptacles
- » Security Bollards
- » Light Bollards
- » Pedestrian Light Poles
- » Planters
- » Umbrellas



Example: Site Furnishings Family

Both fixed and flexible seating options should be included based on location and type of use. Picnic style tables are recommended to encourage socialization, in lieu of round style tables. Tables with minimal holes for drainage are acceptable, with a flat surface to inspire students to study on the outdoor furniture. Benches can be traditional or a more flexible, uncommon shape to promote socialization.

Strategically located bike racks on campus can help promote the sustainable practice of biking to school. Separate litter and recycling receptacles will also encourage sustainable practices.

To help students and visitors navigate the campus while both in a vehicle or as a pedestrian, various types of signs are needed throughout campus which include the following types. Norco College must also develop a standard of signage elements along with a Signage Location Diagram.

- » Monument Signage
- » Vehicular Way-finding
- » Pedestrian Way-finding
- » Building Sign
- » Information Kiosk
- » Banners

Monument Signage is to be located at major vehicle entrances into campus, including at Third Street and Hamner Road. As additional vehicular entrances are constructed on campus, monument signage should also be added.

Vehicular way-finding signage is to be located along primary vehicular roads leading students or visitors to the appropriate location on campus such as drop-off drives, parking garages, or main buildings. Lettering on the sign must be legible while driving in a vehicle.

Pedestrian way-finding signage is located upon immediately entering the site as a pedestrian, and at major pedestrian crosswalks. The signs should listed between three to six different buildings or major outdoor spaces.

Building signs are to be located at major entrances to each building. Signs will clearly state the building's name along with the building services.

Information Kiosks are viewed from a pedestrian standpoint and located at major pedestrian entrances. They will include a full campus map on an interactive screen.

Banners are located on light poles along major roads into campus. Signage on banners can highly various events or news for the College.



BUILDING NAMES

Norco College has used a variety of methods to name buildings on the campus, many of which use various acronyms. Building names should have a consistent naming method, where buildings are named for their use or named after a donor or well-known individual or place. Building names should be clear and concise, using few words. The list of proposed building names is provided to the right.

The naming effort will require additional discussions. A Building Naming Committee is recommended to assist with the naming effort for existing and new buildings as they come on-line to make recommendations to the College and governing Board for approval.

- A** VETERANS RESOURCE CENTER
- B** EARLY CHILDHOOD EDUCATION CENTER
- C** VETERANS GATEWAY
- D** WELCOME CENTER
- E** DONOR OPPORTUNITY
- F** SOCIAL + BEHAVIORAL SCIENCES I
- G** BUSINESS
- H** SOCIAL + BEHAVIORAL SCIENCES II
- I** DONOR OPPORTUNITY
- J** KINESIOLOGY BUILDING
- K** RECREATION CENTER
- L** LIBRARY LEARNING RESOURCE CENTER
- M** STUDENT CENTER
- N** BRENDA + WILIAM DAVIS CENTER FOR STUDENT SUCCESS
- O** STEM I
- P** STEM II
- Q** STEM III
- R** MAINTENANCE
- S** OPERATIONS CENTER
- T** FACILITIES
- U** STUDENT SERVICES
- V** ARTS + HUMANITIES I
- W** ARTS + HUMANITIES II
- X** STUDENT CENTER
- Y** CENTRAL PLANT
- Z** SOFTBALL SUPPORT
- AA** FACILITIES + OPERATIONS
- BB** ARTS + HUMANITIES III
- CC** DONOR OPPORTUNITY
- DD** PERFORMING ARTS CENTER
- EE** ARTS + HUMANITIES IV



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