MEETING NOTES

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Architecture Planning Interiors Management

PROJECT

Facilities Master Plan Update College of the Redwoods, Redwoods CCD 7351 Tompkins Hill Road Eureka, CA 95501

tBP Project No. 22085.00 Stakeholder Workshop Date: April 26, 2022

Present

Evelyn Giddings, RCCD Trustee, Humboldt Botanical Garden Board President

Dr Keith Flamer, College President

Bert Hafar, Woodworking

Bob Brown, Director Athletics, Kinesiology, Health and PE

Brittany Alvarez, ASCR Student Senator

Chris Gaines, Business Professor/VP Academic Senate

Dr Crystal Morse, AVP Student Success

Erick Kramer, Physics Professor

Erik Sorensen, IT Manager

Jack Hill, ASCR President

Johanna Helzer, Administrative Office Coordinator

Julia Morrison, VP Administrative Services

Karen Reiss, Biology Professor

Kerry Mayer, VP Instruction

Kevin Carter, Director of Facilities and Maintenance

Maria Morrow, Biology Professor

Mark Bernards. Network Administrator

Marty Coehlo, Executive Director of Foundation

Michelle Haggerty, Psychology Professor

Mike Haley, Math Professor

Rory Johnson, Dean. Klamath-Trinity Instructional Site

Silas Sarvinski, Farm Manager

Tino Romero, Athletics Programs Coordinator

Valerie Elder, Forestry And Natural Resources Professor

Philip Newsom, tBP/Architecture

Amy Jane Frater, tBP/Architecture

Gary Moon, tBP/Architecture

PURPOSE

The purpose of today's event is to discuss project information and evaluate options for future facilities development.

- College of the Redwoods is working on the update of its Facilities Master Plan (FMP). The Facilities Planning Committee is the advisory body for the project.
- Today, the group will review and discuss the project work so far. Your input will be used to develop the recommendation for the FMP. Invitations have been extended to representatives of CR students, faculty, staff, administrators, trustees and key community partners.

WELCOME BY DR. FLAMER

- Thank you for your participation today.
- The Facilities Master Plan will guide budgetary decisions and the course of our physical buildout for the next 10 years. It is an important and living document, not something to sit on the shelf.
- The FMP is founded upon and follows the Educational Master Plan, which was recently completed.
- The FMP is part of the required documentation for accreditation, holding the College accountable for meeting accreditation standards for facilities and resource planning.
- The final FMP document will go to the Board for approval in Fall 2022.

The group reviewed a powerpoint presentation prepared by the FMP team (attached).

WHAT IS THE FACILITIES MASTER PLAN?

- CR's facilities exist to serve the College's educational vision. That vision is articulated in the 2022-2032 Educational Master Plan.
- The FMP is a high-level policy document for facilities development. Like a roadmap, it includes a starting point (current facilities and needs) and a destination (description in words and picture of the future learning environment. It is not a detailed design document.
- The FMP is used for decisions about facilities funding and the steps the College will follow for future facilities development.
- The CR Facilities Master Plan will include principles for facilities development at all of its locations. There is an emphasis on the Eureka and Del Norte campuses because the properties are owned by the College and there are more needs for master planning.

BACKGROUND

Process & Timeline

The group reviewed the process & timeline graphic.

- The process has 3 steps: Learning Environment, Big Picture, Recommendations.
- The project is at the halfway point. This is a good time to bring the project to stakeholders. The FPC needs your input before they work on recommendations.

2022-32 CR Educational Master Plan Initiatives

- The group reviewed the six EMP Initiatives.
- To summarize, the EMP is a forward-looking document. Times are changing in the educational landscape; the College is open to opportunities to grow and meet new needs. Some opportunities are known, such as Cal Poly Humboldt and increasing online learning. The College is preparing for the changes it can foresee, and is positioning itself to take advantages of new opportunities that will inevitable arise.
- The EMP sets the foundation for the Facilities Master Plan to prepare for flexible and nimble facilities development.

Planning Context

Two major trends frame the context for facilities planning, both of which were greatly influenced by the recent pandemic:

- Total District headcount enrollment declined 30% from 2017-18 to 2020-21. The College's campuses are now re-opened, and enrollment is building.
- Total District online FTES (Full Time Equivalent Students) increased from 13% to 37% in the same period. The College has returned to more in-person instruction.
 It is also testing new modes for HyFlex and online instruction. It is anticipated that online FTES will decrease in the near future, but it will continue to become an increasingly important mode for learning and services in the long term.

These recent developments will change the College's use and opportunities for facilities uses.

Campus Voices, Student Voices

The group reviewed an overview of comments from FMP interviews with students, faculty, staff and administrators. Questions to stakeholders: "Do these statements resonate with you? What points can you add?"

Jack Hill – We have a great opportunity to invite community members to engage with the College by offering access to Athletics and Wellness activities and facilities. This is a way to increase the visibility of the College and attract more students.

Karen Reiss – The comments mention several items that are very important College commitments: DEI, meaningful hands-on learning, and highlighting local indigenous cultures. Likewise, the outdoor environment of CR should be at the forefront of facilities planning. It presents crucial opportunities for learning and enjoyment. The CR Outdoor Campus Collaborative is an on-campus workgroup that is developing ideas to use outdoor spaces. Workshop attendees who are involved in this project include Karen, Valerie Elder and Brittany Alvarez (student). The workgroup's report, "Visions for our Forests and Natural Resources" is posted online at https://storymaps.arcgis.com/stories/b015350d425e47f294f25c22b6db14b5 (See discussions of open spaces and attachment, below.)

Mark Bernards – The sites of demolished buildings are great resources for valuable open spaces.

Julia Morrison – Student spaces are important to the College's facilities planning. Equally important is the concern to provide a safe campus for students, employees and visitors. The FMP also needs to address safety.

Rory Johnson – Security is an important commitment at the Del Norte Education Center. Following on Jack's comment about athletics and community engagement – we would like to host an athletic event with the neighboring Del Norte High School at their gym. It could be a special event to raise CR visibility to high schoolers and the community. That could be lots of fun for Crescent City. FMP Team comment – This is an important way to look at facilities planning: What facilities exist in the community that are available to CR?

Bob Brown – I agree with Rory, it would be great to schedule an annual event with our educational partners. I appreciate the Campus Voices comments. Such events are great for recruiting students.

Kerry Mayer – We need to replace the Faculty & Staff Lounge that we used to have in our old facilities. Our faculty & staff need spaces for informal gathering. FMP Team comment: This is consistent with requests from faculty & staff to replace spaces for student/faculty/staff collaboration that were present in the old buildings, but not in some newer facilities.

Rory Johnson – Likewise! We need collaborative spaces at Del Norte.

Karen Reiss – We used the quad between the Humanities & Science buildings as a wonderful gathering space during the pandemic. I held my office hours there. It would be even better with weather protection. I agree, we need informal space for faculty & staff.

Michelle Haggerty – This is an issue with our newer buildings. We lost our hang-out space for everyone. We used to have a faculty & staff dining room in the SRC. We need that again. Is this an appropriate issue for the FMP? FMP Team comment – YES, very appropriate. It is important to articulate these needs in the FMP to guide future renovation and replacement projects. tBP has worked with the College to design the new Creative Arts and PE projects with hang-out spaces. (See discussion of solutions, below.)

Key Planning Themes

The group reviewed the planning themes developed by the FPC. They were used to guide the analysis of existing facilities conditions, FMP programming, and options for future facilities development.

FMP PROGRAMS AND OPTIONS

The group reviewed and discussed the Del Norte and Eureka campuses, including the analyses of existing conditions, FMP programming, and site planning.

DEL NORTE EDUCATION CENTER

Existing Learning Environment – Del Norte

- There are several existing spaces that are outdated for current and future needs, for example, the portables and the Library.
- There is a lack of comfortable outdoor space.
- The campus needs technology infrastructure upgrades.

Existing Facilities Assessments, Zoning, Circulation and Open Space – Del Norte

The group reviewed the analysis diagrams of facilities conditions and campus flow. Question: "Do you agree with this information? What points can you add?"

- The main building and Science Building are in good shape. The Library needs some upgrades & reorganization.
- Art Building houses several functions. It needs to be re-organized.
- The portables are in bad shape and need to be replaced with permanent space.
- The main building courtyard is nice, but there is no seating or weather protection.
- The campus is adjacent to Del Norte High School.

Rory Johnson – The College's property is significantly larger than shown.

- College property extends to the forest on the northeast side. It has potential as learning space. We recently held a Community Clean-Up in that area.
- The Food Forest is CR.
- The College owns the site of the preschool to the west on Small Avenue. CR does not operate the preschool.

The FMP team will work with Rory Johnson to update the diagrams.

FMP Programming – Del Norte

The group reviewed a preliminary sketch of FMP programming and site planning. These are ideas for discussion, no decisions have been made.

- The main building needs a new roof & HVAC system.
- Library needs to be re-organized.
- Art Building needs to be re-organized to improve utilization.
- The portables are in bad shape and need to be replaced with permanent space.
- Remove vacated portables, reorganize parking and open spaces.
- Remove and replace trees that are old or not thriving.
- Create usable outdoor space between the main building and a new facility.
- Replacements and upgrades create opportunities to re-organize the campus to improve the flow between Student Services, Library, instruction, offices, Health Center, community uses, communal spaces.
- There is a potential future building site on the north side.

Rory Johnson – Requests a meeting to gather input about these ideas with more stakeholders from the Del Norte campus. The FMP Team will follow-up with Kevin and Julia to arrange it. (Scheduled for Thursday, May 5.)

EUREKA CAMPUS

Existing Learning Environment – Eureka

- There is significant excess space on the campus, meaning that the existing space is greatly underutilized. The facilities database shows that classrooms, labs, offices and study spaces are in excess of state standards.
- On the other hand, campus users report that it doesn't feel like we have too much space. We struggle to provide classrooms for large classes, enough offices, group study spaces, stations for online classes, etc.
- Excess space limits opportunities for future facilities funding.

Why does the data say one thing, but your experience says the opposite?

- The database is outdated. This is not a criticism; you can't know this until it is tested in an FMP process. However, it is still true that there is too much space.
- There are many spaces on campus that are 'bad space' because they are not configured for modern instruction and programs. This means that 'good space' is overutilized. Examples include: Mat Room in Administration of Justice, Library study spaces converted to offices, etc,
- There is a crucial lack of communal spaces for Student Life, employees, and campus events.
- There may be a lack of Distance Learning spaces. These are spaces that are supported by technology infrastructure, used for online learning, etc.

What It Means

The information indicates that there are opportunities to reorganize the existing spaces to make it 'good space' and bring utilization rates into balance.

Eureka Facilities Needs

Based on the analyses, the following Needs were identified for the Eureka campus:

- Reorganize spaces in existing buildings to increase utilization
- · Create flexible partnership spaces
- Replace seismically unsafe buildings
- · Create comfortable indoor & outdoor spaces for Student Life
- Provide collaborative collegiate spaces
- Vacate and remove unsafe facilities
- Redevelop demolition sites for usable open space
- Upgrade technology infrastructure

Existing Facilities Assessment - Eureka

The group reviewed the architectural and engineering assessment of condition ratings for the existing buildings.

Peter Blakemore – Classrooms in the Science Building are fully utilized by 3 divisions. Academy of the Redwoods is asking to use the classrooms in Science. They are some of the most modern classrooms on campus. The large CIS labs were underutilized during the pandemic, but that may improve as enrollment rebuilds. In the Applied Technology Building, where the labs are 'under pressure.' Science is one of the newer buildings. Science Building labs have maintenance issues,

Mike Haley – Labs in the Science building are too small. This is important.

Maria Morrow – The Biology prep space is cramped, there is no room to expand. There is also a lack of technology.

Karen Reiss – When we moved from the old to the new Science Building, we lost space in the stock room. It is heavily utilized. On the other hand, our Science labs are more modern than the labs at Cal Poly Humboldt.

FMP Team – We are hearing both positives and negatives about existing spaces. An important FMP theme is Flexible Learning Space so that spaces are available for more utilization. The group indicated, Yes, this is true.

Kerry Mayer – In the same way that students want more collaborative study space, we need more collaborative working spaces for faculty and staff. Other campuses have this. We used to have this in the old buildings, but it was not replaced in the new buildings.

Peter Blakemore – We have some collaborative space in the new Creative Arts building. The computer classrooms need a better layout. The telepresence rooms in the Library are underutilized because instructors do not like to teach there; we need those capabilities in the Humanities and Science buildings.

Karen Reiss – Flexiblity is not our only need. 'Flexible' multi-purpose spaces are "watered-down" (underdeveloped) and not suitable for some instruction. FMP Team comment: Modern design principles for education seek to balance 'Flexible and Nimble." Flexibility refers to multi-purpose, Nimble refers to accommodating a broader range of specialized functions.

Site Constraints - Eureka

The group reviewed a diagram of site constraints.

- There are two north-south underground utilities line on either side of the AT and Library Buildings. These cannot be building sites.
- A small number of seismically safe sites have been verified by the engineering consultants. These spaces are referred to as "clear" or "cleared."
- It is hugely expensive and lengthy to investigate whether additional sites are safe for buildings, and the answer might be 'No.' The most likely safe sites have already been identified.
- The FMP Team has identified a new, arc-shaped development zone that shifts the center of campus toward the east.

Existing Zoning, Circulation and Open Space

The group reviewed the analyses of zoning, circulation and open spaces.

• Campus development is shifting to the east. This will impact needs for vehicle routes, pedestrian pathways, active open space, and usable open spaces.

OPTION A – EUREKA

The group reviewed Option A. These are ideas for discussion, no decisions have been made.

- The Building Program is the preliminary list of proposed improvements.
- The Site Plan is the preliminary diagram that shows alternative locations for the Building Projects and other projects that would be necessary to accommodate the building projects.

FMP Building Program - Eureka

- Student Resource Center Replacement
- Dormitories Replacements
- Administration of Justice Building Renovate or Replace? If replaced, relocate Firing Range indoors.
- Potential Future Academic Building
- Academy of the Redwoods/Reorganize Existing Space in Library, Applied Technology Building
- Vacate/Demolish Unsafe Buildings RBC A&B, Creative Arts, Life Sciences, Physical Sciences, PE Building, old Creative Arts)
- Horticulture/Aquaculture Lab

FMP Site Plan - Eureka

- Alternative locations for the building program projects.
- Relocate Athletic fields to the southwest to make 'cleared' sites available for replacement buildings.
- Redistribute parking to be more convenient to the new, arc-shaped development zone.

Discussion about Option A - Eureka

Bob Brown – The diagram is appealing as a long-term layout for Athletics. There is a concern about having access to practice fields during the construction period. We need to maintain and grow our program offerings.

Silas – I like the layout. What is the idea for the Horticulture Lab? We have tried to add space, but it is our understanding that the underground utilities limits our options. FMP Team – It is our understanding that the Horticulture Program needs lab space. The idea is to provide it on a cleared site neat the existing Horticulture facility.

Julia Morrison – The tennis courts are not shown. FMP Team – Yes, There is a space for the tennis courts; they are not shown in error. We will fix the diagram.

Peter Blakemore – The site of the old Library would be a good location for an amphitheater. The view is best at that spot.

Kerry Mayer – Are you getting rid of the tennis courts? We have a thriving tennis program. FMP Team – No, the tennis courts are not going away. A site has been identified for them, but they were left off the diagram in error. It will be fixed. The FMP is not planning for any programs to go away.

Michelle Haggerty – Where are the solar panels? FMP Team - The solar field is planned for a location near the old Physical & Life Sciences Buildings. It was left off the diagram in error. It will be fixed.

Valerie Elder, Karen Reiss – She shared her screen to show a report by the Outdoor Campus Collaborative, an informal group at the Eureka Campus. This information is available online, as well as the 2019 Facilities Master Plan, Appendix D Natural Resources.

CR's outdoor spaces should be an important consideration in facilities planning. The College has many instructional programs that are conducted outdoors. They are part of the unique offerings of CR, and are tailored to the regional environment, culture and industry. Karen was one of the authors of the Appendix D. Since then, the Forestry and Natural Resources Department has had nearly 100% employee turnover. She represents the 'institutional memory' on this topic.

CR OUTDOOR CAMPUS COLLABORATIVE REPORT

Brittany Alvarez (student) - The Outdoor Campus Collaborative is a visioning group for the use, enjoyment and improvement of our on-campus outdoor areas. She gave an overview of the group's report. It includes existing resources, relation to CR programs and activities, planned facilities, photos, diagrams. See attached.

RAN OUT OF TIME

The meeting time ran out. The discussion of Option B will continue at the next FPC meeting.

NEXT STEPS

The next meeting of the Facilities Planning Committee will be held on Tuesday, May 3, 10am – 11:30 am.

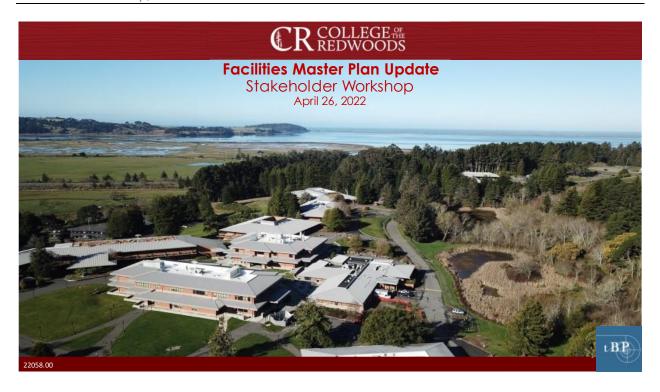
Prepared by:

Amy Jane Frater AICP, LEED AP

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Attached:

- 20220426 Stakeholder Workshop Presentation
- 2019 CR FMP Appendix D, Outdoor Resources Comment
- 2022 CR Outdoor Campus Collaborative, Vision for Our Forests & Natural Resources



Purpose of Stakeholder Workshop: Discuss project information, evaluate options for future facilities development

Agenda:

What is a Facilities Master Plan?
Background
FMP Programs & Options
Next Steps

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What is a Facilities Master Plan?



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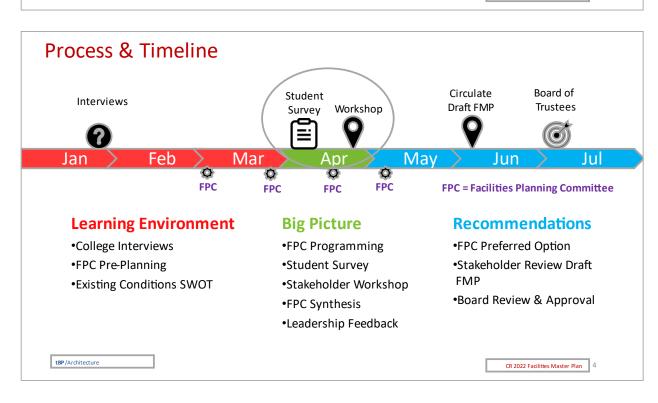
The 2022-2032 CR Educational Master Plan establishes the learning vision that is the foundation of facilities planning.



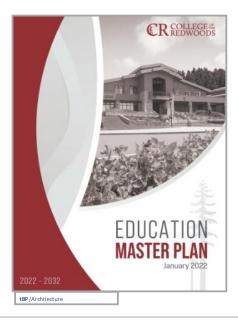
Facilities Master Plan (FMP) =
A roadmap that establishes broad principles for the future physical environment to support the College's learning vision.



The FMP is used to guide decisions about future facilities development and funding strategies.



2022-2032 CR Educational Master Plan Initiatives



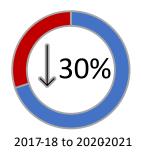
- 1. Become the preferred transfer pathway to Cal Poly Humboldt.
- 2. Expand and prioritize offerings that prepare students for living-wage jobs.
- 3. Create a more nimble and adaptable institution.
- 4. Establish stronger wraparound experiences for students' total connection.
- 5. Pursue the future of learning.
- 6. Increase commitment to diversity, equity and inclusion.

The EMP is the foundation of the Facilities Master Plan.

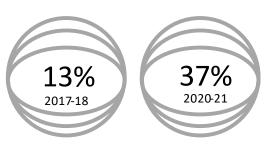
CR 2022 Facilities Master Plan 5

Planning Context – Student Headcount, Online Instruction

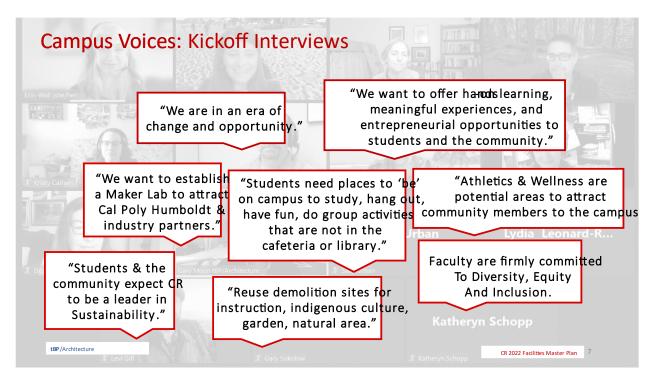
Total District Headcount



Total District Online FTES



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Key Planning Themes

Era of Change and Opportunity



Create Flexible Learning Environments



Encourage Active Student Life



Technology Everywhere



Enhance Open Spaces



Facilitate Partnership
Opportunities
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Promote Diversity, Equity and Inclusion

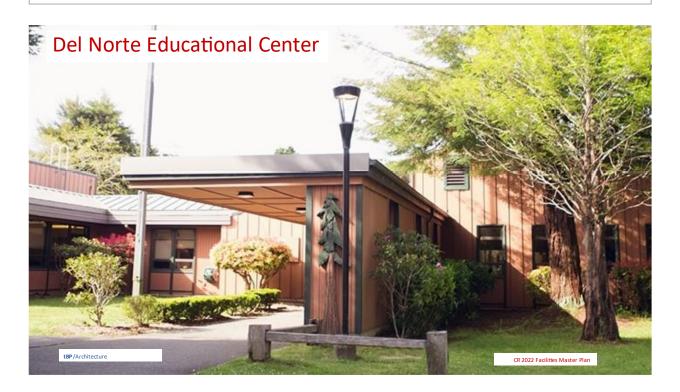


Offer Community Access to Campus



Lead in Sustainability





Existing Learning Environment – Del Norte

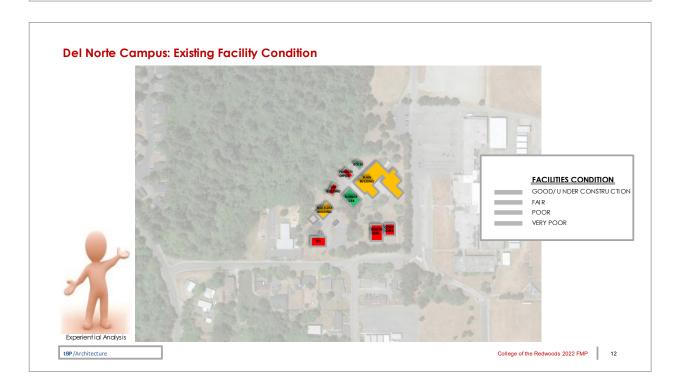
Data Says -

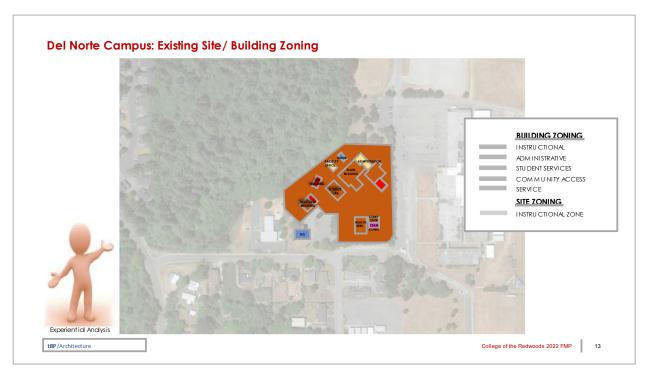
•Outdated spaces are underutilized

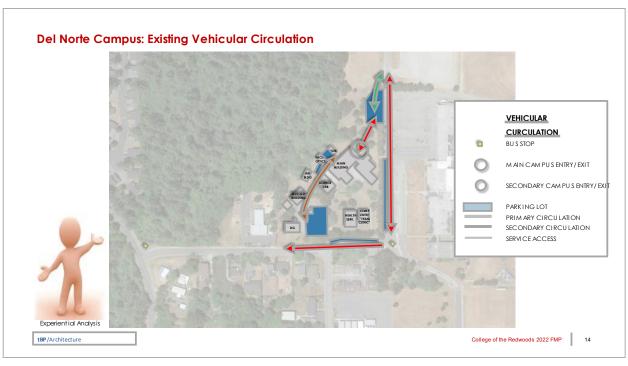
Analysis

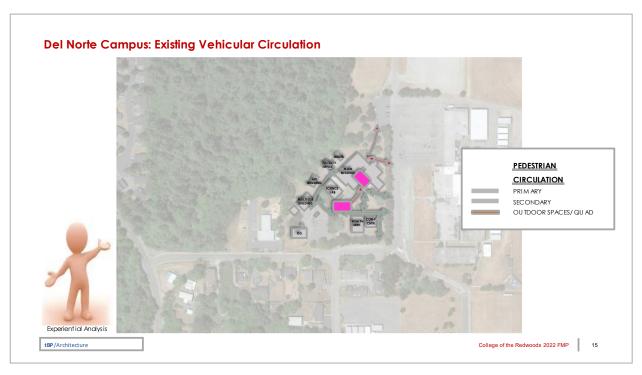
- •Outdated spaces are underutilized
- •Library, portables are not configured for current instruction
- •Lack of usable outdoor space
- Technology Upgrades

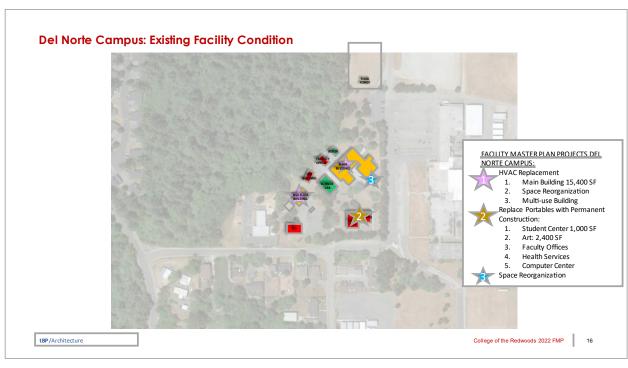
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Existing Learning Environment - Eureka

Data Says

- •Significant excess space
- •Doesn't feel like too much space

Analysis

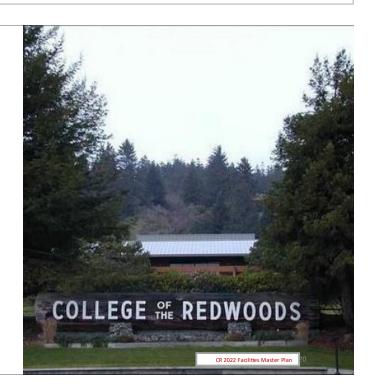
- •Facilities database is outdated
- Outdated space is underutilized
- Crucial lack of Student Life spaces
- •Lack of Distance Learning spaces

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CR 2022 Facilities Master Plan

Eureka Facilities Needs

- Reorganize spaces in existing buildings to increase utilization
- Create flexible partnership spaces
- Replace seismically unsafe buildings
- Create comfortable indoor & outdoor spaces for Student Life
- Provide collaborative collegiate spaces
- Vacate and remove unsafe facilities
- Redevelop demolition sites for usable open space
- Upgrade technology infrastructure



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Eureka Campus Existing Plan



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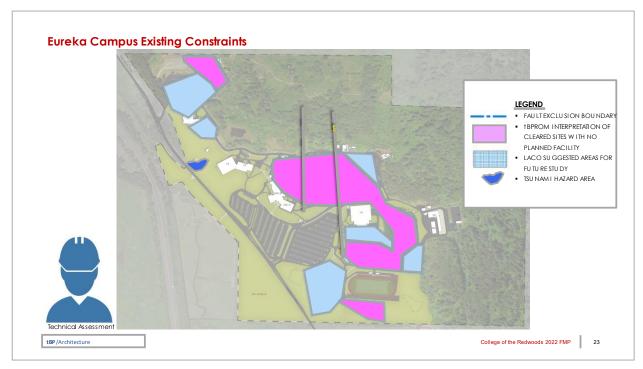
College of the Redwoods 2022 FMP 21

Eureka Campus Existing Plan

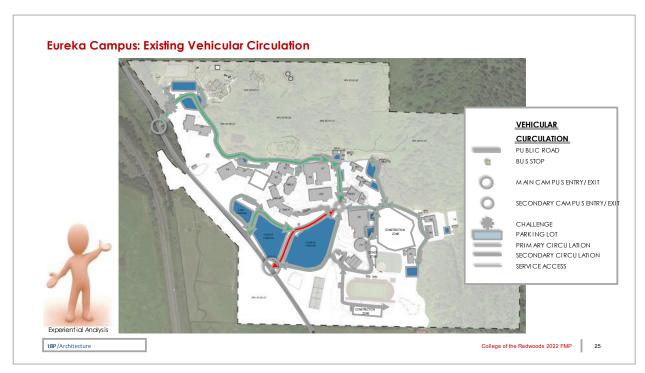


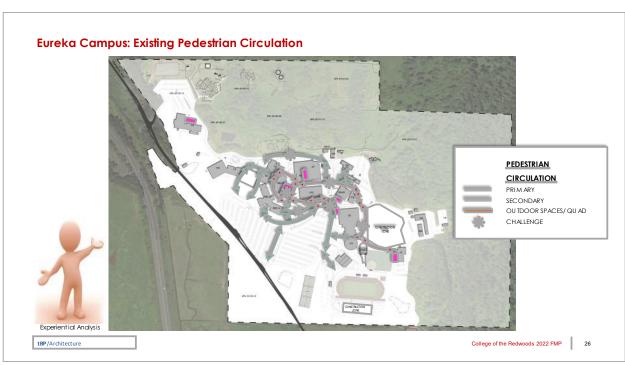
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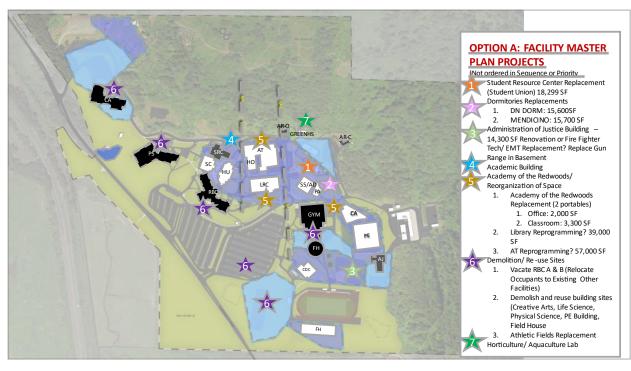
College of the Redwoods 2022 FMP 21

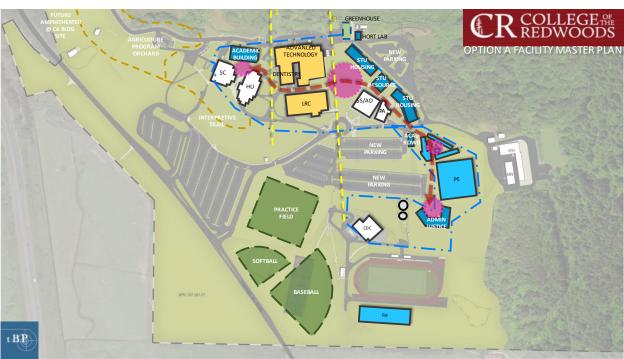


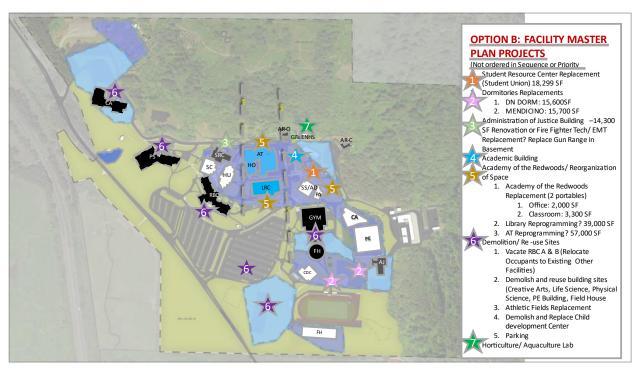


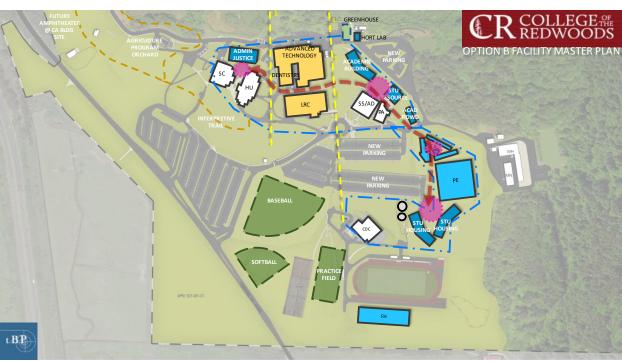










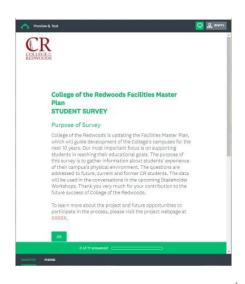


Invite students to take the FMP Student Survey!

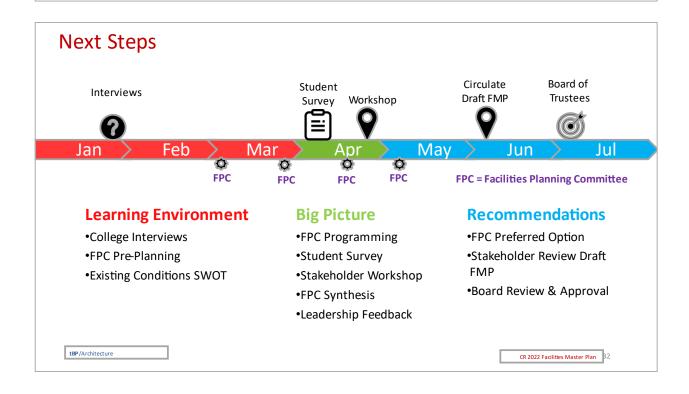
CR Students will receive the email invitation on Monday, April 25.

The survey will be open for 1 week, until Sunday, May 1.

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College of the Redwoods 2022 FMP 31





2019—2029 Facilities Master Plan

Appendix D: Outdoor Resources Comment, 3-14-2019

TO: Facilities Management Plan Committee

RE: Comments on DRAFT Management Plan

FROM: Tim Baker, Mickey Jarvi, Karen Reiss, Maria Friedman

The draft Facilities Management Plan has a serious shortcoming with regards to the unique natural areas on the College of the Redwoods campus including the extensive ponds, wetlands, riparian zones, and forests (see map). These lands are not only a remarkable asset in their own right, and one of the features that makes our College unique among the California community colleges, but are a significant component of many courses in Biology, Environmental Science, and Forestry /Natural Resources. Instructors for BIOL 4, 5, 18, 20, and 21, ENVSC 10, and FNR 1, 5, 10, 31, 51, 52, 54, 60, 80, and 87 all use these natural areas for experiential learning despite the disrepair to the trail networks and ponds have fallen into over the last decade and the lack of any active forest management in the various stands on campus. Restoring and maintaining these areas are essential for active learning in these disciplines, accreditation of our forestry program, and to close a widening equity gap on our campus.

Campus Forest Inventory

The campus forests can be divided up into several distinct areas based on history and composition. The most representative area of native forests is the upper section of second-growth redwood (~39 acres) in the northeast corner of the property. This area has an outstanding example of second-growth redwood forests which developed naturally following several periods of timber harvesting in the early and mid-1900's. It currently has 80,000 - 100,000 board feet per acre volume and several examples of old-growth remnant trees. It has largely been unmanaged since the 1960's but has extensive unmanaged recreational use by students and neighbors of the College.

There are several smaller stands of predominantly non-local pines that were planted in the 1970's on what were old hillslope pastures above the current baseball field. These trees are extremely fast growing in this environment but reach maturity early and begin falling down — which they have been doing for the last several years. These trees currently have no economic value because of poor growth form but could be used as the basis for a campus biofuel system or a co-generation plant. These pines have been invaded by fungus-bearing bark beetles and pine gall rust which have killed several individuals and will likely continue to expand. Another stand of predominantly Douglas-fir with a few inclusions of Bishop pine (~12 acres) is just east of AJ. This stand, which was planted in the mid-late 1970's and has been unmanaged since, has about 50,000 board feet per acre but has been in need of serious thinning and stand improvement for some time. There are some good examples of Douglas-fir in this stand which would have economic value if harvested. There are several other small stands scattered around campus, each unmanaged and with a different set of issues.

CR Ponds

Two interconnected ponds sit between central campus and the hillside, and a smaller pond near the athletic fields (~5 acres total). They are filled with tiny aquatic plants (including waterfems with symbiotic cyanobacteria), are surrounded by classic riparian species such as cattails and willows and cottonwoods, and provide habitat for many animals. Several amphibian species use the ponds as breeding grounds; waterfowl hide along the edges of the water and black-crowned night herons roost in the shrubs above the edges; beaver and river otters have been sighted. A well-trodden trail runs along the backside of the ponds connecting central campus to Creative Arts. The ponds were once used by the Aquaculture program for fish-rearing, and a defunct pier and dock sits crumbling and fenced off. The ponds are becoming encroached by surrounding vegetation and need periodic draining and excavating, or they will become wet marsh and eventually meadow.

Use of Outdoor Campus Resources

The natural areas on campus have a long history of both recreational and educational use by the College community. An extensive network of trails ("The CR Nature Trail") wound through the forests up one side of a trickling creek, across the ravine, and up into the redwood forests. These trails were complete with bridges and boardwalks that were built by the CCC's in the 1970's and 80's, and had been maintained for a time by the Forestry Club but have fallen into disrepair. General wear-and-tear combined with the storm of 2004 wreaked havoc with the ravine and the bridges that crossed it, and since that time many of the bridges disintegrated or were removed for safety reasons. There also used to be an exercise "Par Course" that encircled the campus through these natural areas. People could jog station to station, at which point they'd be instructed to do particular exercises before moving on, but now the stations are overgrown with blackberries and mostly hidden from view.

Part of the maintenance problem is a failure to clarify the role of student work projects with the CSEA. Between class projects and club activities, students are a powerful and enthusiastic workforce, yet the union has objected to some of the student projects in the past (e.g. bridge-building) which effectively stymied these efforts. The Forestry Club actually raised the money for rebuilding several of the bridges over the ravine, but weren't allowed to complete the projects because of union concerns.

The lack of a current formal trail network limits official class use, but students have developed their own haphazard social trails and built several recreational uses, including: a net in a group of redwoods about 50 feet off the ground, a rope swing over one of the back gulches, and several resting/camping areas around remnant old-growth stumps in the forest. This brings student safety risks and environmental degradation, including trash, graffiti, homeless camping and associated bio-waste, and discarded needles. In recent years, the cross-country team has used several of the established trails (legacy or social) for training purposes.

Educational uses of the forested areas are extensive and essential for student success in achieving course learning outcomes. Examples include conducting forest inventories in the FNR 54 and 10, studying regeneration factors, applications of thinning and light allocation, gap dynamics, growth and yield in the FNR 5, looking at species identification in the FNR 51, recreational use and

forest characteristics in the FNR 1, basic wood safety protocols in the FNR 3 course, stream quality and characteristics in the FNR 80, forest health attributes in the FNR 60 course, wildlife habitat assessment, browse surveys, spotted owl calling in the FNR 87. Students in BIOL 4 look for soil arthropods and salamanders in the forest, and BIOL 20 students practice plant species identification throughout the "cross-country" trail system.

Educational uses of the ponds are important as well. BIOL 4 and 5 and ENVSC 10 students sample aquatic and riparian vegetation, benthic microorganisms, and aquatic invertebrate and vertebrate animals. Access is awkward and generally requires hurling buckets off the banks and reeling them back in with rope. Monitoring and management exercises would be more easily incorporated into these classes with better access, and we could go beyond focal sampling and monitoring and incorporate longer-term and experimental studies into the curriculum. Student projects also can lead to recreational and environmental education opportunities for the College community. Last Fall, BIOL 20 students earning UC California Naturalist certification devised a self-guided nature trail with informational placards that focused on the pond and its aquatic and riparian vegetation, as well as built a solitary bee "hotel" designed to attract native pollinators. If installed, this trail could be used by classes in which we teach ecology as well as provide a recreational opportunity for all.

Accessibility, Equity, and Active Learning

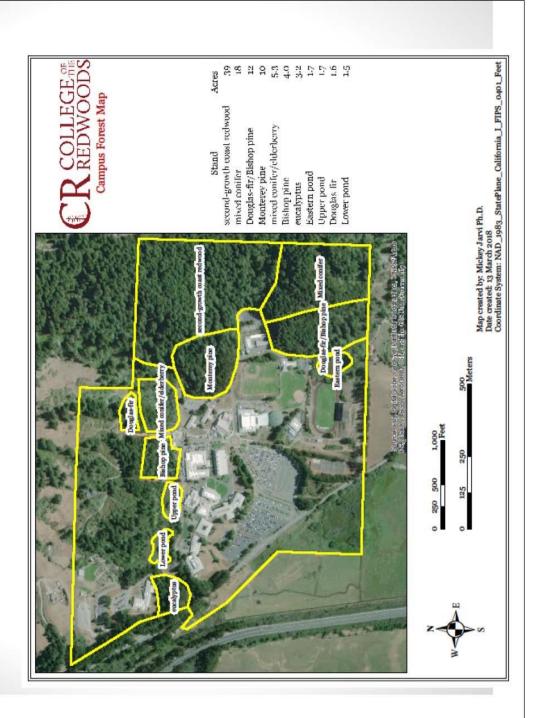
The many courses that use the forests and ponds on a weekly basis do help to mitigate the problems associated with the College's inability to provide transportation for students in courses with field trips. But the majority of the extended campus outdoor areas are not easily accessible nor are they properly maintained for use by a diverse community of students. Instructors often need to choose off-campus field trips to utilize more accessible locations rather than stay on our own ecologically-rich campus. This can become a financial burden to students who must provide their own transportation, and some students simply don't have transportation (e.g., those in the doms), or don't have flexible transportation (e.g., those relying on buses). This inequity is most pronounced in the GE offerings in which students tend to come from more diverse backgrounds and physical ability levels than those who, for example, choose forestry as a career path.

Field work is an important component of experiential learning for both GE students learning what science is and does and for those interested in a career in the pure or applied natural sciences. By making on-campus forest trails and ponds accessible, we would improve student access and equity, decrease reliance on student-provided transportation, improve the CR community's relationship with the natural world, and improving the overall public perception of CR.

Proposal

We envision a campus in which the natural areas are celebrated, used, and managed as intently as the buildings and infrastructure. We envision an ongoing collaboration of staff, and the faculty and students in BIOL, ENVSC, FNR and CE working together to create and maintain a system of trails that include some self-guided interpretive areas, a dock for the north pond, managed aquatic habitats, and perhaps even restoration of the exercise par course.

This collaboration could provide unique learning opportunities for students and create a College community that is invested in and values its stunning natural areas. These areas have long been overlooked or ignored by the campus community and the Facilities Management Plan should have a section devoted to their management. A standing sub-committee on Forest and Natural Areas management might be needed to focus on the distinct needs of these areas that set them apart from the traditional focus of the Facilities Management Committee.







College of the Redwoods Outdoor Campus Collaborative

Visions for our Forests and Natural Resources

April 25, 2022

The Vision

"Our students are not just runners. Not just identifying plants. Not just building trails. We are growing stewards fulfilling the College of the Redwoods mission for lifelong learning in our community." -Coach Reed

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College of the Redwoods Outdoor Campus Collaborative

College of the Redwoods campus provides an outdoor learning environment with inviting trails that model sustainable environmental practices and community collaboration.

Outdoor spaces on campus are used by our students for learning across multiple disciplines, and by our local community who are invited to explore and learn from our forested classroom.

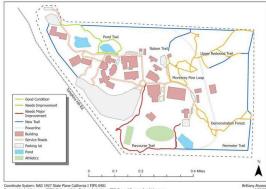
Benefits

- Outdoor Learning Space: Used to facilitate student learning, skill-building, and job training in multiple disciplines.
- Health and Wellbeing: On-site opportunity for strengthening, restoring, and rejuvenating.
- Cross-Campus Collaborations: Envisioning, restoring, and maintaining the outdoor campus together creates community.
- Campus and Community Collaborations: Invited community involvement creates broad investment and promotes CR.

Existing and planned trails

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This is the potential of our outdoor spaces

Pond use

Accessing our ponds supports education, research and wildlife/fisheries habitats.

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Students can use the pond for water sampling.

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Students can construct wood duck boxes to help support wildlife.

Forest Health

Interpretive signs would help users navigate the trails and identify local species.

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Labeled trees can serve as an arboretum.



Signs for important local species.

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Example interpretive sign.



Past CR Biology student posts, signs and wildlife projects.

Repair of current trails and creation of prospective trails serve as a unique recreational and educational experience.

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College of the Redwoods Outdoor Campus Collaborative



(top) Students in their outdoor classroom, (bottom left) a safe, clear path, (bottom center & right) Students repairing and constructing trails at the Humboldt Botanical Gardens.

Increase safety by removing hazard trees and chip them to improve trail surface.

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College of the Redwoods Outdoor Campus Collaborative



Recycling our forests resources.

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College of the Redwoods Outdoor Campus Collaborative

Support wildlife and their habitats.



(first) threatened species Marbled Murrelet, (second) threatened species Northern Spotted Owl, (third) deer, (fourth) salamander found in the Humboldt Botanical Gardens.

Management of invasive species can help to reduce spread, increase biodiversity, and improve wildlife habitat.

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(left) Pampas grass Cortaderia selloana, (right) scotch broom Cytisus scoparius.

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College of the Redwoods Outdoor Campus Collaborative

Collaborate with the local community by providing public recreation, providing an outdoor space for college clubs host their meetings (such as CR's Forestry Club & RISE Native American Club), becoming a K-12 field trip destination, providing a parcourse or running trail for athletic teams, and networking with Cal Poly HSU.



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College of the Redwoods Outdoor Campus Collaborative

All are invited to join our weekly brown bag meetings Wednesdays at noon at the tables by the ponds (on a sunny day) or SCI 108 to continue to discuss collaborative opportunities for College of the Redwoods outdoor campus.

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