

BOOKATARIUM

THE HEART OF CARRBORO

February 13, 2018

PERKINS+WILL

PROJECT TEAM



DEREK JONES
Managing Principal
Perkins+Will



CHRIS GARRIS
Design Principal
Perkins+Will



MIKE RANTILLA
Project Manager
Perkins+Will



IAIN BANKS
Traffic and Parking Strategies
Nelson Nygaard

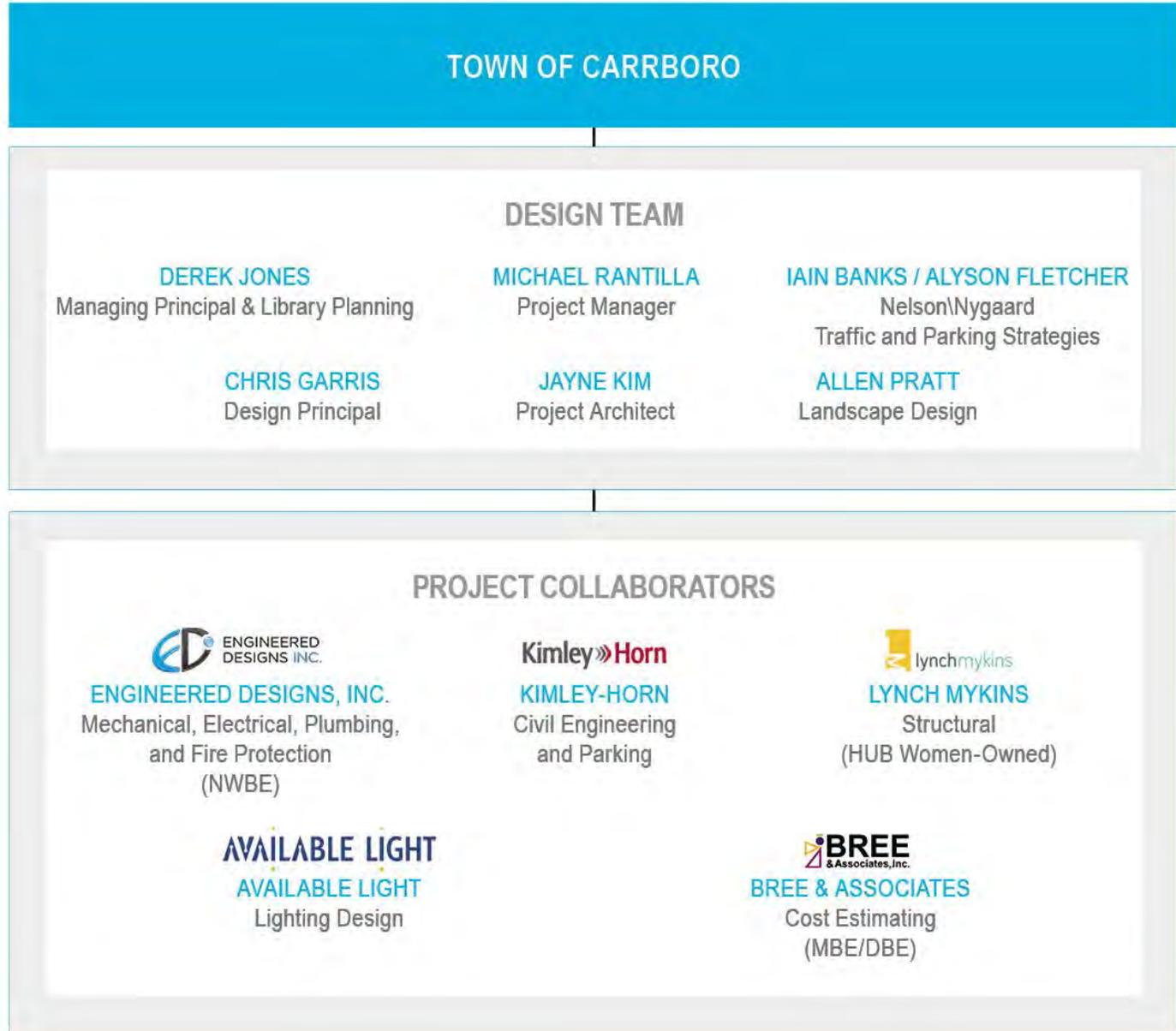


GINGER SCOGGINS
Mechanical Engineer
Engineered Designs, Inc.

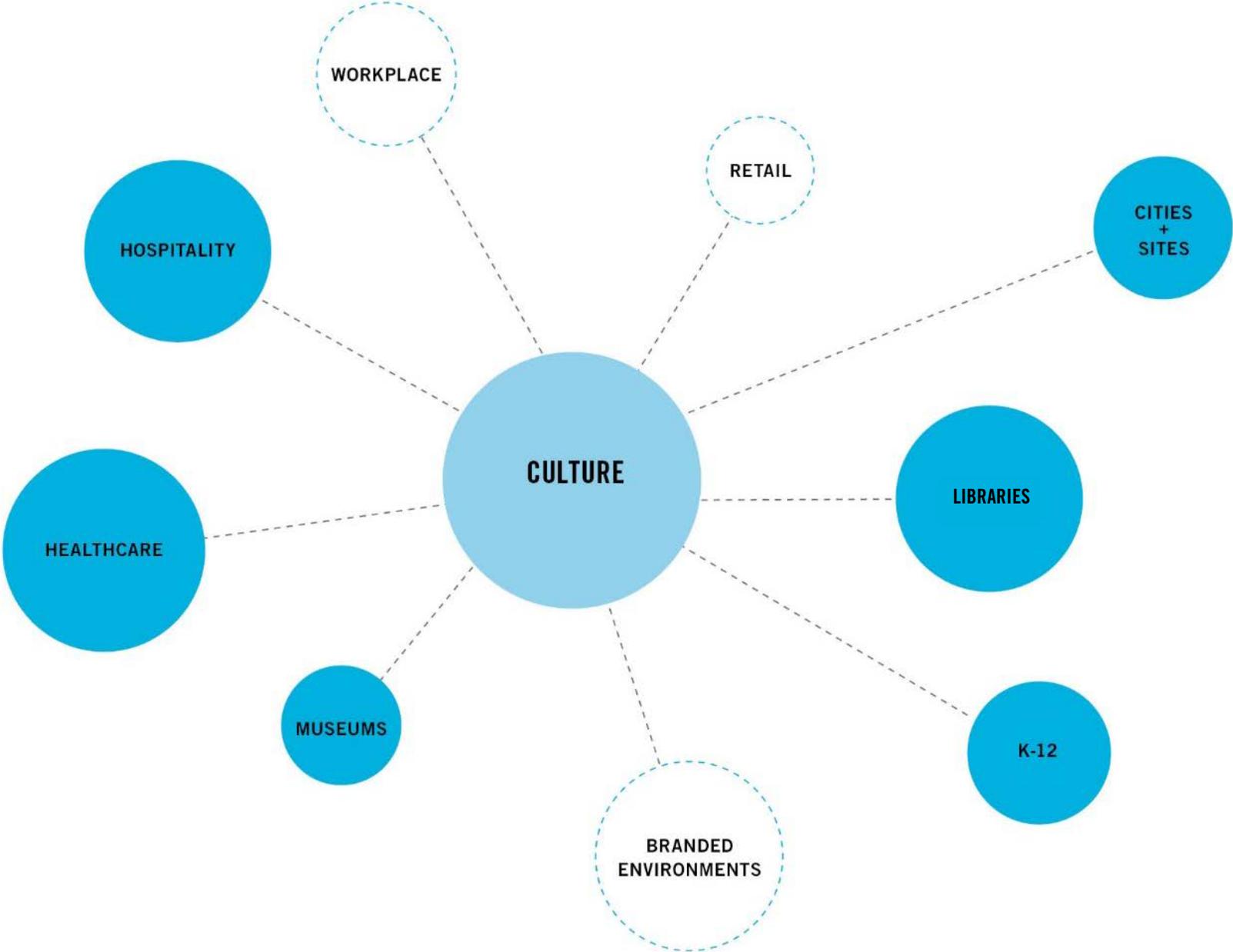


CHRIS BOSTIC
Civil Engineer
Kimley Horn

PROJECT TEAM



PERKINS+WILL ECOS



AGENDA /

1. Sustainable Design Leadership
2. Holistic Parking Solutions
3. Stakeholder Engagement
4. Mixed-Use | Hybrid Programs



LIBRARY

**SUSTAINABLE
DESIGN
LEADERSHIP**

SUSTAINABLE DESIGN PROVIDES...



ENVIRONMENTAL BENEFITS

Reduces the impacts of
natural resource
consumption



ECONOMIC BENEFITS

Improves the
bottom line



HEALTH AND SAFETY BENEFIT

Enhances occupant
comfort and health of
occupants

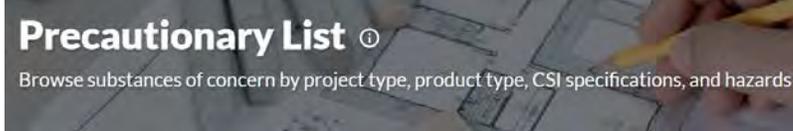


COMMUNITY BENEFITS

Minimizes strain on local
infrastructures and
improves quality of life

HEALTH AND RESILIENCE

2011: **Precautionary List** ⓘ
Browse substances of concern by project type, product type, CSI specifications, and hazards



2014: Perkins+Will ranked #1 Large Architectural Firm by US Green Building Council

2016:  fitwel

2017:  Resilience
Action List & Credit Catalog

With **390 LEED certified projects to date**, over 60% of which are Gold or Platinum, we have the internal tools and formal processes to ensure certification every time.



40

Certified



112

Silver



199

Gold



39

Platinum

MORGAN STATE UNIVERSITY

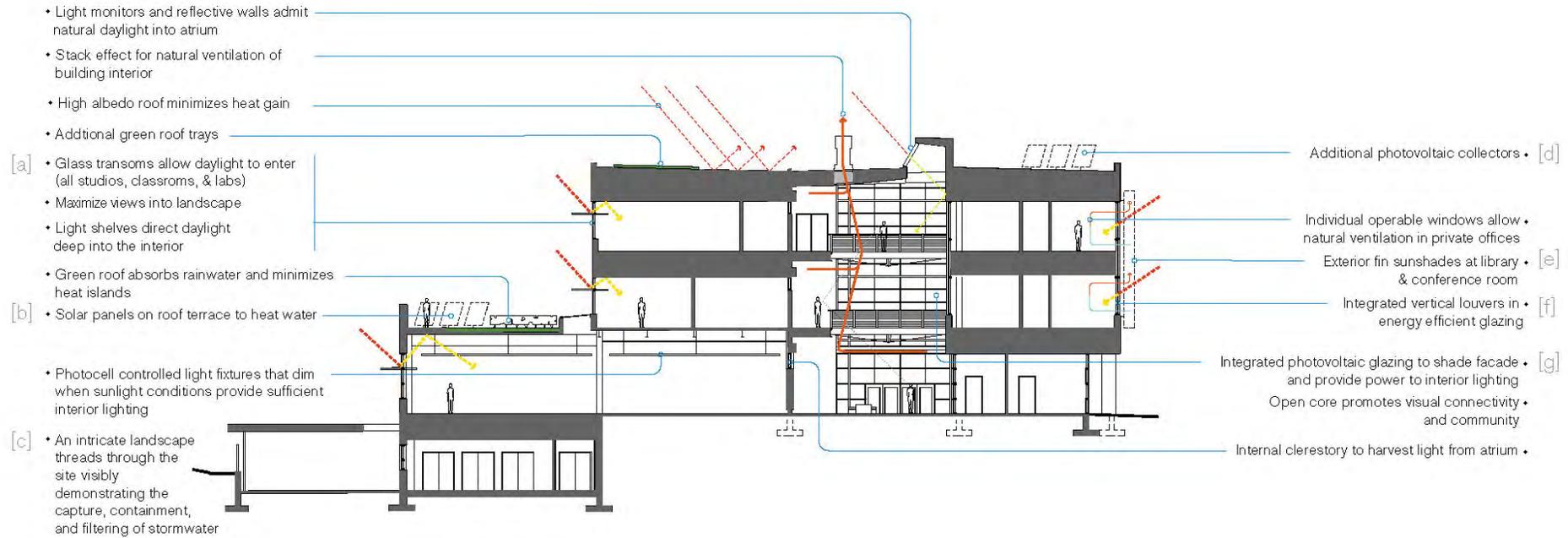
CENTRE FOR THE BUILT ENVIRONMENT AND INFRASTRUCTURE STUDIES (CBEIS)

Designed differently:

- Multiple disciplines under one roof
- Learning lab for sustainable design and engineering
- Multiple solutions of each system to compare options
- Interactive atrium displays to monitor performance
- AIA Maryland Public Building of the Year
- AIA North Carolina Merit Award
- AIA Baltimore Sustainable Design Award
- LEED Gold certified



MORGAN STATE UNIVERSITY CENTRE FOR THE BUILT ENVIRONMENT AND INFRASTRUCTURE STUDIES (CBEIS)



UNIVERSITY OF BRITISH COLUMBIA CENTRE FOR INTERACTIVE RESEARCH ON SUSTAINABILITY (CIRS)

This building exceeds LEED Platinum status, and key features include:

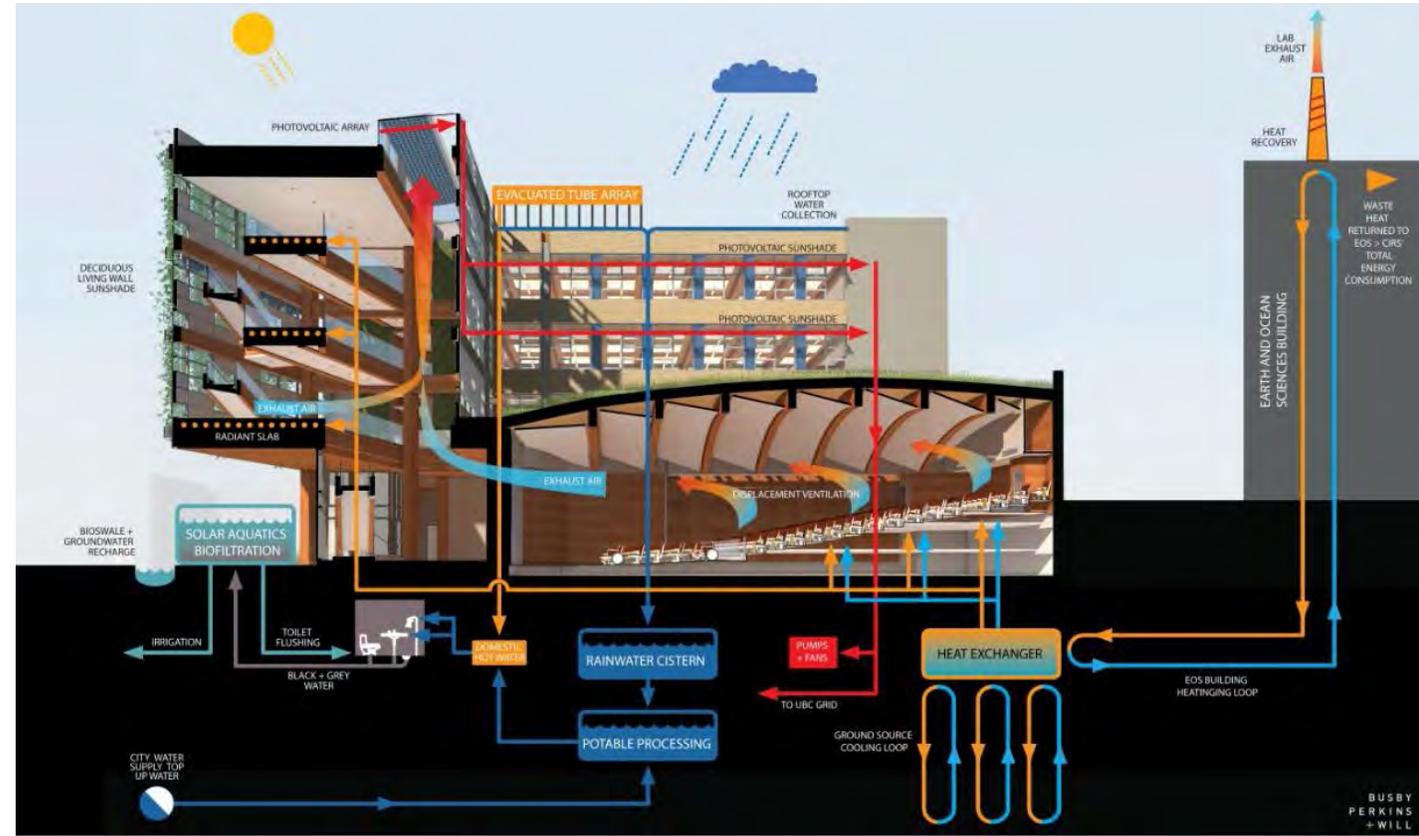
- Sustainable systems on display to educate public
- Planted solar shade and high performance building envelope
- Waste heat recover from adjacent building
- Integrated photovoltaic and geexchange system
- Rainwater collection for potable use
- On-site purification of wastewater through a solar aquatics bio-filtration system



UNIVERSITY OF BRITISH COLUMBIA CENTRE FOR INTERACTIVE RESEARCH ON SUSTAINABILITY (CIRS)

Designed to be 'net positive' in seven different ways:

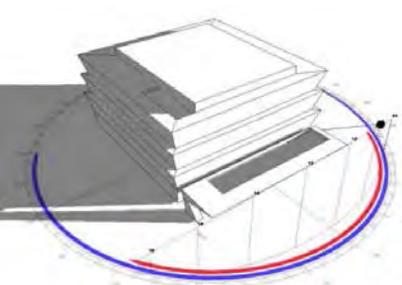
- Net-positive energy
- Structural carbon neutrality
- Operational carbon
- Net-zero water
- Turning passive occupants into active inhabitants
- Promoting health and productivity
- Promoting happiness



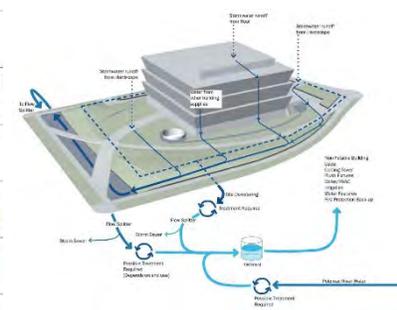
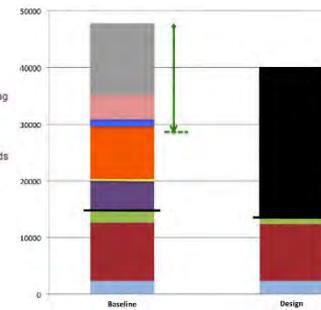
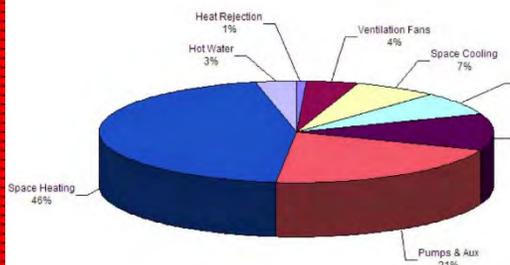
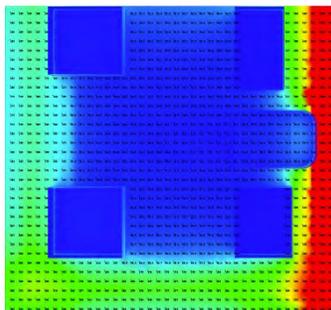
SUSTAINABLE DESIGN PROCESS

Our sustainable design process hinges on taking the right steps in the right order:

1. Clearly define needs and targets
2. Meet needs through passive design
3. Meet the remaining needs with efficient systems
4. Use waste energy streams
5. Provide controls
6. Onsite renewables if necessary
7. Offsite renewables / Clean Power if necessary



DEC 21



ONGOING RESEARCH

Electrochromic Glazing

Algae Cells

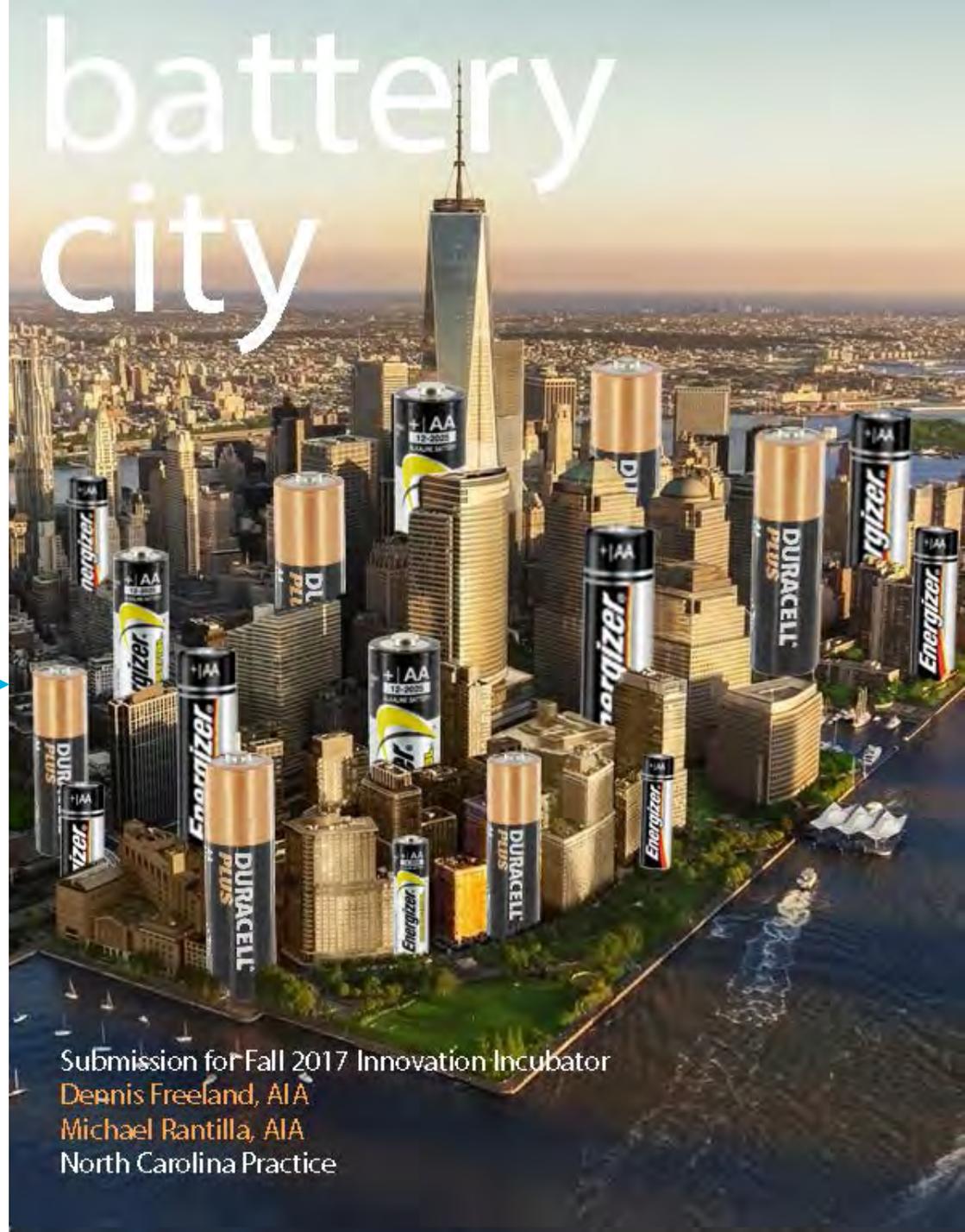
Fuel Cells

Aerolastic Flutter

Piezoelectric

Phase Change Materials (PCM)

Building Integrated Battery Systems



SUSTAINABILITY

Energy



Durham County Libraries



Sustainable Mechanical & Electrical Systems:

- Energy recovery systems
- Low-flow plumbing fixtures
- Rain water harvesting
- Gray water systems
- Solar thermal water heating
- Lighting Optimization
- Geothermal Heating and Cooling
- Photovoltaic Systems
- Radiant floor and ceiling systems
- Chilled Beams
- High-efficiency A/C and electrical equipment

SUSTAINABILITY

Energy



Design Considerations for Sustainable Systems:

- Right-Size system to lower energy consumption
- Energy Modeling
- Life Cycle Cost Analysis

Solar/Photo-voltaic Design Considerations (NC Clean Path):

- Battery Storage
- Building Orientation
- Roof Space Availability
- System Cost/Options

Transit Operations Center, City of Raleigh



HOLISTIC PARKING SOLUTIONS

AT THE CENTER OF EVERYTHING



TRANSIT SYSTEMS



PARATRANSIT AND MOBILITY MANAGEMENT



WALKING AND BICYCLING



PARKING MANAGEMENT



MULTIMODAL NETWORKS



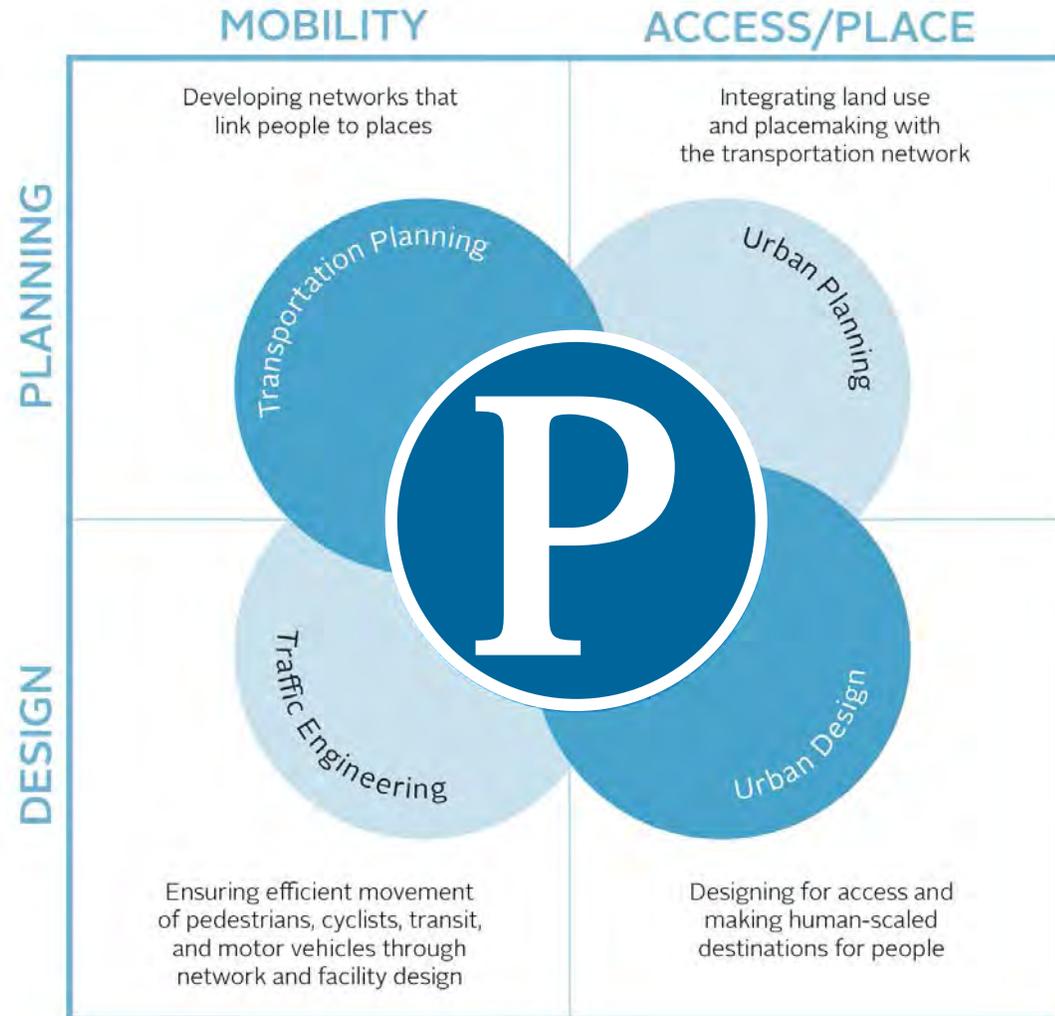
CAMPUS ACCESS



TAXI AND ON-DEMAND SERVICES



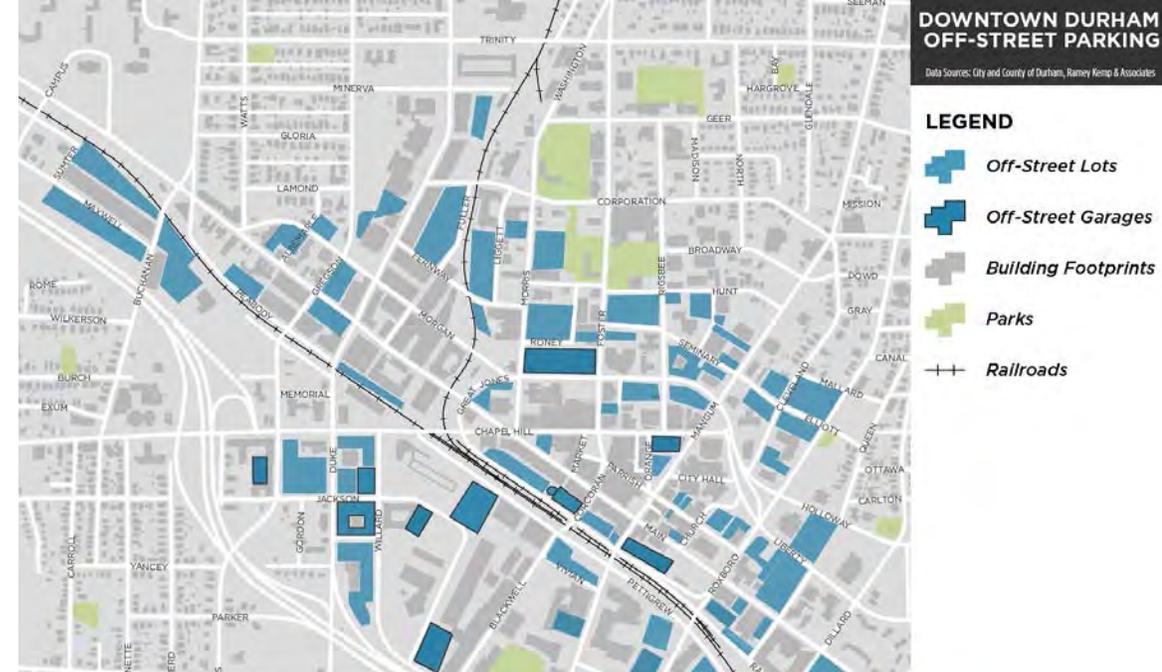
TRAFFIC ANALYSIS



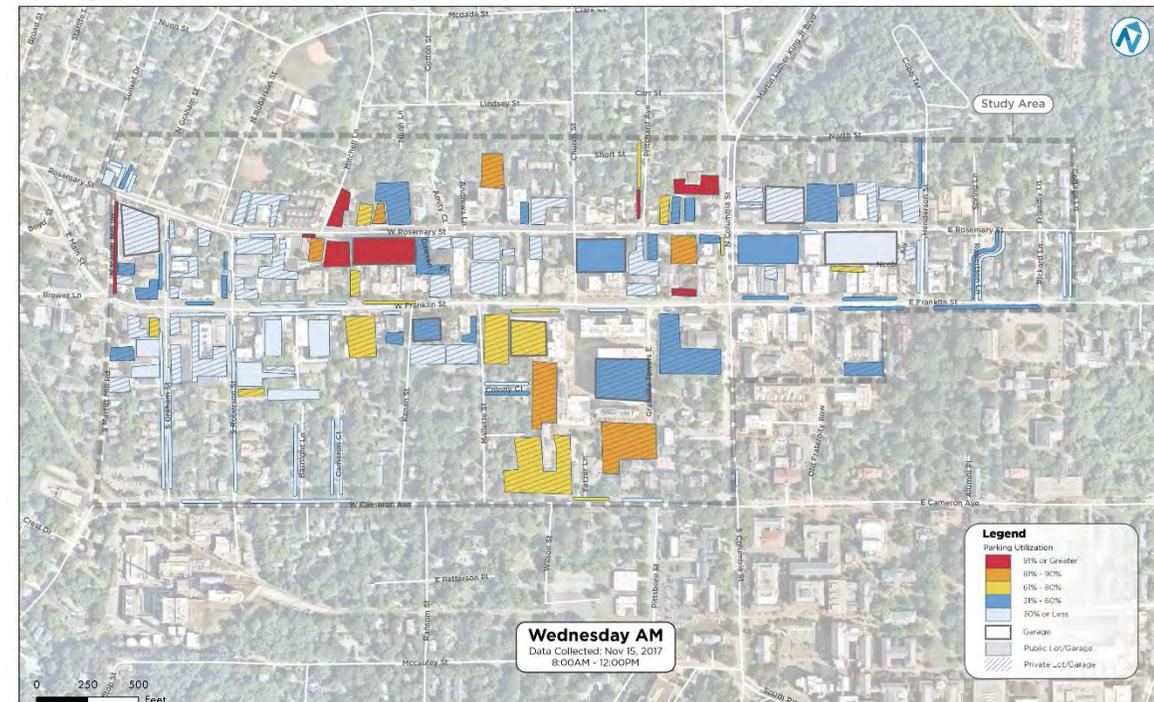
LOCAL KNOWLEDGE

Parking studies in Chapel Hill and Durham, NC

- Comprehensive parking supply and utilization surveys
- In-depth management, enforcement, and policy review
- Innovative strategies recognizing emerging mobility trends
- Actionable recommendations with implementation strategies tailored to local context
- Emphasis on livable, walkable town centers/downtown

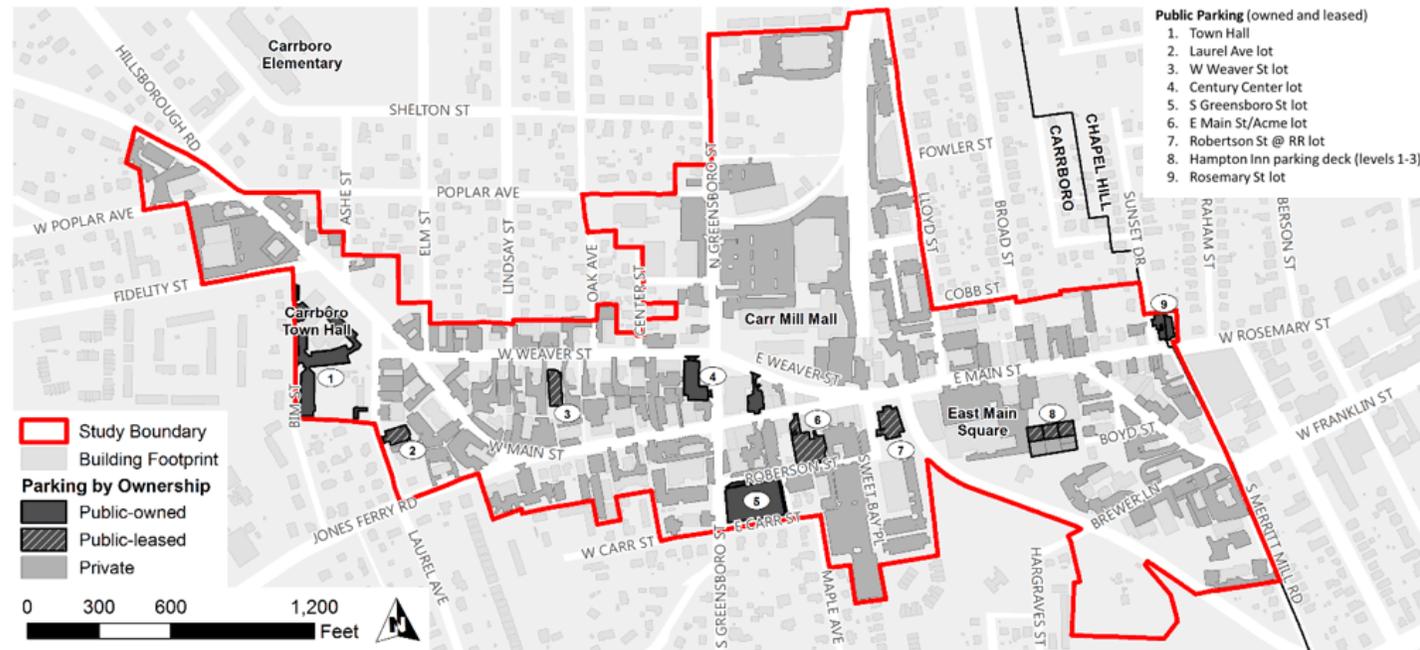


Chapel Hill Downtown Parking and Circulation Study — DRAFT



PARKING IN CARRBORO

- Carrboro Downtown Parking Plan, 2017
 - Town controls a small percentage (16%) of existing parking
 - Surplus parking exists under existing conditions and future scenarios
- Transform prior parking management recommendations into positive outcomes
 - Price for demand to increase use of low-demand areas, increase high-demand turnover
 - Streamline payment, enforcement, and rate structure
 - Promote alternatives to driving and parking



SITE SPECIFIC AND SYSTEM WIDE APPROACH

- Determine the necessary parking program
 - Mixed of uses
 - Assessment of need
- System wide approach
 - Park-Once
 - Wayfinding
 - Regulation
 - Communication
- Factor in innovative parking practices



Parking study finds that Carrboro has a surplus of spots



There are differing opinions as to whether or not the town of Carrboro has sufficient parking. [Alex Robinson / THE DAILY TARI HEEL](#)

SHARE

- SHARE
- TWEET
- MAIL

BY HANNAH WISLA
Contrary to popular belief, Carrboro has plenty of parking — spots just aren't particularly accessible.
According to a study presented at the Carrboro Board of Aldermen meeting on Feb. 21, on a typical weekday, Carrboro has a surplus of 1,281 spaces downtown. Only 236 of these spaces are public.

PREPARING FOR THE FUTURE

- Shared Parking Opportunities
 - Use of public & private facilities
 - Shared supply

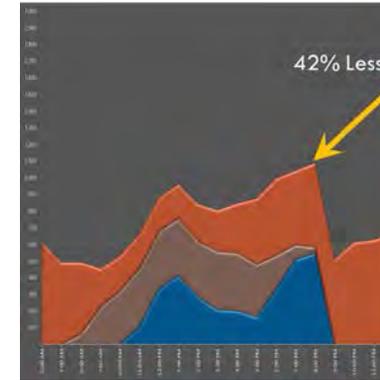
Case Study - Oakland West Elm Site

- Hotel (160rms), apartments (72 units), retail (20,000gsf)
- 129 shared use parking spaces
- 30% below zoning code requirements

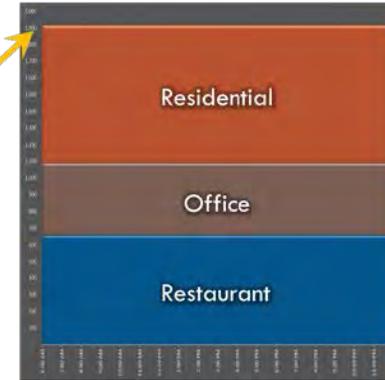
Case Study - Shirlington Library & Theater, VA

- Branch Library (5,000 gsf)
- Signature Theater (115 seats)
- No dedicated parking

Real Demand



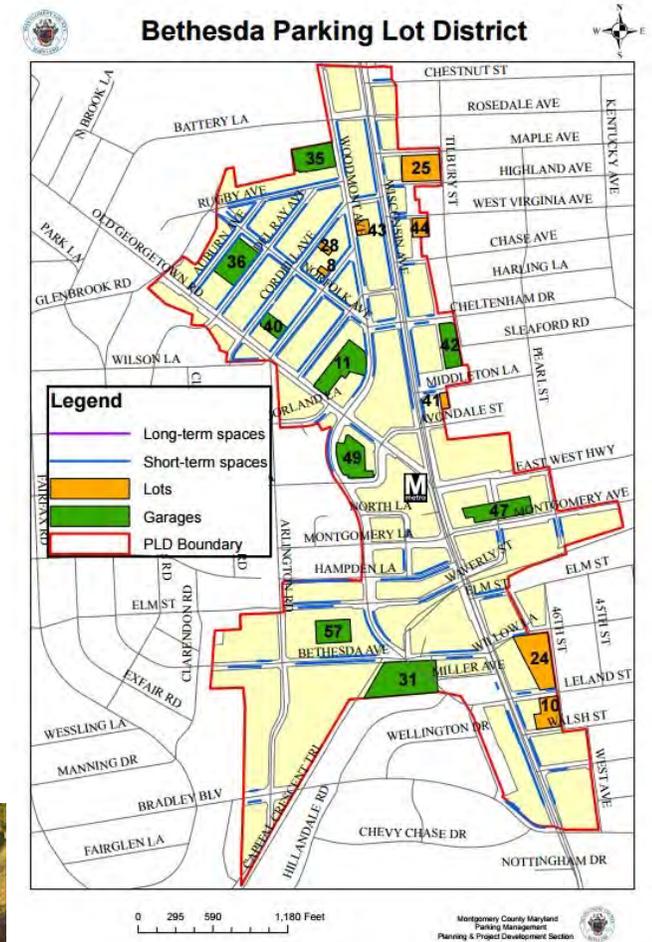
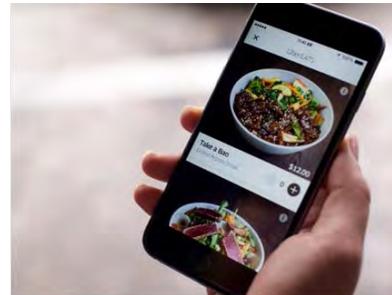
Unshared Supply



PREPARING FOR THE FUTURE

- Parking Districts
 - Montgomery County, MD - Enterprise Fund
 - Ann Arbor, MI - Downtown Development Authority
 - Arlington County, VA – Private sector management
 - Boulder, CO - Improvement District
 - Boston, MA - Transportation Management Association

- Emerging Mobility Trends
 - Car share
 - TNC's (i.e., Uber, Lyft)



STAKEHOLDER ENGAGEMENT

STAKEHOLDER ENGAGEMENT | VISIONING

- Time To Think BIG
- Question Core Assumptions
- Encourage “Interdependent” Thinking
- Focus On Actions + Outcomes
- Step Outside The Library | Art Center Box
- Feedback Loop
- What Is Carrboro Culture?
- Open Dialogue
- Needs/Wants
- Expectation Management
- No surprises “on budget and on time”



PROCESS

Orange County South Branch Library

IMAGINE
Your Southern Branch Library

Share your ideas for the proposed Southern Branch Library at these **Community Engagement Meetings**

Tuesday, March 25 – 6:00 p.m.
Hickory Tavern, 370-110 E. Main Street

Saturday, April 12 – 12:00 p.m.
Carrboro Town Hall, 301 W. Main Street

Your thoughts are wanted regarding the library's proposed location in downtown Carrboro, and its possible appearances and services.

Join the creative process by attending one or both of these hands-on, interactive meetings.

Refreshments served!

More information at:
www.orangecountync.gov/library/southernbranch.asp
www.facebook.com/OCSouthernBranchLibrary

ORANGE COUNTY PUBLIC LIBRARY
Providing a place and a face to explore, enjoy, and engage.



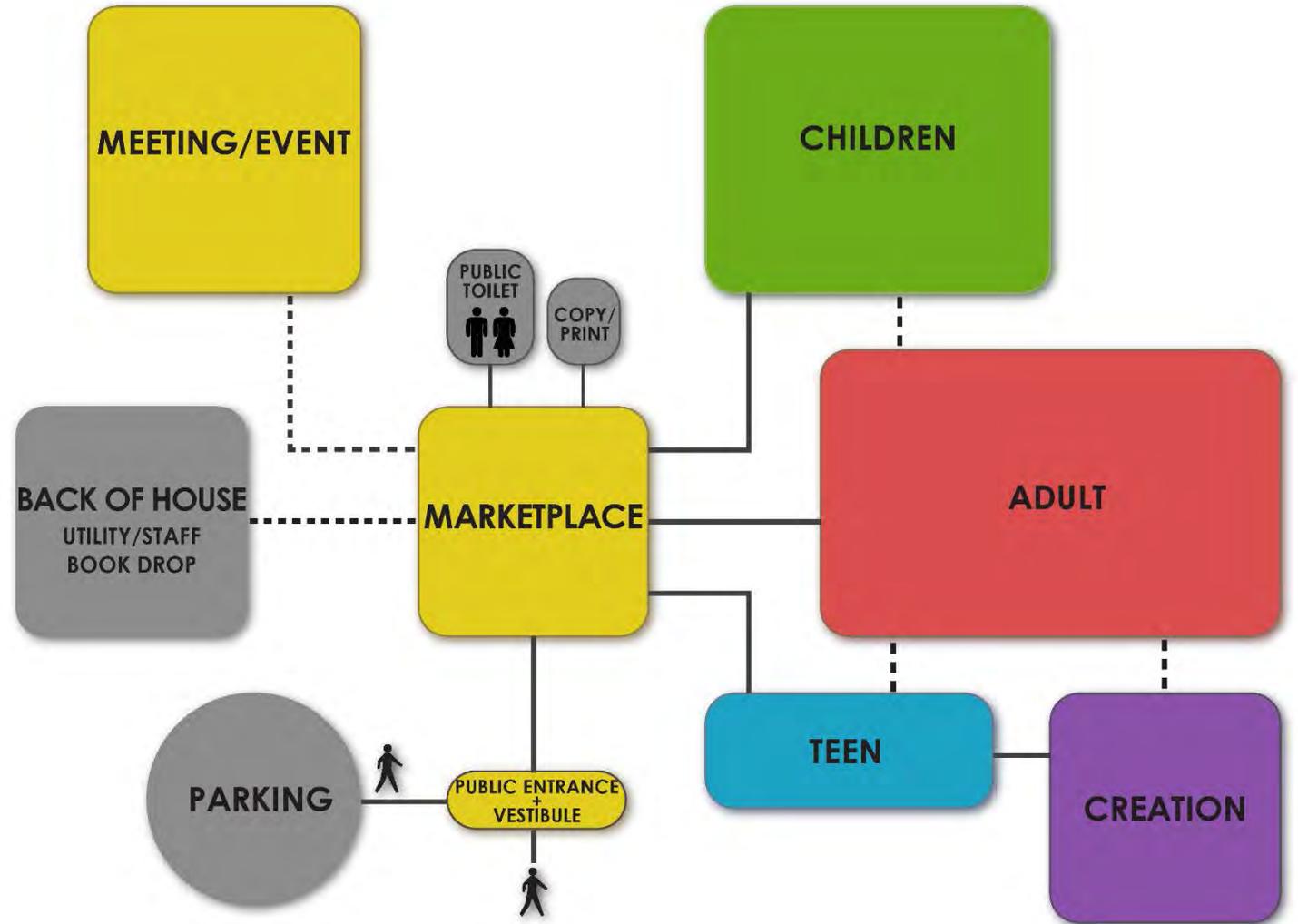
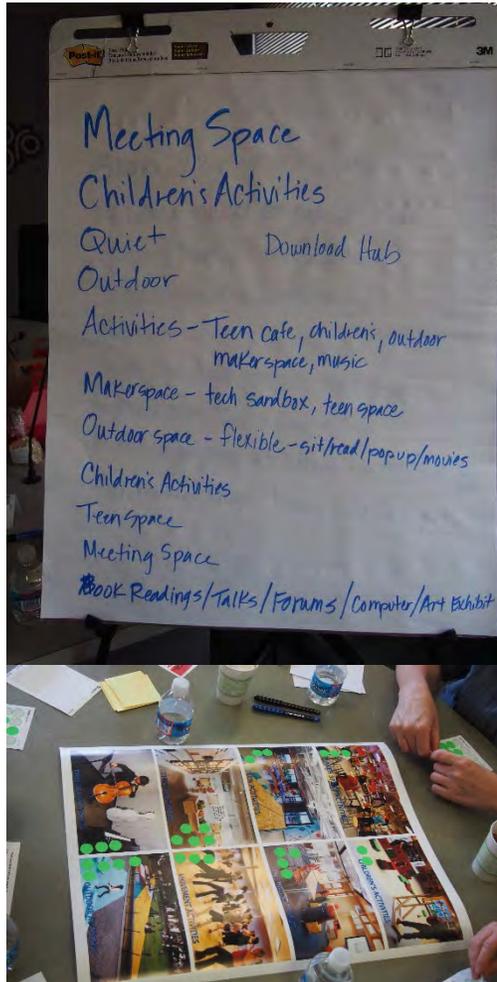
PROCESS

Orange County South Branch Library



PROCESS

Orange County South Branch Library



CASE STUDY

Mississippi Civil Rights Museum



CASE STUDY

Mississippi Civil Rights Museum

GROUNDING

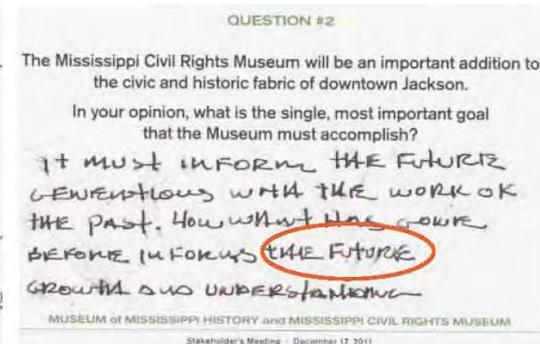
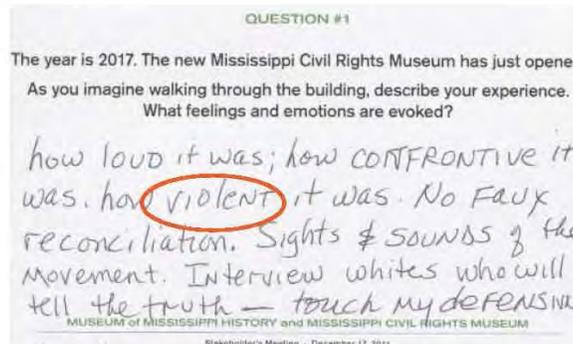
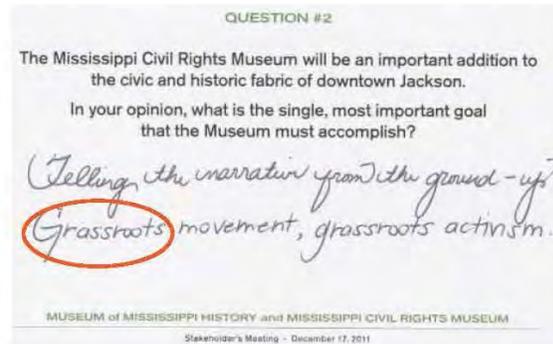
Working the land
The Delta
Springboard
Rooted

BELONGING

Ownership
Rights
Intimidation
Violence

IDENTITY

Sense of Ownership
Stake in the **future**
Recognizing **sacrifices**
Personal Memory
Diversity



CASE STUDY

Mississippi Civil Rights Museum

OPENNESS

Re-telling
Experiential
Dialogue
Honesty

UNVEILING

Reality
Truth
Illumination
Layers

RECONCILIATION

On-going
Healing
Human Rights
Hope
Progress

QUESTION #2

The Mississippi Civil Rights Museum will be an important addition to the civic and historic fabric of downtown Jackson.

In your opinion, what is the single, most important goal that the Museum must accomplish? **HONESTY!!!**

Historically correct facts/accounts of brutality of Caucasians/And how slavery has caused problems/circumstances of today!
EX: African-Americans could not be educated, could not vote, could not marry, could not have proper hospital privileges (patients and of color)!!!

MUSEUM OF MISSISSIPPI HISTORY and MISSISSIPPI CIVIL RIGHTS MUSEUM
Stakeholder Meeting - December 17, 2011

QUESTION #2

The Mississippi Civil Rights Museum will be an important addition to the civic and historic fabric of downtown Jackson.

In your opinion, what is the single, most important goal that the Museum must accomplish?

It must accurately reflect the **reality** and not perception and opinions.

MUSEUM OF MISSISSIPPI HISTORY and MISSISSIPPI CIVIL RIGHTS MUSEUM
Stakeholder Meeting - December 17, 2011

QUESTION #2

The Mississippi Civil Rights Museum will be an important addition to the civic and historic fabric of downtown Jackson.

In your opinion, what is the single, most important goal that the Museum must accomplish?

Reconciliation of our history and our lives. or Help us move in the right direction toward Reconciliation.

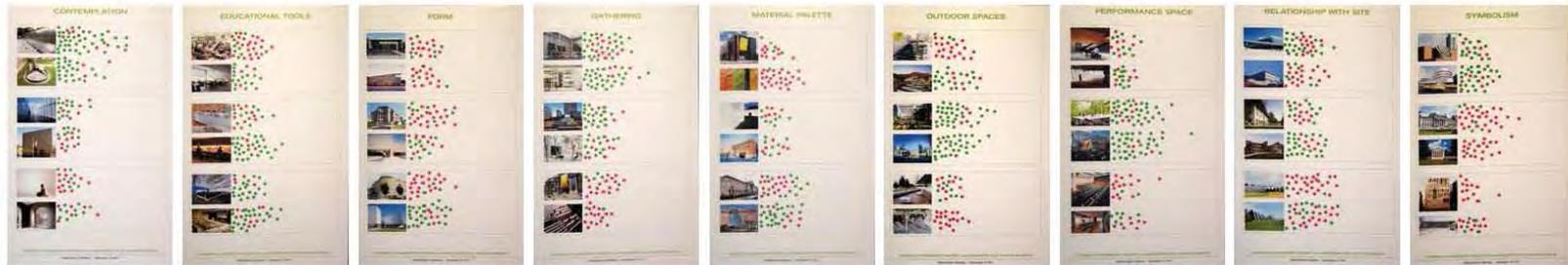
MUSEUM OF MISSISSIPPI HISTORY and MISSISSIPPI CIVIL RIGHTS MUSEUM
Stakeholder Meeting - December 17, 2011



CASE STUDY

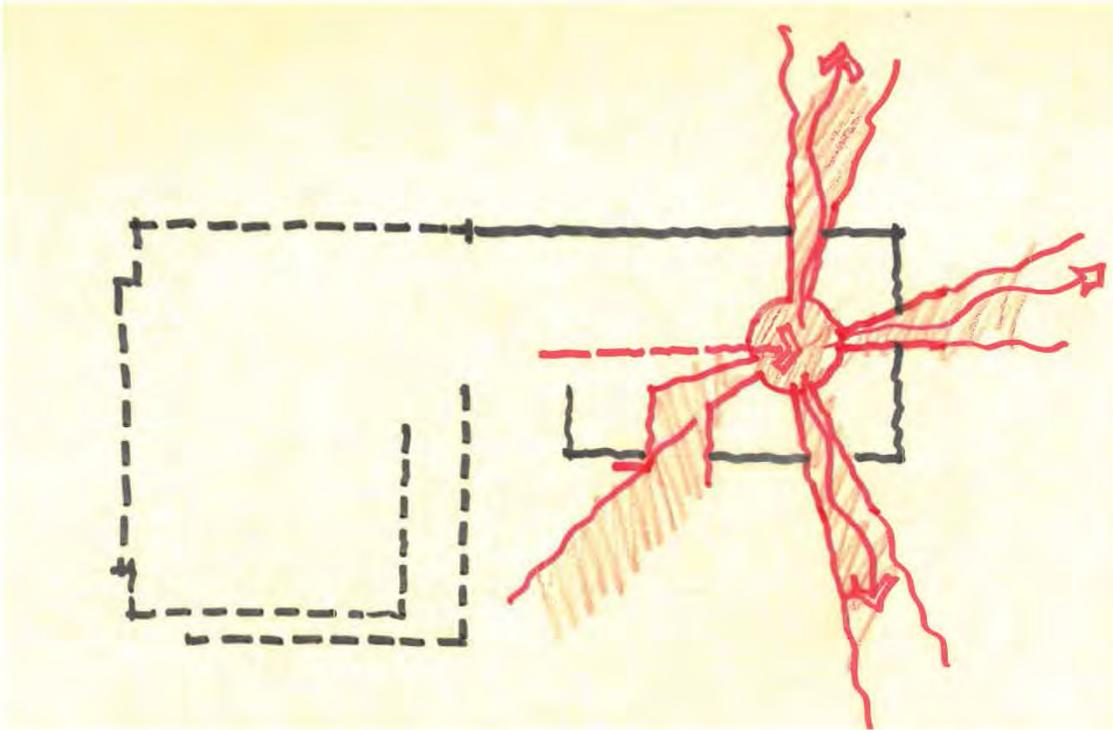
Mississippi Civil Rights Museum

PRECEDENT BOARD PREFERENCES



CASE STUDY

Mississippi Civil Rights Museum



MISSISSIPPI CIVIL RIGHTS MUSEUM

The Mississippi Civil Rights Museum's exterior character and internal organization cohere to represent a core that is illuminated by the light of truth.

The core, which on the exterior takes the form of an oculus on the roof, marks the center of the permanent exhibit "This Little Light of Mine" space.

Framed carve-outs on the east, west and south elevations allow light and views into the central exhibit space and in so doing, refer to a multi-directional conversation between the core (Mississippi's population) and all those outside the museum who experience the light emanating from within that core.

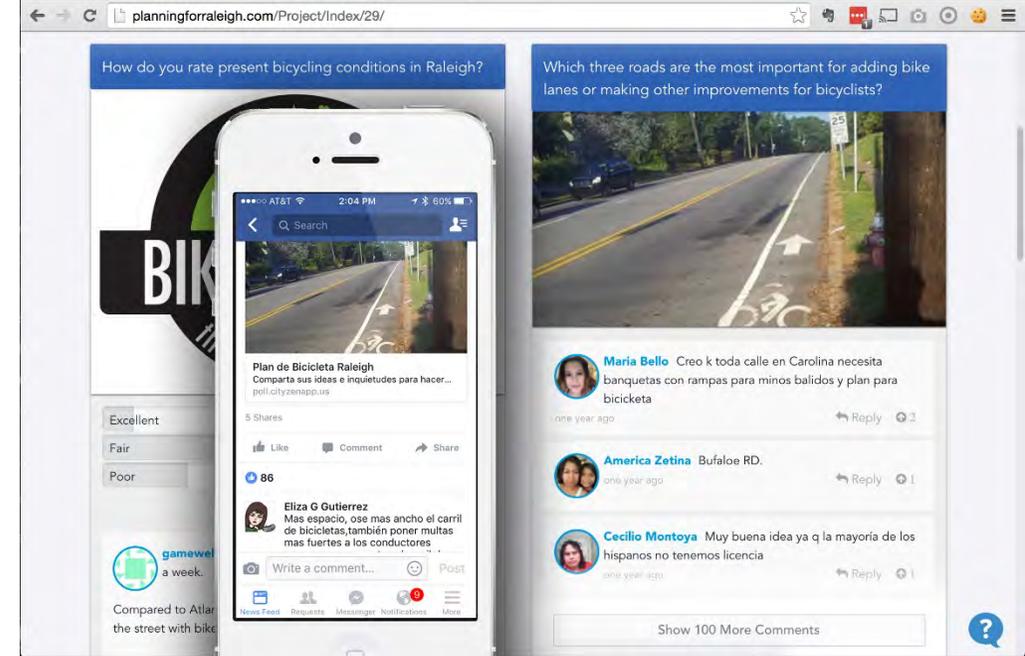
The exterior expression is tied to imagery that juxtaposes the solidity of tradition and history with the intervention of violence and hope.

ENGAGEMENT SOFTWARE – DATA GATHERING

Much attention is paid to crafting meaningful survey questions and targeting low participation groups (via geotargeting) prior to public meetings being held

A project website can aggregate the following data:

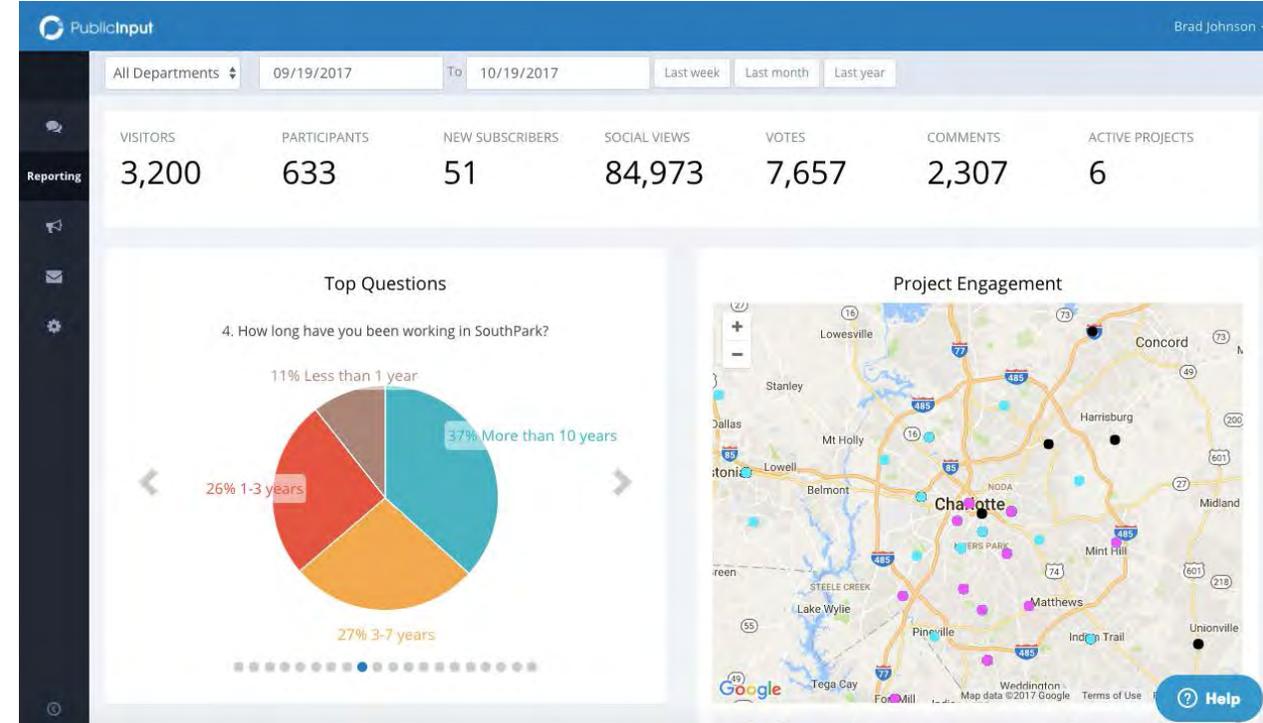
- Web Surveys
- Text Surveys
- Paper Surveys
- In-Meeting Participation
- Community Event Kiosks
- Emails Received by the Project Team



ENGAGEMENT SOFTWARE – DATA ANALYSIS

“Mayor Mode” view gives stakeholders high-level understanding of total participation

Survey updates and improvements based on data analysis



Data Insights

Cross-Tab Builder

Select a poll question and optional cross-tab polls:

What District do you live in?

Which of these Spirit of East Austin topics is most important to you?

Customize text shown:

Of voters who selected "District 1" to "What District do you live in?", 35% answered "Mixed-Income Housing & Inclusive Culture" to "Which of these Spirit of East Austin topics is most important to you?"



Of voters who selected District 1

35%
answered

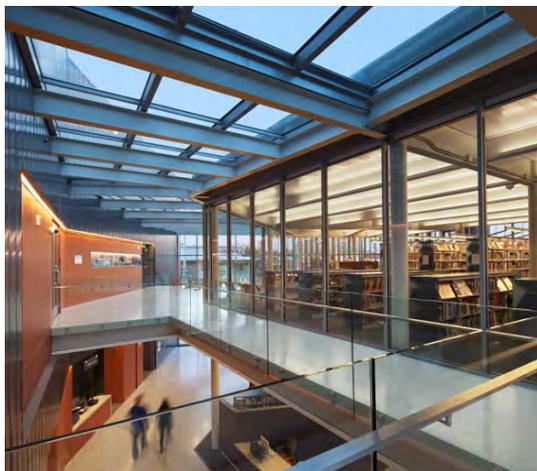
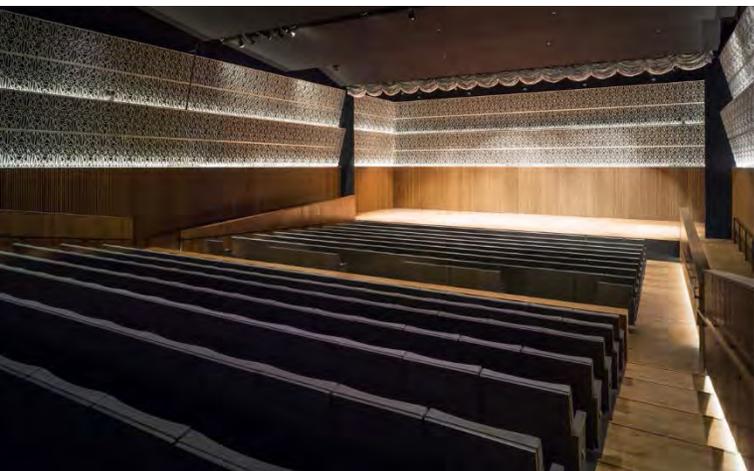
Mixed-Income Housing & Inclusive Culture

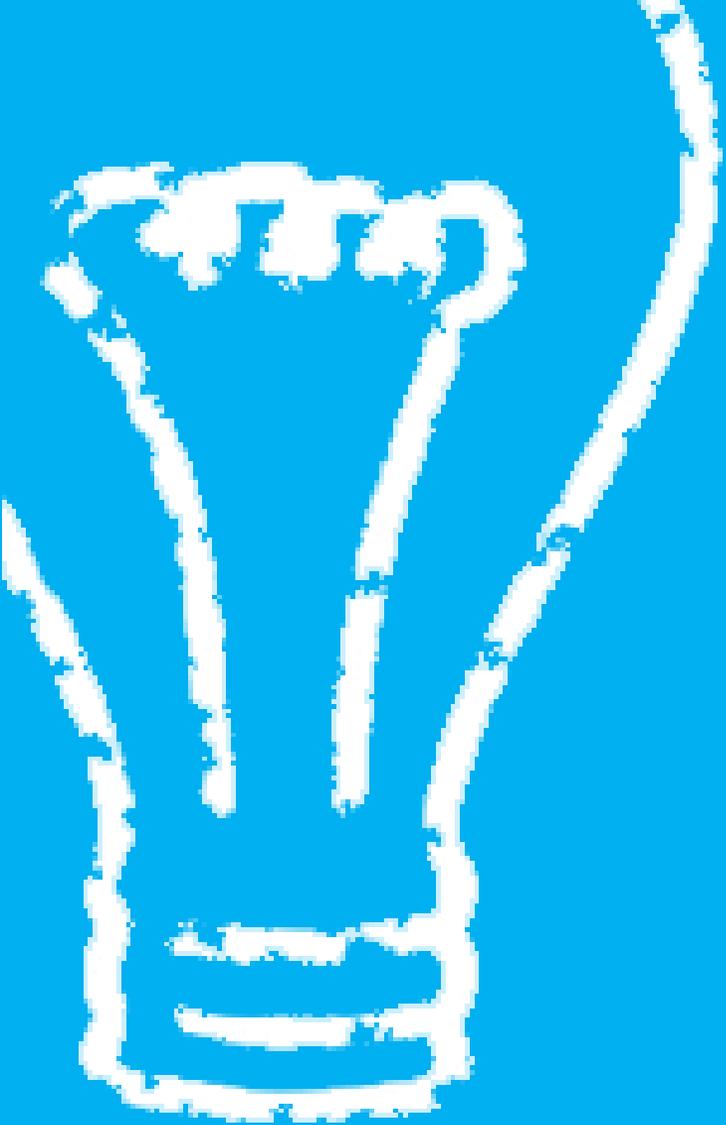
to Which of these Spirit of East Austin topics is most important to you?

(82 voters)

Save as New Insight

MIXED-USE + HYBRID PROGRAMS





HOW CAN WE DO

MORE WITH LESS?

HOW CAN WE DO
MORE WITH LESS?

YOUNG LIBRARY, HOUSTON TX
Hybrid Judicial Courts



ALBION LIBRARY, TORONTO

Hybrid Market



DOUGLAS SCHUMAN LIBRARY, BOSTON MA

Hybrid Student Center



TENLEY LIBRARY, WASHINGTON DC

Hybrid Commercial Development



Phase 1



Future Vertical Development

NORTHTOWN LIBRARY, CHICAGO IL

Hybrid Senior Housing



ROUTE 9 LIBRARY, NEW CASTLE DE
Hybrid Innovation Center



ROUTE 9 LIBRARY

BOOKATARIUM

BOOKS

MEDIA

EXPLORATION SPACE
SENSORY ROOM
TEEN AREA



COPIES



CHILDREN



Bookatarium: Immersive Story-time



LEGO Studio



Sensory Room

CREATE



Make | Create | Tinker

Gaming

Scriptorium: Writing Skills

PARTNER



Culinary Arts Partnership



Performing Arts



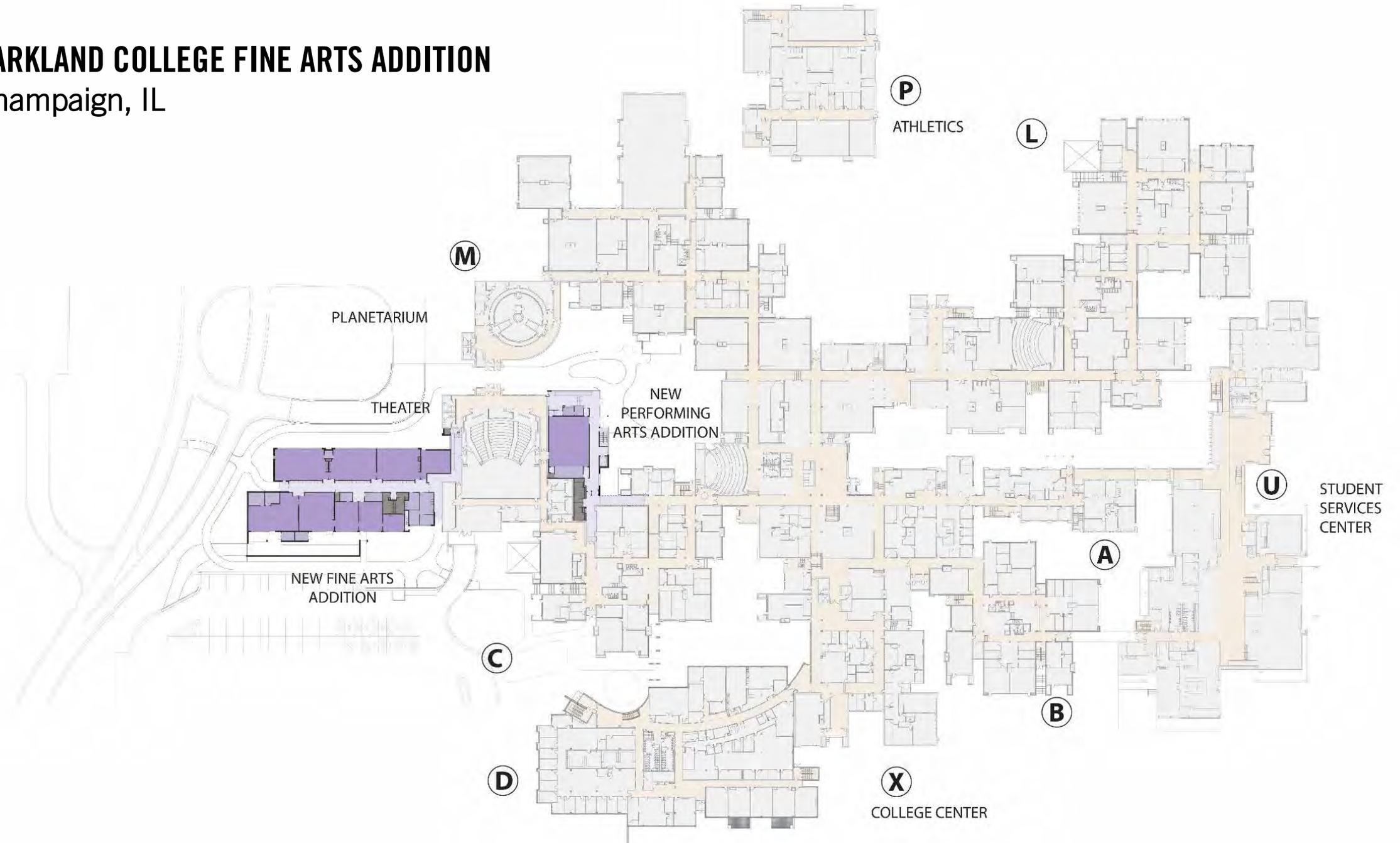
Technology Skills Training

PARKLAND COLLEGE FINE ARTS ADDITION
Champaign, IL



PARKLAND COLLEGE FINE ARTS ADDITION

Champaign, IL









NCSU GREGG MUSEUM OF ART + DESIGN

Raleigh, NC



1903

Thomas E. Cabaniss Gallery
The Gregg Museum of Art + Design





LIBRARY + ARTS CENTER?

TAKEAWAYS

DESTINATION TO PATHWAY

MULTIPLE ACCESS POINTS

POROUS BOUNDARIES | SHARED AMENITIES

FLEXIBLE SEGMENTATION

SCALABLE INFRASTRUCTURE

POWER OF PARTNERSHIPS

BOOKATARIUM

THANK YOU!

PERKINS+WILL



SUGAR HILL REDEVELOPMENT

Detroit, MI

PROJECT SITE

JOHN R ST.

E FOREST AVE

WOODWARD AVE.

E HANCOCK ST.





TRASH ROOM

- Thornless Honey Locust
- Precast Concrete Seat Wall
- Paper Bark Birch, typ.

RETAIL

- Precast Concrete Pavers (Dark Grey, to match sidewalks)
- Bistro Seating, typ.
- Precast Concrete Pavers (Gray Mix)
- Hammock Grove

GREEN ALLEY

- Extensive Green Roof (above)
- Precast Concrete Pavers (to match existing)

STORAGE

- Fixed Urban Seating, typ.
- Precast Concrete Seat Wall

PASS THRU

RETAIL

- Existing Tree (to remain, typ.)
- Precast Concrete Seat Wall
- Prairie Groundcover Plant Mix:
 - Butterfly Weed
 - Black Sedge
 - Northern Sea Oats
 - Wavy Hair Grass
 - Little Bluestem
 - Prairie Dropseed

- CIP Concrete Sidewalk
- Swamp White Oak, typ. (limbed up)



