

West Elizabeth Enhanced Travel Corridor Plan



Stakeholder Committee

Meeting #5
June 8, 2016

Table of Contents / Agenda

Welcome.....1

Planning Process & Schedule.....2

Presentation Slides.....3

Next Steps.....15

Appendix

 A. Meeting #4 Summary

 B. Phasing Summary

Contact Info:

Amy Lewin
Senior Transportation Planner
alewin@fcgov.com
(970) 416-2040

Emma Belmont
Transit Planner
ebelmont@fcgov.com
(970) 224-6197

Rachel Prelog
FC Moves Intern
rprelog@fcgov.com
(970) 416-4223

**PAGE INTENTIONALLY
LEFT BLANK**

Welcome

Welcome to Stakeholder Meeting #5! Thank you for your continued commitment to the West Elizabeth Enhanced Travel Corridor Plan process.

This packet provides a summary of the work completed on the West Elizabeth Enhanced Travel Corridor Plan since the fourth Stakeholder Committee Meeting (February 2016). Since our last meeting the project team has refined the Recommended Design and implementation planning based on your input and other public outreach. The project team has also started seeking funding for implementation of some elements through the City's 2016-2017 Budgeting for Outcomes (BFO) process.


During this meeting we will share the latest Recommended Design with the understanding that some elements will likely evolve based on your and other public feedback.

As a reminder, these packets will also be made available online so others can participate in the process and provide additional input. We highly encourage you to talk with your neighbors, friends, family, and colleagues about their ideas for the future of the West Elizabeth Corridor.

Process & Schedule

Planning Phase	Date	Stakeholder Committee Activities	Public Activities & Events
Phase 1: Project Startup & Corridor Understanding	Mar - July 2015	Stakeholder Committee Selection; Stakeholder Committee Meeting #1 (<i>July</i>)	Listening Sessions; Walking Tours; WikiMap; Online Survey
Phase 2: Visioning, Design Approach Development & Evaluation	July - Jan 2016	Stakeholder Committee Meeting #2 (<i>September</i>) Stakeholder Committee Meeting #3 (<i>December</i>)	Visioning Events; Alternatives Open House; Online Survey
Phase 3: Recommended Design & Implementation Planning	Jan - Apr 2016	Stakeholder Committee Meeting #4 (<i>February</i>)	Questions of the Week; Community Presentations
Phase 4: Draft Master Plan & Adoption Process	Apr - <i>Aug</i> 2016	Stakeholder Committee Meeting #5 (<i>June</i>)	Recommended Design Open House & Online Feedback; Draft Plan Online Feedback; Community Presentations; City Council Adoption Hearing


Presentation Slides



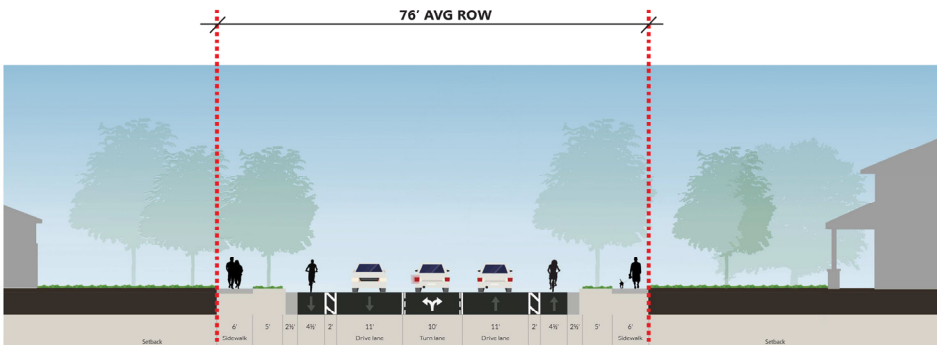
Vision, Purpose & Need

- **Be unique and adaptable** to the distinctive characteristics of each corridor segment.
- **Be safe and comfortable** for all users.
- **Encourage and prioritize public transportation** and active transportation options.
- **Support the interconnectivity** of all modes.
- **Be a beautiful and vibrant** environment.

3

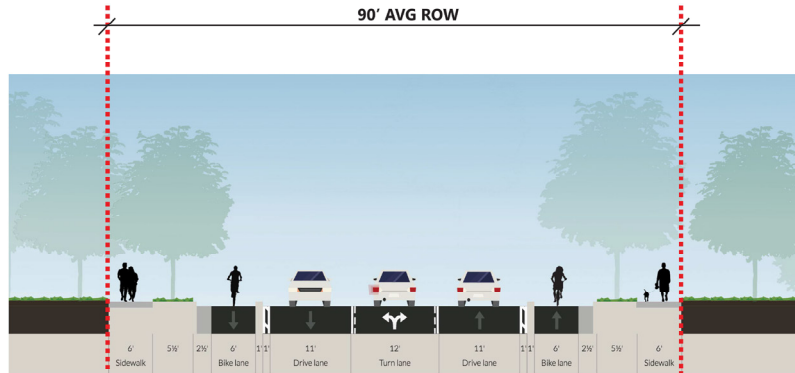


Recommended Design

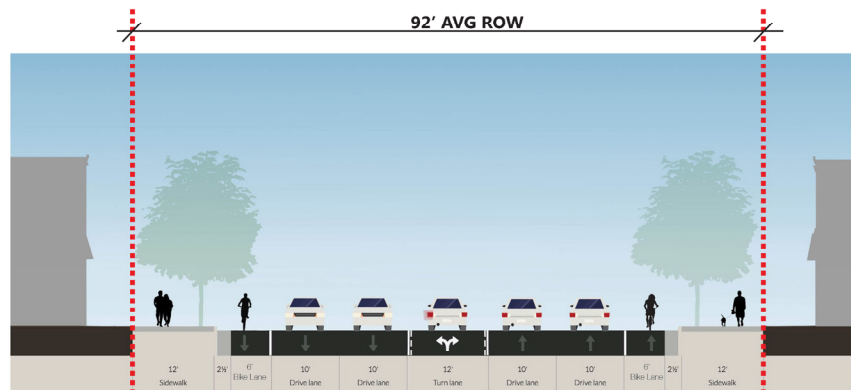


Section A: Overland Trl to Taft Hill Rd
*Interim condition: attached walk as needed

4

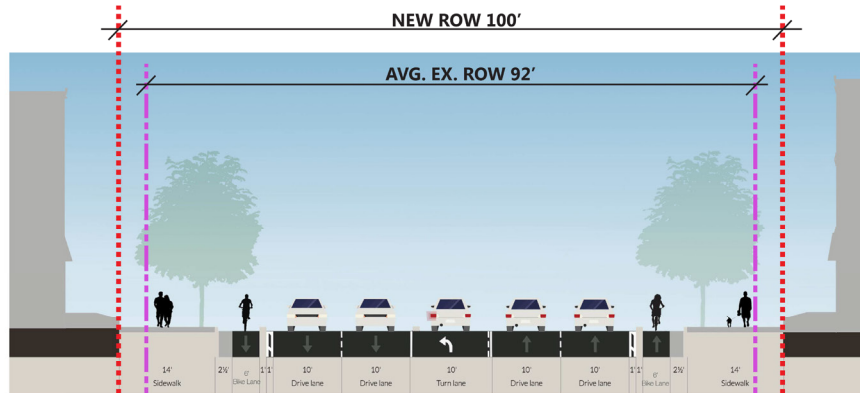


Section B: Taft Hill Rd to City Park



Section C: City Park to Shields St

Campus West – Recommended Design with Redevelopment



Section C: City Park to Shields St*

*Phase 4 - Redevelopment Section

Recommended Design



Overland Trail, CSU Equine Center aerial view

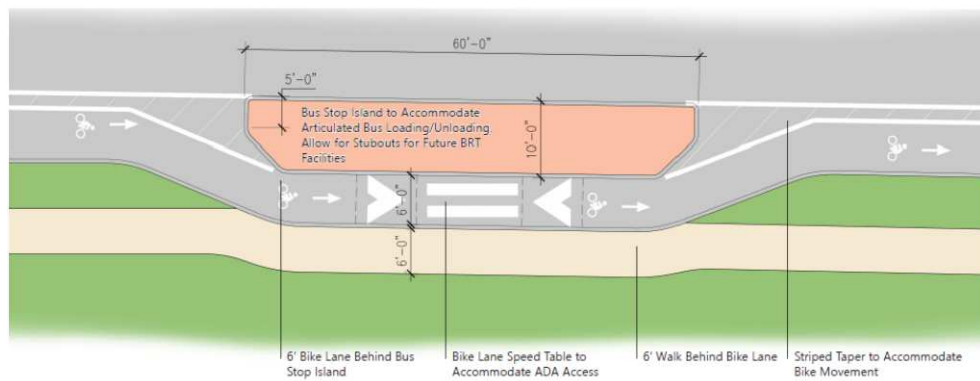
Recommended Design



West of Taft Hill Road aerial view

9

Recommended Design



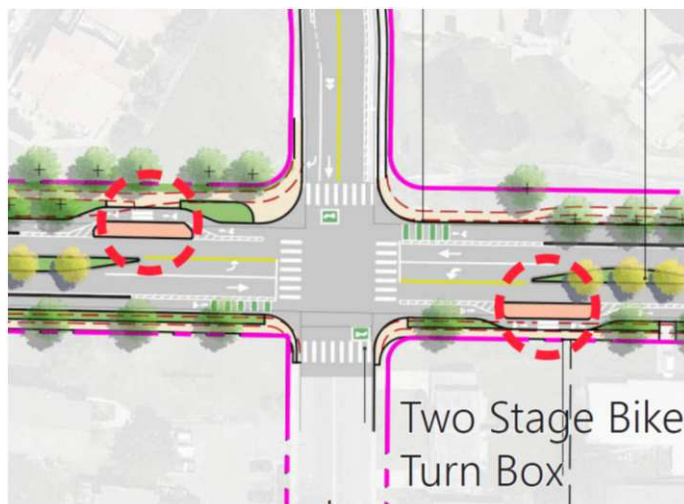
Bus stop island aerial view

10



Taft Hill Road intersection aerial view

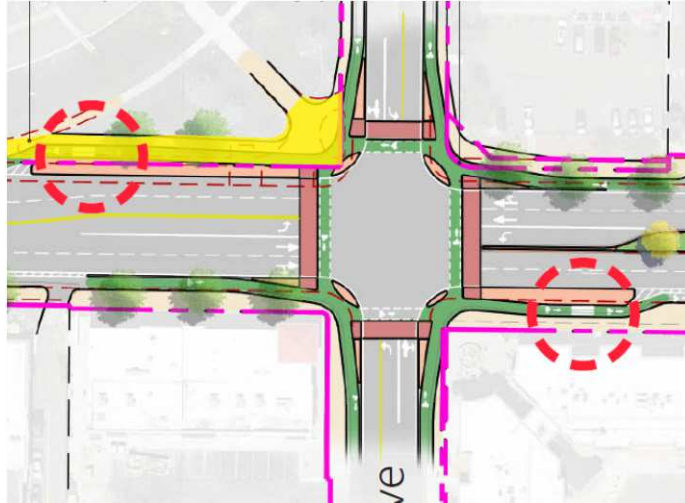
11



Two Stage Bike
Turn Box

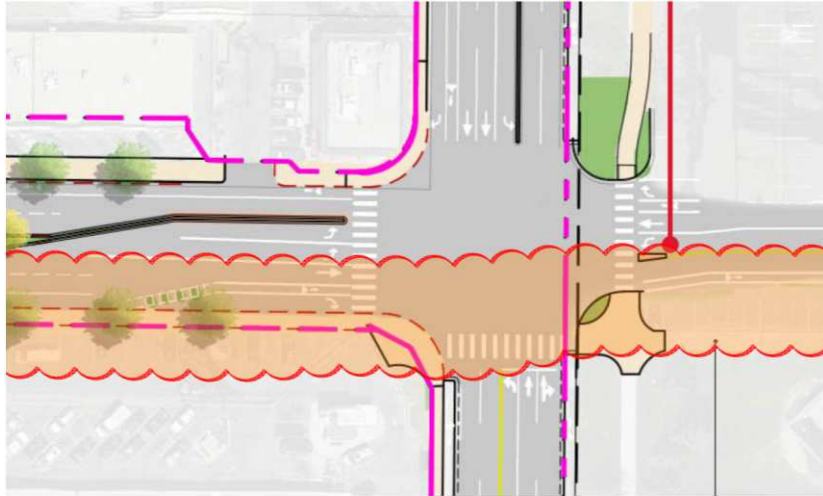
Constitution Drive intersection aerial view

12



City Park Avenue protected intersection pilot aerial view

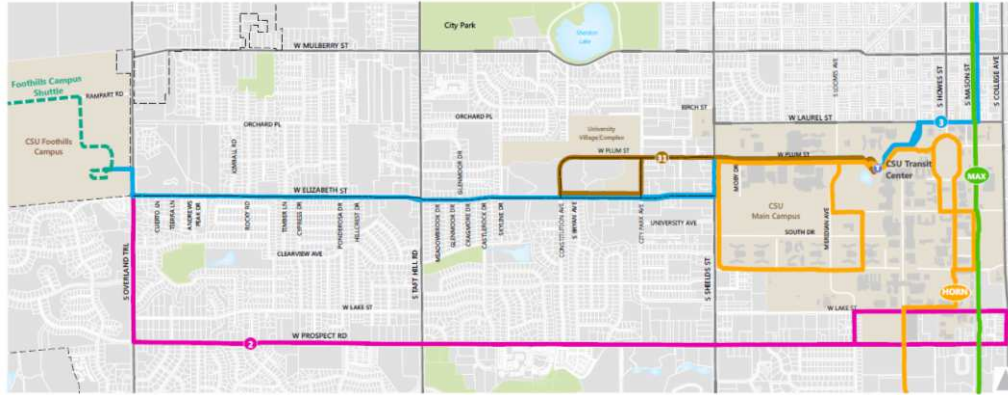




Shields Street intersection aerial view



Campus West aerial view



Transit routes



Pedestrian LOS before

Pedestrian LOS with recommended design



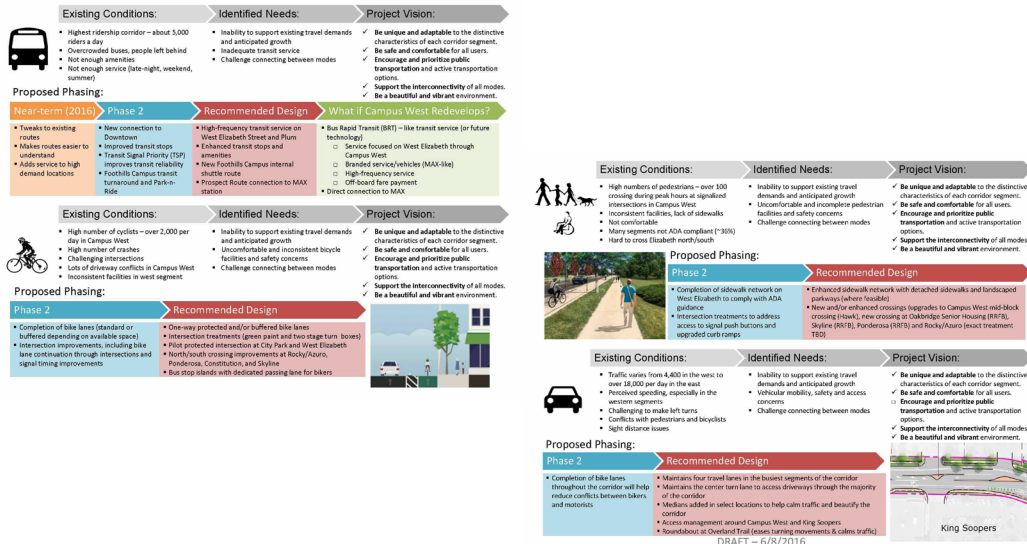
Bicyclist LTS before



Bicyclist LTS with recommended design

- Phase 1 – 2016 – transit service improvements
- Phase 2 – Budgeting for Outcomes (target 2017/18)
- Phase 3 – Recommended Design
- Phase 4 – *What if Campus West redevelops?*

Phasing Summary



21

Cost Estimates

- Phase 1 – 2016 – transit service improvements
\$0-\$315,000
- Phase 2 – Budgeting for Outcomes (target 2017/18)
\$2-4 million
- Phase 3 – Recommended Design
\$12-24 million
- Phase 4 – *What if Campus West redevelops?*

22

- Potential City sources:
 - Budgeting for Outcomes
 - Building on Basics 3.0?
- Federal programs:
 - Congestion Mitigation and Air Quality Improvements (CMAQ)
 - Transportation Alternatives Program (TAP)
 - Transportation Investment Generating Economic Recovery (TIGER)
 - Federal Transit Authority grants (Section 5309 “Small Starts”)

- Break into three groups
- Spend 10 minutes per table, rotate (30 minutes total)
- Regroup and debrief

Roundtable

- How well did we meet the corridor's Vision, Purpose & Need?
- Of what do you think the community will be **most supportive**?
- Of what do you think the community will be **least supportive**?

- **Be unique and adaptable** to the distinctive characteristics of each corridor segment.
- **Be safe and comfortable** for all users.
- **Encourage and prioritize public transportation** and active transportation options.
- **Support the interconnectivity** of all modes.
- **Be a beautiful and vibrant** environment.

Next Steps

Tasks

- Finalize Recommended Design
- Draft the final Plan
- Continue to seek funding for implementation

Public Outreach

RECOMMENDED DESIGN OPEN HOUSE

June 16, 6-8 pm

Westminster Presbyterian Church

1709 W. Elizabeth St.

BOARDS & COMMISSIONS

June – August

PUBLIC PLAN REVIEW

June – July

CITY COUNCIL ADOPTION HEARING

August 16

City Council Chambers

**PAGE INTENTIONALLY
LEFT BLANK**

Appendix A

Meeting Notes

Stakeholder Committee Meeting #4

West Elizabeth Enhanced Travel Corridor Plan
February 10, 2016 – 6:00-8:00 pm

Present:

Aaron Buckley
Madi Book
Gail McKee
Bonnie Michael
Justie Nicol
Gene Schoonveld
Jordan Sowell
Dave Thomas

Absent:

Alison Anson
Rick Callan
Laurel Grimm
Jay Henke
Edward Kendall
Troy Ocheltree
Peter Rhoades
Jean Robbins
Michael Werner

Staff & Consultants:

Charles Alexander, Fehr & Peers Associate
Emma Belmont, Transfort Transit Planner
Amy Lewin, FC Moves Senior Transportation Planner
Rachel Prelog, FC Moves Intern
Carly Sieff, Fehr & Peers Transportation Planner

Agenda

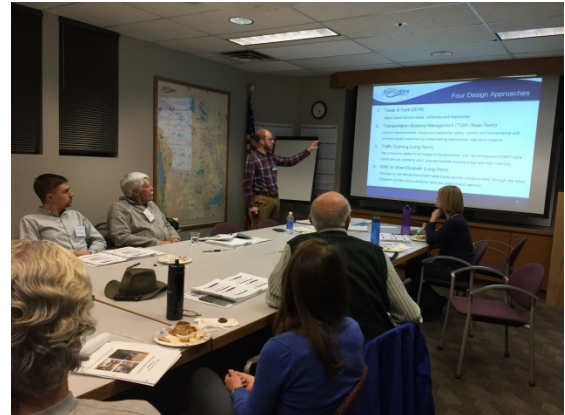
6:00-6:10 – Dinner, settle-in
6:10-6:20 – Introductions, Project update/review
6:20-7:30 – Design approach development, evaluation and recommendations
7:30-7:50 – Keypad polling
7:50-8:00 – Roundtable discussion

Stakeholder committee members were provided workbooks which served as a tool to help guide participants through the information presented in the agenda above. This included general information relevant to the plan as well as specific activities and information pertinent to the current planning activities.

Comments

City Council Work Session

- Are you set on the agenda?
 - Yes but don't know the exact time we will present.
- Is it open to the public?
 - There is no public comment allowed but you can attend or watch on Cable14.



Transportation System Management

- Is this something like benches at stops?
 - Yes, low cost investments.
- Access Management – how are delivery trucks going to be accommodated? They currently park in the center turn lane to make deliveries.
 - We have heard that concern and will investigate more.
- Transit – Has anyone talked about putting another bus stop on Elizabeth closer to Shields.
- Is there going to be a dedicated right turn at Shields?
 - That is not part of our intersection operation we're proposing.
- 2 stage turn boxes – Is this like what's out on Heatheridge?
 - No, we actually don't have any 2 stage turn boxes anywhere in the city yet.
- Transit signal priority – Is this what emergency vehicles use? Does MAX have this?
 - That is preemption; emergency vehicles have more priority than what we're considering.
 - MAX uses TSP at some intersections.



Traffic Calming

- Roundabouts – How much do you communicate with the Streets department? I read a roundabout is getting constructed at Constitution and Elizabeth this summer?
 - We work closely with Traffic Operations and have not heard of any plans. We will look into this.
- Leading pedestrian interval – What about right turn limits to allows pedestrians their own signal phase?

- One-way protected bike lane – So you need to address snow removal and plowing with this option.
 - Yes, we are talking to Streets and working through options.
- One-way protected bike lane – Is there room to do parking protected bike lanes?
 - No, not while remaining in the ROW or removing a travel lane.
- Protected intersection – Is this similar to Remington and Laurel bulb outs?
 - That is a roundabout with sidewalk bulb out. This is a different concept.

MAX on West Elizabeth

- Bus-only lanes – Is this during peak hours or all the time?
 - We analyzed for peak hours but it could be all the time.
- Transit alignment through CSU – What are the benefits of going through CSU?
 - It's faster, more central to campus, better for events and service to the stadium.
- Transit alignment through CSU – It doesn't fit CSU's vision for a vehicle free, pedestrian/bike corridor.
- Transit alignment through CSU – Is it going in between the library and the student center?
 - Yes
- Transit alignment through CSU – Things could really change when the stadium is built and traffic flow changes.

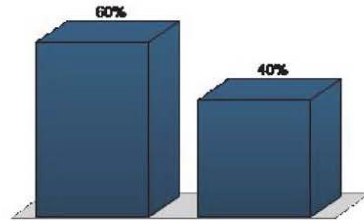
Level of Service Evaluation

- So in all the approaches we're seeing more delay for driving?
 - There would be more delay to key approaches on some streets.
- What is the notation about dual left turn lanes at Shields and Elizabeth? There are already two left turn lanes at that intersection.
 - This would create separate left turn lanes and a separate through lane. Currently one of the left turn lanes is a left and through.

Keypad Polling

1. Which bicycle facility would you prefer on West Elizabeth between Shields and City Park, considering safety, comfort and ease of travel? (Multiple Choice)

	Responses	
	Percent	Count
Raised protected bike lane (vertically separated from motor vehicle traffic)	60%	6
In-street protected bike lane (separated from motor vehicle traffic by a planter or raised curb)	40%	4
Totals	100%	10

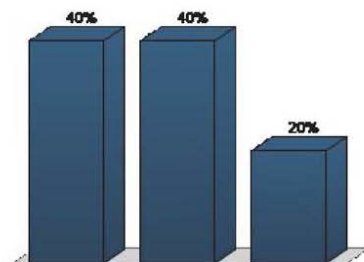


Comments

- Raised – When they cross intersections it would slow cars down. If they remained raised.
- Raised – They're better because they're separated
- Raised – The raised grade would keep water from flowing down onto them and freezing.
- In-street – Are they going to be wide enough to pass?

2. Do you support center landscaped medians in the western portion (Hillcrest Drive to Overland Trail) of the corridor? (Multiple Choice)

	Responses	
	Percent	Count
I support medians, even where they may block residential driveways	40%	4
I somewhat support medians, but only where they don't block residential driveways	40%	4
I do not support median at all	20%	2
Totals	100%	10

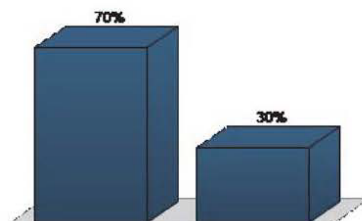


Comments

- I don't think streets west of Hillcrest need it. They would be more of a barrier and present maintenance issues

3. Should primary transit service between Constitution Avenue and Shields Street in the short term be on Plum Street or West Elizabeth Street? (Multiple Choice)

	Responses	
	Percent	Count
Plum Street	70%	7
Elizabeth Street	30%	3
Totals	100%	10

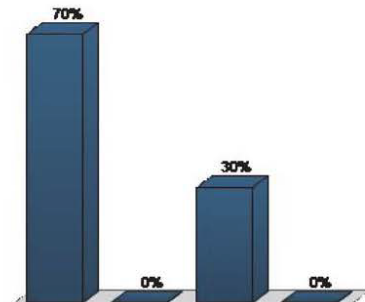


Comments

- Pro Plum – Those apartment buildings drive big demand.
- Pro Plum – That's where the people are.
- Pro Plum –I think switching to Elizabeth in the future makes sense but in the interim it should remain on Plum. We need to work on creating pedestrian connection between Plum and Elizabeth first.
- Pro Elizabeth – It's the economic center. All the students that live there, eat there. It's only a block away, a short walk.
- Pro Elizabeth – You guys are taking away my access (Campus West busniesses) but I'm not getting the increased foot traffic from transit.
- Pro Elizabeth – We need to increase the vibrancy of the street.
- Pro Elizabeth – Why does it have to be one or another?
- Pro Elizabeth – For international students walking a short distance to transit is no big deal.
- Pro Elizabeth – I think you need to be specific about your timeframe.

4. Roundabouts are being considered at West Elizabeth Street/Taft Hill Road and West Elizabeth Street/Ponderosa Drive. Are you in favor of roundabouts along the corridor? (Multiple Choice)

	Responses	
	Percent	Count
Yes, at Ponderosa and Overland Trail	70%	7
Only at Ponderosa	0%	0
Only at Overland Trail	30%	3
Not at all	0%	0
Totals	100%	10

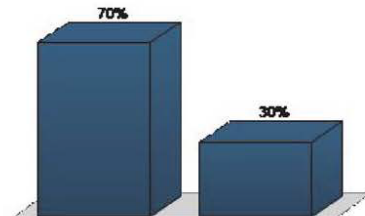


Comments

- Not at Ponderosa – It's really tight. It seems too far west.
- Yes at Ponderosa – I live on Ponderosa and support it.
- Yes at Ponderosa – The intersection is currently too big. You have to pull way out to see traffic coming.

5. A Park and Ride facility at CSU Foothills will require a 12-15 minute bus ride from West Elizabeth Street and Shields Street to the facility. Do you think a Park and Ride facility off of West Elizabeth Street and Overland Trail will get adequately used? (Multiple Choice)

	Responses	
	Percent	Count
Yes	70%	7
No	30%	3
Totals	100%	10

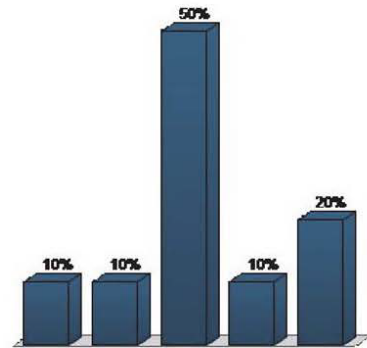


Comments

- No – Day to day it absolutely won't get used. Maybe on game days
- No – Not that many people are coming from the north/south.

6. The recommended improvements are likely to change the mode that I use to travel along the West Elizabeth corridor. (Multiple Choice)

	Responses	
	Percent	Count
Strongly agree	10%	1
Agree	10%	1
Neutral/ not sure	50%	5
Disagree	10%	1
Strongly disagree	20%	2
Totals	100%	10



Comments

- It's improving conditions for modes I already use (bike, bus, walk)
- If there were protected bike lanes I might consider biking more.
- If I could take the bus Downtown I'd love it.

Roundtable Discussion

What two elements are you the most excited about?

Element	Response
Protected Intersection	7
King Soopers Access Management	3
Completed sidewalk network	3
MAX on West Elizabeth (long-term implementation)	1
1 seat ride to Downtown	1
Two-stage turn boxes	1

What 2 elements are you the least excited about?

Element	Response
Bus only lanes	3
Medians west of Taft Hill	3
Transit focused on Plum rather than Elizabeth (near-term implementation)	2
Haven't done enough to divert traffic off Elizabeth	1
Vehicular delay	1
Pondersosa roundabout	1
Haven't done enough to address the conflicts between cars, bike & peds at Shields	1

Appendix B

Phasing Summary

**PAGE INTENTIONALLY
LEFT BLANK**



Existing Conditions:

- Highest ridership corridor – about 5,000 riders a day
- Overcrowded buses, people left behind
- Not enough amenities
- Not enough service (late-night, weekend, summer)

Identified Needs:

- Inability to support existing travel demands and anticipated growth
- Inadequate transit service
- Challenge connecting between modes

Project Vision:

- ✓ **Be unique and adaptable** to the distinctive characteristics of each corridor segment.
- ✓ **Be safe and comfortable** for all users.
- ✓ **Encourage and prioritize public transportation** and active transportation options.
- ✓ **Support the interconnectivity** of all modes.
- ✓ **Be a beautiful and vibrant** environment.

Proposed Phasing:

Near-term (2016)

Phase 2

Recommended Design

What if Campus West Redevelops?

- Tweaks to existing routes
- Makes routes easier to understand
- Adds service to high demand locations
- New connection to Downtown
- Improved transit stops
- Transit Signal Priority (TSP) improves transit reliability
- Foothills Campus transit turnaround and Park-n-Ride

- High-frequency transit service on West Elizabeth Street and Plum
- Enhanced transit stops and amenities
- New Foothills Campus internal shuttle route
- Prospect Route connection to MAX station

- Bus Rapid Transit (BRT) – like transit service (or future technology)
 - Service focused on West Elizabeth through Campus West
 - Branded service/vehicles (MAX-like)
 - High-frequency service
 - Off-board fare payment
- Direct connection to MAX

Existing Conditions:

- High number of cyclists – over 2,000 per day in Campus West
- High number of crashes
- Challenging intersections
- Lots of driveway conflicts in Campus West
- Inconsistent facilities in west segment



Identified Needs:

- Inability to support existing travel demands and anticipated growth
- Uncomfortable and inconsistent bicycle facilities and safety concerns
- Challenge connecting between modes

Project Vision:

- ✓ **Be unique and adaptable** to the distinctive characteristics of each corridor segment.
- ✓ **Be safe and comfortable** for all users.
- ✓ **Encourage and prioritize public transportation** and active transportation options.
- ✓ **Support the interconnectivity** of all modes.
- ✓ **Be a beautiful and vibrant** environment.

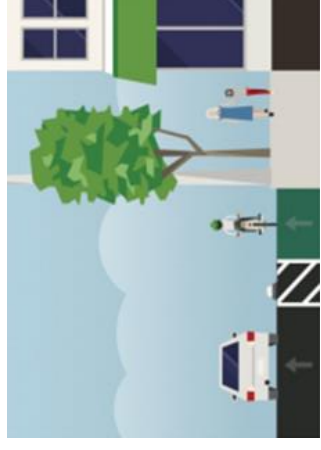
Proposed Phasing:

Phase 2

Recommended Design

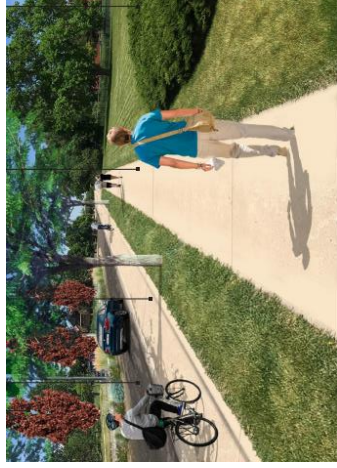
- Completion of bike lanes (standard or buffered depending on available space)
- Intersection improvements, including bike lane continuation through intersections and signal timing improvements

- One-way protected and/or buffered bike lanes
- Intersection treatments (green paint and two stage turn boxes)
- Pilot protected intersection at City Park and West Elizabeth
- North/south crossing improvements at Rocky/Azuro, Ponderosa, Constitution, and Skyline
- Bus stop islands with dedicated passing lane for bikers



Existing Conditions:

- High numbers of pedestrians – over 100 crossing during peak hours at signalized intersections in Campus West
- Inconsistent facilities, lack of sidewalks
- Not comfortable
- Many segments not ADA compliant (~36%)
- Hard to cross Elizabeth north/south



Proposed Phasing:

Phase 2

- Completion of sidewalk network on West Elizabeth to comply with ADA guidance
- Intersection treatments to address access to signal push buttons and upgraded curb ramps

Recommended Design

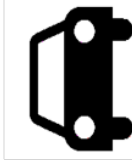
- Enhanced sidewalk network with detached sidewalks and landscaped parkways (where feasible)
- New and/or enhanced crossings (upgrades to Campus West mid-block crossing (Hawk), new crossing at Oakbridge Senior Housing (RRFB), Skyline (RRFB), Ponderosa (RRFB) and Rocky/Azuro (exact treatment TBD)

Project Vision:

- ✓ **Be unique and adaptable** to the distinctive characteristics of each corridor segment.
- ✓ **Be safe and comfortable** for all users.
- ✓ **Encourage and prioritize public transportation** and active transportation options.
- ✓ **Support the interconnectivity** of all modes.
- ✓ **Be a beautiful and vibrant** environment.

Existing Conditions:

- Traffic varies from 4,400 in the west to over 18,000 per day in the east
- Perceived speeding, especially in the western segments
- Challenging to make left turns
- Conflicts with pedestrians and bicyclists
- Sight distance issues



Identified Needs:

- Inability to support existing travel demands and anticipated growth
- Vehicular mobility, safety and access concerns
- Challenge connecting between modes

Project Vision:

- ✓ **Be unique and adaptable** to the distinctive characteristics of each corridor segment.
- ✓ **Be safe and comfortable** for all users.
- **Encourage and prioritize public transportation** and active transportation options.
- ✓ **Support the interconnectivity** of all modes.
- ✓ **Be a beautiful and vibrant** environment.

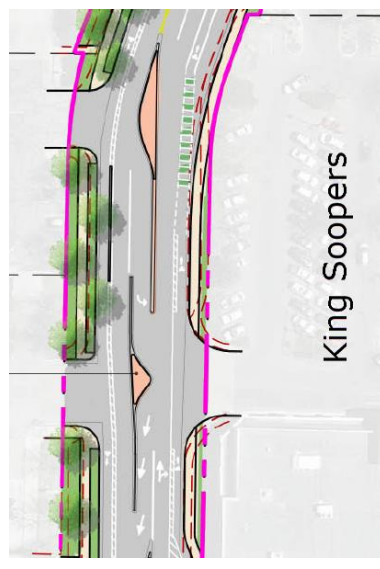
Proposed Phasing:

Phase 2

- Completion of bike lanes throughout the corridor will help reduce conflicts between bikers and motorists

Recommended Design

- Maintains four travel lanes in the busiest segments of the corridor
- Maintains the center turn lane to access driveways through the majority of the corridor
- Medians added in select locations to help calm traffic and beautify the corridor
- Access management around Campus West and King Soopers
- Roundabout at Overland Trail (eases turning movements & calms traffic)



DRAFT – 6/8/2016