





Active Transportation Resource Center Go Human Kit of Parts Pilot Project

POST-DEPLOYMENT ANALYSIS

**BUTTE COUNTY, TOWN OF PARADISE** 









## **Table of Contents**

- **01** Program Overview
- **04** Community Outreach & Engagement
- 09 Survey Results
- 14 Conclusion
- 15 Acknowledgment
- 16 Appendices

## PROGRAM OVERVIEW

The Active Transportation
Resource Center (ATRC) hired
California Walks to implement
its Go Human Kit of Parts Pilot
Program. California Walks
worked with the Butte County
Public Health Department to
develop and facilitate temporary
safety demonstrations of a
separated bike path and a
creative crosswalk in the Town
of Paradise.

The project created opportunities for residents to experience the proposed safety improvements in live traffic settings and provide feedback to support the potential implementation of improvements.

The Town of Paradise has been in the process of community rebuilding since the 2018 Camp Fire, which destroyed thousands of structures and killed over 80 people. In their rebuilding efforts, the Town of Paradise is prioritizing walking and biking safety in their community while assuring residents that essential emergency vehicles can easily travel throughout the community. The Butte County Public Health Injury Prevention program is helping to support this work.

The goals of the temporary demonstration were to:

- Demonstrate how Safe Routes to School programming can be prioritized in community development construction;
- Exhibit how walking safety infrastructure can coexist with emergency response vehicles during emergencies and disasters:
- Improve the mobility, access, and safety of pedestrians who use this corridor:
- Gather community feedback on the temporary demonstrations; and
- Use the community's feedback to inform and apply for future Active Transportation Program applications.

## **PROGRAM OVERVIEW**



- On Thursday, October 27, 2022, two temporary demonstrations were hosted on key routes to Paradise Ridge Elementary School:
  - A separated pedestrian path on the southside
  - A separated pedestrial path of the southside of Wagstaff Road, east of Pentz Road; and
     A creative crosswalk at the western leg of the Billie Road/Pentz Road intersection.

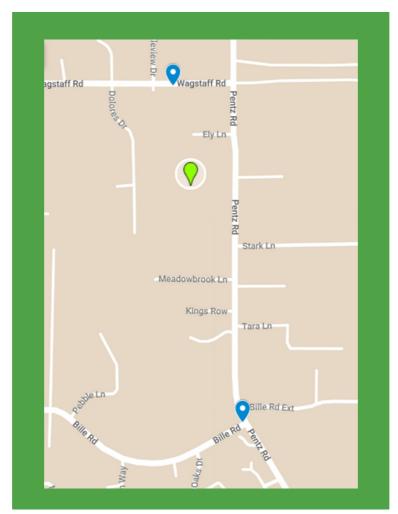


IMAGE: TOWN OF PARADISE KIT OF PARTS TEMPORARY DEMONSTRATIONS

## PROGRAM OVERVIEW



33 parents, students, and community members completed the survey, and over 90 individuals participated in the demonstrations. An overwhelming majority of respondents supported the demonstration projects. This report describes the community engagement activities, findings, and event outcomes for the Town of Paradise Kit of Parts Temporary Demonstration Event.



IMAGE: VOLUNTEERS INSTALLING CREATIVE CROSSWALK DEMONSTRATION ON BILLIE ROAD



IMAGE: INSTALLED CREATIVE CROSSWALK WITH CALIFORNIA HIGHWAY PATROL VOLUNTEER



IMAGE: CHILDREN APPROACHING THE COLORFUL DRIVEWAY ART COMPETION ON BILLIE ROAD AND PENTZ ROAD

Community outreach efforts targeted the local community around Paradise Ridge Elementary School, including those who:

- Reside in an area identified as among the most disadvantaged 25% in the state according to CalEnviroScreen 3.0;
- Have a median household income less than 80% of the statewide median based on the 2012-2016 American Community Survey;
- Receive free or reduced-price meals under the National School Lunch Program;
- Score within the 25th percentile in the Healthy Places Index (HPI), a census tract must be in the 25th percentile or less to qualify as a disadvantaged community; and/or
- Live within Federally Recognized Tribal Lands.



MACE: CREATIVE CROSSWALK AT PARADISE RIDGE ELEMENTARY SCHOOL PARKING LOT



IMAGE: BUTTE COUNTY DEPARTMENT OF PUBLIC HEALTH BEING INTERVIEWED BY ACTION NEWS NOW (LINK NOT AVAILABLE)

The following materials were co-developed between California Walks and the Butte County Department of Public Health Office of Traffic Safety:

#### **FLIER**

Two fliers were developed and distributed virtually and inperson to local students, families, and community members; Town of Paradise staff and elected officials; local nonprofits, including the Boys and Girls Club; and local churches and parks. A full list of event invitees and attendees can be found in the Appendix.



IMAGE: DEMONSTRATION COMMUNITY FLIER



IMAGE: DEMONSTRATION WALKING SCHOOL BUS FLIER

#### **ENGAGEMENT SURVEY**

A community engagement survey was completed to gather feedback on the temporary demonstrations. See the Appendix for the complete survey.



IMAGE: BUTTE COUNTY PUBLIC HEALTH DEPARTMENT SURVEYING STUDENTS AND PARENTS OF PARADISE RIDGE ELEMENTARY SCHOOL



IMAGE: SURVEY BOOTH ON WAGSTAFF ROAD

## CALIFORNIA STATE UNIVERSITY, CHICO STUDENT PARTICIPATION:

Students from GEOG 425 Planning for Sustainable Communities attended and volunteered at the demonstration. As part of their class curriculum, they were asked to complete field notes about their activities, observations, and interactions that day and write a field report detailing their experience, observations, and recommendations for improvement. Their feedback is distributed throughout this analysis.

## **COLORFUL DRIVEWAY ART COMPETITION**

Nine students created Halloween-themed driveways that were placed along Pentz Road, leading to Paradise Ridge Elementary School.



IMAGE: COLORFUL DRIVEWAYS ART COMPETITION WINNERS ANNOUNCED



IMAGE: WALKING SCHOOL BUS ON PENTZ ROAD

## **WALKING SCHOOL BUS**

Thirty-six students and families participated in a walking school bus starting at the Billie Road/Pentz Road and Wagstaff Road/Pentz Road intersections, highlighting the creative crosswalk, separated pedestrian path, and colorful driveways.

## **SOCIAL MEDIA**

The demonstration activities, partners, participants and impact was highlighted through California Walks Instagram page. Partner organizations also highlighted the event through their media accounts.



IMAGE: CALIFORNIA WALKS SOCIAL MEDIA POST SLIDE 1 - 6

33 parents, students, and community members completed the survey, and over 90 individuals participated in the demonstrations.

California State
University, Chico
students, the
California
Department of
Public Health,
Caltrans, Chico Velo,
and other
community
members helped
administer the
survey. The full
survey results can be
found in the
Appendix.





FELT SAFER
WALKING
BECAUSE OF THE
TREATMENTS



WOULD LIKE TO SEE BOTH TREATMENTS PERMANENTLY INSTALLED





DO NOT WALK OR BIKE MORE IN THE COMMUNITY BECAUSE OF

UNSAFE DRIVER BEHAVIORS AND... NOT ENOUGH SIDEWALKS & BIKE LANES



USE A PERSONAL VEHICLE TO TRAVEL AROUND THEIR COMMUNITY ON A TYPICAL DAY





IMAGES: WALKING SCHOOL BUS CROSSING BILLIE ROAD

HIGHLIGHTS

The top three things that keep respondents from walking or biking more in their community:

UNSAFE DRIVER NOT ENOUGH COMFORTABLE SPACES TO WALK OR BIKE (I.E., SIDEWALKS, BIKE LANES)

DESTINATIONS ARE TOO FAR TO WALK/BIKE

The top 3 things that would enhance the Town of Paradise for people walking:

WIDER SIDEWALKS

SIDWALK LIGHTING VIBRANT THINGS TO SEE AND DO

**HIGHLIGHTS** 

The top 3 things that would improve the experience for people biking in the Town of Paradise:

MORE BIKE LANES PROTECTED FROM VEHICLES

MORE BIKE LANES ON THE ROAD

LOWER VEHICLE SPEEDS



IMAGES: WALKING SCHOOL BUS CROSSING BILLIE ROAD

"I SAW AN "E" BIKE
TODAY WITH
MAYBE A 13 YEAR
OLD GOING THE
WRONG SIDE OF
THE ROAD WITH NO
HELMET. NEED
INSTRUCTION IN
SCHOOLS ON BIKE
SAFETY."

"THANK YOU FOR CONSIDERING US. I AM VISUALLY IMPAIRED AND I NEED SAFE SIDEWALKS TO BE INDEPENDENT." COMMENT HIGHLIGHTS

"I HOPE THIS
[CREATIVE
CROSSWALK] TRULY
HAPPENS! IT'S
BEAUTIFUL, CHEERY
AND DEFINITELY
CATCHES THE EYE.
FINGERS CROSSED."

## CONCLUSION

This event demonstrates the Town of Paradise's continued commitment to being a safe, comfortable community to walk and bike while prioritizing emergency vehicle response. Butte County Department of Public Health staff is interested in hosting more temporary demonstrations across the county to empower community advocates. The Department of Public Health will share this report with all event attendees, invited partners, and schools and communities they want to work with in the future. This report will be included in their future Active Transportation Program (ATP) applications and other funding opportunities.

For the full ATRC Kit of Parts Recommendations Report and other Post-Deployment Analysis, visit Cal Walks' websites at calwalks.org/atrc-kit-of-parts



IMAGE: STUDENTS CROSSING BILLIE ROAD

## **ACKNOWLEDGMENT**

Thank you to the Butte County Department of Public Health for inviting and partnering with us to make the Town of Paradise safer for walking and biking. Thank you to Paradise Ridge Elementary School for acting as a hub for the temporary demonstration; hosting volunteers and event materials. Thank you to the volunteers at the Volunteers in Police Service, California Highway Patrol, Paradise Police Department, Paradise Ridge Elementary School Parents Teachers Organization, Chico Velo, Chico State University, the Boys and Girls Club, Caltrans, and California Department of Public Health. Thank you to Paradise Starbucks and Beatniks for donating snacks and refreshments to volunteers.

We acknowledge the Kojomk'awi, Mechoopda, Cayuse, Umatilla, and Walla Walla peoples as the traditional land caretakers of the greater Town of Paradise area.



IMAGE: PLANNING TEAM DEBRIEF MEETING

## **APPENDIX A**

Invited	and	<b>Attend</b>	ed Gue	et l iet
IIIVILEU	anu	Allena	eu Gue	SI LISI

invited and Attended Guest List			
INVITED	ATTENDED		
Oroville PW	Butte County Department of Public Health		
Gridley PW	Paradise Ridge Elementary School		
Gridley Parks & Rec	Caltrans		
Biggs PW	California Public Health Department		
Paradise Parks & Rec	Volunteers in Police Service (Paradise)		
Chico Parks & Rec	California Highway Patrol		
Paradise High School	Chico Velo		
Ridgeview High School	Chico State University		
Cedarwood Elementary School	Boys and Girls Club youth members, staff, and CEO		
Pine Ridge School	Butte County Association of Governments (BCAG)		
Paradise Junior High School	Town of Paradise Public Works		
the Boys and Girls Club of North Valley	City of Chico		
the African American Family Cultural Center	Enloe Hospital Community Health Coalition		
the Hmong Cultrual Center	Ability First Sports		
Chico Jesus Center (homeless shelter)	community members, parents/caregivers of students at Paradise Ridge Elementary School		
Oroville Rescue Mission (homeless shelter)	Paradise Ridge Elementary School PTO		
Chico safer streets coalition	Paradise Police Department		
Rotary Club of Chico			
Rotary Club of Paradise			
Chapman Elementary School			
the Church of Jesus Christ of Latter-day Saints			
First Christian Church			
First Baptist Church Paradise			
Our Savior Lutheran Church			
Paradise Alliance Church			
Calvary Baptist Church Paradise			
Paradise Evangelical Free Church			
Craig Memorial Congregation Church			
Paradise Ridge Southern Baptist			
Paradise Lutheran Church			
Jubilee Church			
Paradise Church of Religious Science			
St Nicholas Episcopal Church			
Paradise United Methodist Church			
New Creation Fellowship on the Ridge			
Calvary Chapel of Paradise			
Skyway Assembly of God			
Paradise Seventh-Day Adventist Church			
St. Thomas More Catholic Church			
Magalia Community Church			
Ability First Sports (adapted sports program)			
Oroville Parks & Rec			
Location Arts (architects and community development)			

Invited and Attended Guest List			
INVITED	ATTENDED		
Paradise Ridge Elementary School PTO			
League Cycling Instructors (LCI's)- some thorough Chico Velo			
Butte County Office of Education Special Education Department			
Town of Paradise, Paradise Ridge Elementary School, and California Highway Patrol social media post			

## **APPENDIX B**









## **Paradise Ridge Elementary School Community Survey**

Improvement	lmage	Does this improvement make you feel safer walking/biking?	Do you want this improvement permanently installed?	
Separated Walking Path		□ Yes / □ No	□ Yes / □ No	
Artistic Crosswalks		□ Yes / □ No	□ Yes / □ No	
<ul><li>Yes/ □ No</li><li>On a typical day</li><li>□ Walk □ Bike</li></ul>	stration help you understand the variation help you understand the variation help you travel around your co	ommunity? Check all th  Public Transportation	at apply.	ooter
☐ I regularly walk conditions. ☐ I only walk to so ☐ I only walk for e ☐ I don't walk but ☐ I regularly bike conditions. ☐ I only bike to so and/or protected by	to school, work and/or to complete hool, work and/or to complete othe bike lanes. xercise and recreational purposes.	other day to day activier day to day activies i	f there are sidewalks. ies, regardless of the str	eet
<ul><li>☐ Unsafe drivers</li><li>☐ Concerned abo</li></ul>	I from walking or biking more in yo ☐ Destinations are too far to walk ut crime/harassment ☐ Need to to mfortable places to walk or bike (sid	:/bike □ Not in the harransport people/bags	abit/Don't think about it $\Box$ Lack of access to a b	















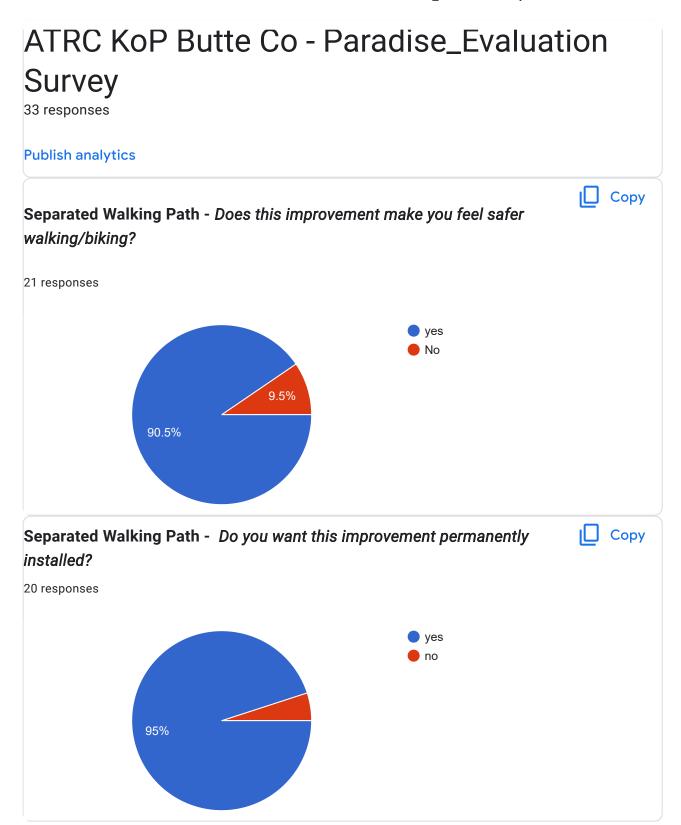
5. Check the top 3 things that would enhance Paradise for people walking:	
$\square$ Wider sidewalks $\square$ Public space/parks $\square$ Lower vehicle speeds $\square$ Vibrant t	hings to see and do
$\square$ Sidewalk lighting $\square$ More trees/shade $\square$ Improved public safety $\square$ Other	
6. Check the top 3 things from the list below that would improve the experience for ☐ More bike lanes on the road ☐ More bike lanes protected from vehicles ☐ M ☐ Bike share ☐ Driver education ☐ Bicyclist education ☐ Lower vehicle speed	ore bicycle parking
☐ Other	
7. Is there anything else you'd like to share with us?	
7. Is there anything else you'd like to share with us?	
7. Is there anything else you'd like to share with us?	
7. Is there anything else you'd like to share with us?	
7. Is there anything else you'd like to share with us?	



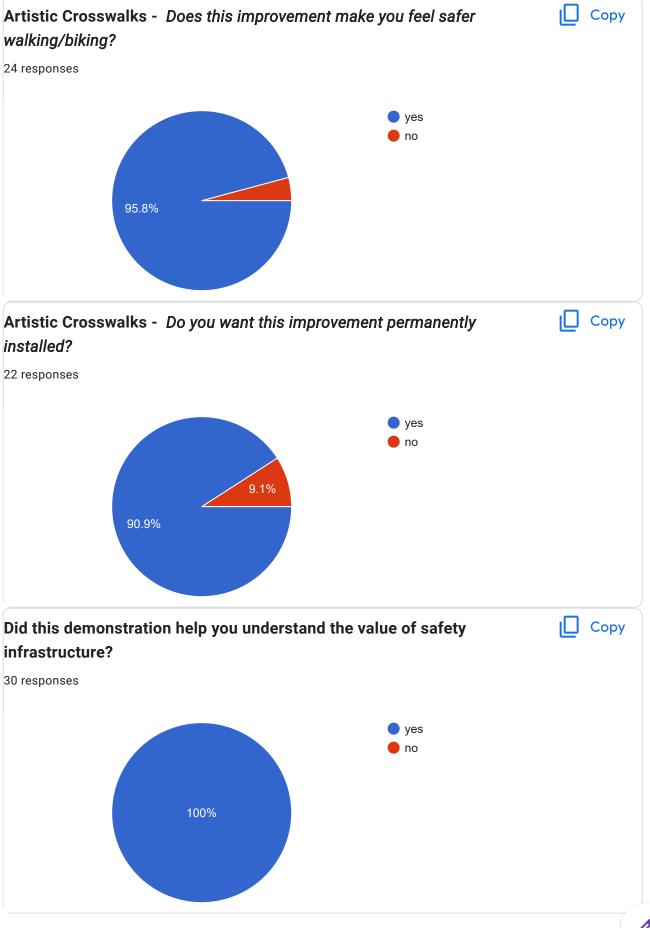


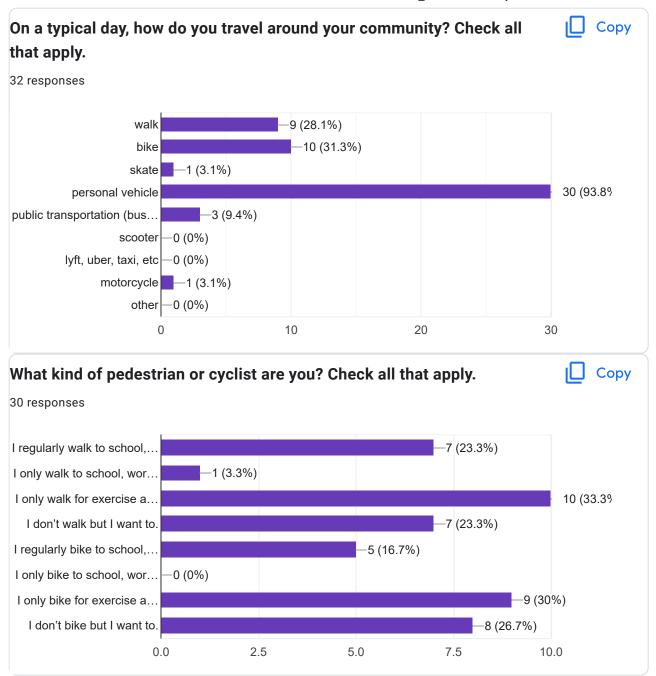


## **APPENDIX C**











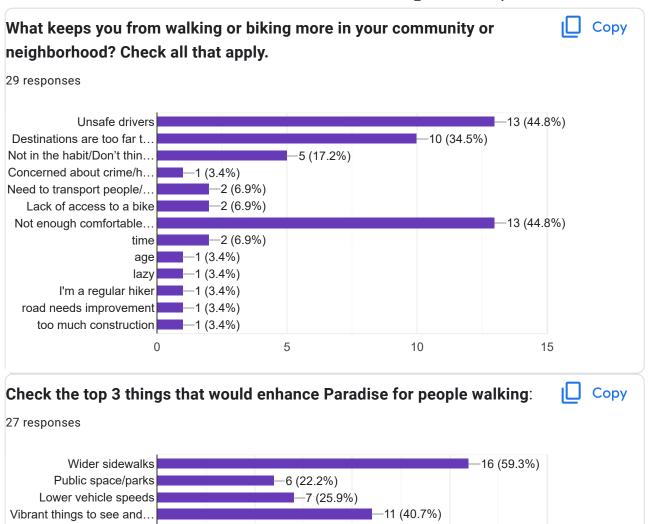
—14 (51.9%)

15

20

10 (37%)

10



-3 (11.1%)

5

-1 (3.7%)

**--1** (3.7%)

-1 (3.7%)

**-**1 (3.7%)



Sidewalk lighting

More trees/shade

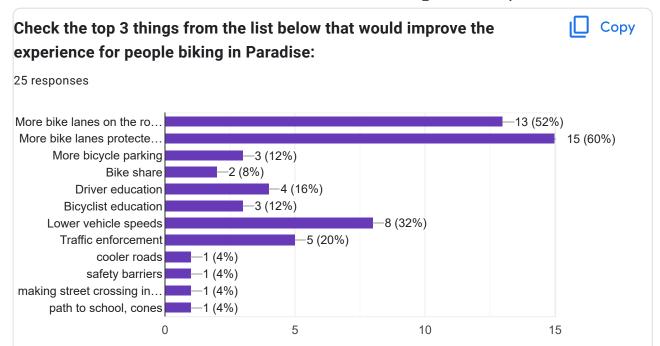
lighting

sidewalks

safety barriers

closer distance

Improved public safety



#### Is there anything else you'd like to share with us?

9 responses

we have the opportunity to make our town better, I think if we waste time talking about it, we will spend more money later, let's do this now

I saw an "e" bike today with maybe a 13 yer old going the wrong side of the road with no helmet. Need instruction in schools on bike safety

i hope this truely happens! It's beautiful, cheery and definitely catches the eye. Fingers crossed, thank you

slow the speed of cars down

we need safe bike lanes

Thank you for considering us. I am visually impaired and I need safe sidewalks to be independent.

Great project but only a limited area. Need more connected bike/ped infrastructure/paths

this has been a great experience/lesson for our family! Thank you for your time!

no concerns, waiting for construction to be over

This content is neither created nor endorsed by Google. Report Abuse - Terms of Service - Privacy Policy



## Google Forms



## **APPENDIX D**





## Addendum to:

# Active Transportation Resource Center Go Human Kit of Parts Pilot Temporary Demonstration Project Post-Deployment Analysis

Butte County, Paradise

Fall 2022 GEOG 425 Planning for Sustainable
Communities and Regions course in collaboration with
Butte County Public Health (BCPH), Active
Transportation Resource Center (ATRC), Go Human,
Southern California Association of Government (SCAG),
and California Walks











Department of Geography & Planning
GEOG 425: Planning for Sustainable Communities & Regions
Dr. LaDona Knigge, Laurent Beauregard, Matthew Collins, Jessica Frantz, Maya Fritz,
Giavanna Gianfermi, Lefferts Lefferts III, Anthony Lepori, Andrew Macias, Megan
Witte, and Terence Zegarra, GEOG 425 Fall 2022 Students
16th December 2022

## **Table of Contents**

Table of Contents	0
I. Introduction	1
II. Observations & Recommendations	2
A. Process and Organization	2
B. Kit of Parts	2
D. Survey	3
E. Interactions with People	4
F. Suggestions	4
III. Large Scale and/or Big Picture View	5
A. Benefits of Temporary Projects or Tactical Urbanism F	op Up Events 5
B. Importance of Getting Early Buy-In or Commitment	6
C. Benefits in Terms of Community Building and Off-Stro	eet Path for Evacuation 7
IV. Summary and Conclusion	7
References	9
Appendices	10
Appendix A. Child Appropriate Survey	10
Appendix B. GEOG 425 – Fall 2022 Students	13
B-1: Photo of Authors: Back row: Megan Witte, Jessica Fr Andrew Macias, Maya Fritz, Professor LaDona Knigge, M Front row: Terence Zerarra, Laurent Beauregard, and An	att Collins, Leffert Lefferts.



#### I. Introduction

GEOG 425 Planning for Sustainable Communities and Regions is an upper-division course in the Department of Geography & Planning at Chico State. This course examines economic, social, demographic and political bases for sustainable communities and seeks to integrate sustainable planning theory and practice with service learning projects such as this temporary pop-up street demonstration with Butte County Public Health.

Following the 2018 Camp Fire, the Town of Paradise has been rebuilding. This included the construction of the Paradise Ridge Elementary School, to replace the two elementary schools that burned. This has presented an opportunity for the community to try and improve connectedness and walkability. On Thursday, October 27th, 2022, from 6 A.M. to 4 P.M students from the Planning for Sustainable Communities and Regions course participated in the Active Transportation Resource Center Go Human Kit of Parts Pilot Temporary Demonstrations in collaboration with the various partners. This project which we will refer to as the Tactical Urbanism Pop Up event (TUPU) included two Walking School Buses to access Paradise Ridge Elementary School. There were two drop-off locations for the Walking School Bus: the first at the intersection of Wagstaff and Pentz Roads and the second at the intersection of Billie and Pentz Roads. The street treatments at the first location included barriers between the sidewalk and the road on the southside of Wagstaff Road, east of Pentz Road. The street treatments at the second location included a creative crosswalk at the western leg of the Billie Road and Pentz Road intersection with colorful driveways along the route. Students helped set up, take down, and clean the canopy tents, road barriers, the creative crosswalks, and signs that were part of the Go Human Kit and Halloween decorations at both locations. Students helped conduct surveys of the children and adults that participated in the demonstrations and were instructed to keep



detailed field notes of their activities and observations. After the demonstration project, students coded their field notes, discussed their observations, and made recommendations and suggestions for future demonstration projects which are detailed in this report.

#### II. Observations & Recommendations

#### A. Process and Organization

The TUPU demonstration project began with an early morning set up of the temporary street treatments from the Go Human Kit of Parts (KoP) at both locations. After the morning walking school bus, students were involved in cleaning the road surface and reaffixing the Go Humans Kit of Parts (KoP) in the middle of the demonstration and ended the day with a full clean-up of the KoP.

- The demonstration project was organized in two different locations, with strategic plans laid out for carrying out the demonstration. We found that the development of a Walking School Bus Program could provide a way for children as well as the parent supervisors who choose to walk with their children, and to connect with their peers and other community members.
- The colorful crosswalk and driveways help get drivers' attention, keeping them on the lookout for anyone who could be potentially crossing the street, creating a safer environment.
- Project was successful because children were able to give their input on issues that they
  would usually not have a say in.

#### B. Kit of Parts

The Kit of Parts (KoP) consisted of the shipping container that was delivered to the site containing all of the materials needed for each aspect of the project and included the temporary barriers, colorful sidewalk materials, colorful driveway photos, signage and all



things needed to run the walking school bus (SCAG KoP). We recommend for future temporary street projects such as this:

- The temporary barriers be more brightly colored or that they include the addition of reflective tape for increased visibility.
- The original tape used to attach the colorful crosswalk panels to the asphalt originally did
  not stick well enough to handle being driven over. The type of adhesive tape needs to be
  evaluated to be certain that it will adhere to the road surface.
- The KoP materials were lightweight and portable. No changes needed for the ease of portability of the materials.

#### C. Colorful Crosswalks:

We noted that the materials used for the colorful crosswalks were lightweight and portable. However, the tape used to affix the colorful crosswalks did not hold well. To alleviate this problem, we recommend:

- Road surface at location of colorful crosswalk to be cleaned before event with broom,
   street sweeper or leaf blower to remove debris.
- Since the installation is before sunrise, you might consider that this preparation be done the day before the event.
- Evaluate the type of adhesive, colorful tape that is used to affix the colorful crosswalks.
   Some of the types of tape held better than others.

#### D. Survey

We noted that the survey was administered before the children participated in the walking school bus and the questions needed to have more child-friendly language. We suggest:

- Have the survey be administered after students have completed the walking school bus.
- Have the survey be read to the children by volunteers who record their responses.



- Use simple or child-friendly language to make future surveys easier for children to understand.
- We have prepared a sample survey in this report. See sample survey in Appendix A.

#### E. Interactions with People

Throughout the event there were many different organizations representing their interest in the project. There were also community members, and children attending the school with their parents or guardians. Our recommendations are:



Figure 2 Sample design for sandwich board with UPC code from another project.

- Include a large UPC code on sandwich board sign so that people passing by can access website and get information about the project and partners. This may also be used to elicit feedback from drivers.
- Take into account any recommendations directly from the public present at the event.
- Take advantage of the knowledge that the school employees can provide about background on the school.
- Everyone seemed to have an enjoyable experience.

#### F. Suggestions

After assisting with activities, we analyzed the field notes to determine what processes worked out well and what could be improved during the Tactical Urbanism Pop-Up event. In addition to this, we made suggestions about what improvements need to be made with infrastructure in the town of Paradise.



- More of the surrounding streets should have a crosswalk plan in addition to the proposed one on the intersection of Pentz Road and Billie Road.
- Future infrastructure plans should incorporate sustainable practices that are geared towards pedestrians who walk and bike. Due to the current lack of infrastructure, many people are relying on cars.
- We noticed that many of the drivers were speeding. Paradise needs more streetlights and speed limit signs.
- There were mixed opinions of holding aTactical Urbanism Pop Up (TUPU) event in a small town like Paradise. Some suggest this event would be more practical in a larger, more urbanized area.
- Develop more training in order to follow guidelines of Go Human Activations Playbook
   https://scag.ca.gov/sites/main/files/file-attachments/kop\_playbook\_final.pdf?1661211228
- The TUPU event was effective in getting the public involved and bringing awareness to transportation infrastructure issues.

#### III. Large Scale and/or Big Picture View

#### A. Benefits of Temporary Projects or Tactical Urbanism Pop Up Events

Tactical Urbanism Projects are temporary street infrastructure projects that includes street treatments such as crosswalks, buffered bike lanes and parklets (Garcia and Lydon). They are a good approach to urban planning as they are quickly and easily set up and taken down, are low cost, scalable and they allow people to interact with urban developments (Thakkar). The benefits to communities are numerous and can take many forms. Tactical Urbanism popups are an opportunity for community members to see the potential in urban planning and illuminate the different ways that their communities can be altered to be more walkable,



bikeable, and liveable (Thakkar). When people are involved in tactical urbanism pop ups, they are able to provide feedback on the temporary street treatments and are more likely to play a more active role in advocating for and being involved in a long-term project. Tactical urbanism projects are a short-term commitment to a longer-term change with the potential of high reward with low risk.

A walking school bus is a group of children that walk to school with one or more adults. These walking school buses can take many forms, from being as unstructured as a group of families taking turns walking their kids to school to being a structured, planned route where kids can join the school bus at designated locations and times (Bryce). Walking school buses are a great option for getting kids to school. The benefits include improved child safety by walking in a supervised group, increased health, more time spent outdoors, reduced traffic congestion, and an increased sense of community.

#### B. Importance of Getting Early Buy-In or Commitment

It is important that the grant applicant have initial approval by the host city for the project at the time of the grant application to avoid denial of implementation of the project. The Go Human Kit of Parts Playbook suggests that smaller activations take approximately 1.5 months from conception to event (SCAG et al, 4). According to the Tactical Urbanism Permitting Process, Application, & Materials Guide, applicants should begin meeting with neighbors and begin the permit application to the host city engineering department approximately two months prior to desired installation date. The types of permits that may be required include an event permit to allow the event, which may take up to 45 days to approve, and a street closure permit that may take up to five days to approve. Some communities may require an insurance policy in connection with the event. The grant



application for this project initially identified the study site as Fair Street in the City of Chico for the temporary street treatment. After the grant was awarded, the City of Chico denied a permit for the event and the event had to be relocated. In order to prevent such obstacles to implementation, it is recommended that the grant application include preliminary approval by the host community and the host organization obtain a permit a minimum of 45 days before event.

#### C. Benefits in Terms of Community Building and Off-Street Path for Evacuation

The Paradise community is recovering from the tragedy of the wildfire. The implementation of a walking school bus provides an opportunity for children and parents to connect with their peers, and to interact with other community members. This process can help to build community.

The off-street walking school bus trail could be utilized as an alternate evacuation route or as access for emergency vehicles in the event of another evacuation. The foothills surrounding the Town of Paradise area fire-prone landscape and so Paradise is still under threat of wildfire. With limited ways to get around Paradise, this path provides an alternate route to allow travel in case of an emergency.

#### IV. Summary and Conclusion

The Active Transportation Resource Center Go Human Kit of Parts Temporary

Demonstration Project that took place in Paradise, California, was an opportunity for a town that is rebuilding following the devastating 2018 Camp Fire to explore new transportation alternatives beyond cars. With the town wanting to make a more walkable and bikeable town, this project allows Paradise to have more safe options for children to get to school and other places. However, this project needs some improvements such as revising the survey that was



opportunity for the town of Paradise to see how building a permanent bike and pedestrian path away from traffic could encourage more people to use active transportation, and it is an opportunity for community involvement.

An interesting benefit of an off-street path such as the one built along Pentz Road near Paradise Ridge Elementary School is that this path could be used as an alternate escape route or for access for emergency vehicles in the event of an emergency evacuation, and it could help more people to get out of harm's way in a more efficient manner.

Temporary street projects such as this promote active community engagement and allow feedback from the community on the proposed infrastructure, increasing community support.

This project not only promotes safe active transportation, but it promotes sustainability for towns and cities that are looking to improve their town for future generations.



#### References

- Bryce, Katy. "Walking School Buses Help Keep Kids Healthy: Let's Walk and Roll!" *Commute Options*, https://www.commuteoptions.org/walking-school-buses-help-keep-kids-healthy/
- City of Fayetteville, Arkansas Engineering Division. "Tactical Urbanism Permitting Process, Application, & Materials Guide: A Guide to Community-Led Placemaking Projects. tinyurl.com/mw229dzv
- Cope, Meghan. (2005) "Coding Qualitative Data" in *Qualitative Research Methods in Human Geography, Second Edition*" Iain Hay, Editor. Oxford University Press.
- Garcia, Anthony and Mike Lydon. 2015. Tactical Urbanism: Short-term Action for Long-term Change. Island Press. Washington, DC
- Southern California Association of Governments Kit of Parts (SCAG KoP). https://scag.ca.gov/borrow-kit-parts
- Southern California Association of Governments and developed with Koa, Safe Routes
  Partnership and Leslie Scott Consulting. "Go Human Kit of Parts Playbook"
  https://scag.ca.gov/sites/main/files/file-attachments/kop playbook final.pdf?1661211228
- Thakkar, Kishan. "An Overview of Tactile Urbanism." *Rethinking The Future*, https://www.rethinkingthefuture.com/designing-for-typologies/a6052-an-overview-of-tactical-urbanism/
- Wheeler, Stephen M. 2013. Planning for Sustainable Communities: Creating livable and ecological communities, Second edition.



### Appendix A. Child Appropriate Survey

The goal of this survey is to gain a better understanding of community mobility within the K-12 demographic. Questions are meant to be administered by an adult. Questions should be supplemented with any additional answers along the blank lines. There is space at the end of the survey to record any questions or thoughts that arise while conducting the survey.

1) How Long Does it take you to get to school?

_	Λ	5	Minuta
0	U –	. Э	Minutes

o 
$$5-10$$
 Minutes

o 
$$15-20$$
 Minutes

o 
$$20-25$$
 Minutes

2) How do you get to school?

o Bicycling

0	Car
$\mathbf{c}$	$\sim$ uı

o Bus

3) How do you travel to meet up with your friends?

- o Walking
- o Biking
- o Bus

o Car Ride

4) Do you feel safe walking in your neighborhood?

- o Always
- o Usually
- o Sometimes
- o Rarely

o Never

5) Do you feel safe riding your bike in your neighborhood?

- o Always
- o Usually
- o Sometimes
- o Rarely

o Never

o) Do any of these fac	tors keep you from wark	ang of biking in your neighborhood?
o I do not want to	o Is unsafe	o Guardian will not o Destination is too let me far
o Unsafe Drivers	o No Bike	o Would take too o Nothing, I feel long safe
7) Do you think addin	g colors to crosswalks n	nakes them more noticeable?
o A great deal		
o Unsafe Drivers  o No Bike  o Would take too long  o Nothing, I feel safe  7) Do you think adding colors to crosswalks makes them more noticeable?  o A great deal  o A lot  o A moderate amount  o Not at all amount  8) Would it be fun walking with your friends to school?  o YES  o NO  9) Is a bike lane safer on or off the road?  o On road  o Separate from road  if they had a slower speed limit  10) If your school rented out bikes like books, would you rent one?  o Yes  o No  O Only from my  o Only from my		
o	YES	o NO
9) Is a bike lane safer	on or off the road?	
o On road	-	if they had a slower divider
10) If your school ren	ted out bikes like books,	would you rent one?
0	Yes	o No
11) Are there parks no	earby that you could wal	k or bike to?
o Yes	o No	o Only from my house o Only from my school



Please use this area to provide any other insightful feedback that may have been given						



#### Appendix B. GEOG 425 - Fall 2022 Students



B-1: Photo of Authors: Back row: Megan Witte, Jessica Frantz, Giavanna Gianfermi, Andrew Macias, Maya Fritz, Professor LaDona Knigge, Matt Collins, Leffert Lefferts. Front row: Terence Zerarra, Laurent Beauregard, and Anthony Lepori











