

MIG

Charlier Associates, Inc.



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County Council Process

- **10/07:** Project Orientation
- **10/28:** Density, Volumetrics, Massing
- **11/09:** Land Uses and Affordable Housing
- **11/16:** Transportation and Mobility
- **11/23:** Economic Analysis and Review of DA
- **TBD:** Public Hearing and Action/Vote



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mobility outcomes Summit County Council – 11/16/20

- 1. conformance with local plans
- 2. transit-ready development pattern
- 3. sustainability metrics
- 4. traffic study
- 5. other mobility topics
- 6. partnership opportunities





mobility outcomes

Summit County Council – 11/16/20

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SNYDERVIL GENERA Adopted by Or June 17	LE BASIN L PLAN Idinance 839 , 2015	
Planning Pat Putt, Community D Peter Barnes, Planning an Jennifer Strader, S	g Staff evelopment Director d Zoning Administrator Senior Planner	
Snyderville Basin Planning Commission	Summit County Council	
Mike Frankin, Chair Bea Peck, Vice-Chair Colin DeFord Greg Lawson Mike Barnes Canice Harte Chuck Klingenstein	Kim Carson, Chair Roger Amstrong, Vice-Chair David Ure Chris Robinson Claudia McMullin	
	KIMBALL JUNCTION Location The Kinthall Junction neighborhood contains property on both the east and west sides of SR- 23. The east add is bordered on the north by 1-60, on the east by SR-224, not the east of SR-224. The west side is bordered on the north by 1-60, on the east by SR-224, not the south by Summit County open space, and on the west by the H4-Ule Ranch. While the Ulah Olympic Park is a separate	Existing D Each Deve project spe unique and zoning requ
	registrontood planning area, it has also been recognized in this plan because the connectivity between the two neighborhoods is critical.	
	Zoning The zoning in this neighborhood is a combination of Rural Residential (RR). Community Commercial (CC), and Town Center (TC). The base density in the RC zone is 1 unit per 20 acres: the base density in the RC zone is in determined by the ability of the development to interest and required development performance standards and criteria set forth in the Development Code. The base density in the TC zone is determined by the PC zone.	

responding to 2015 Snyderville Basin General Plan





Snyderville Basin General Plan



GOAL:

Promote a variety of transportation alternatives that provide convenient, reliable, and efficient services that meet the travel requirements of users

Snyderville Basin General Plan

objectives

- ✓ use comprehensive multimodal transportation planning to guide decision making
- ✓ incorporate these principles into transportation planning efforts in all development in the Basin
 - multimodal streets
 - exhaust alternatives before expanding roadway capacity
 - access and level of service
 - traffic control and management
- ✓ development will be designed to provide multimodal connectivity between adjacent subdivisions, commercial areas, or other developments

responding to 2019 Kimball Junction Neighborhood Plan









Nation. While the Ulah Olympic Park is a separate mightorhood planning area, it has also been recognized in this plan teacause the connectivity between the two neighborhoods is ontical.





Imp in this neighborhood is a status of Bruzi Residential (RR), raily Commential (CC), and Town Center Inde Sand etholity in the RR process is used in based etholity in the RR process is used in based based on the RR process in sum integrated development to impained development proferomance

Kimball Junction Neighborhood Plan "mobility and access opportunities"

- \checkmark improve flow of regional through traffic
- \checkmark strengthen the neighborhood's mix of uses
- ✓ reestablish traditional neighborhood building street patterns
 ✓ centralize parking
- improve overall neighborhood connectivity and walkability
- \checkmark enhance and expand community and civic spaces



Kimball Junction Neighborhood Plan "design principles"

 \checkmark create a mixed use neighborhood \checkmark create a people oriented built environment \checkmark achieve a seamlessly connected neighborhood ✓ create a walkable neighborhood \checkmark develop centralized parking facilities \checkmark provide a variety of housing choices \checkmark make visual quality a top priority \checkmark create a sustainable community \checkmark design for change ✓ neighborhood engagement





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plan transit & development together

using

"transit-oriented development" principles



transit-ready development



transit-ready development

development occurs at and around stations



(BRT-specific list)

transit-ready development

transit station

neighborhood

transportation

hub - multimodal network
safe walk access
universal accessibility
safe bicycle access, incl. trails
plazas, squares, parks
wayfinding
amenities

shade, weather

 \circ seating

 \circ coffee, pushcarts

✓ compact & contiguous A horizontal land use mix √ low to mid-rise density A+ walk environment ✓ narrow streets nearby residential buildings ✓ no big surface parking lots buildings address streets plazas, squares, parks

fixed route, scheduled bus other transit (e.g., gondola) ✓ safe walk network safe bicycle network, incl. trails ✓ regional highway access convenience parking ø park 'n ride parking √ curb space management \checkmark safe flow patterns

✓ create a people-oriented built environment
 ✓ achieve a seamlessly connected neighborhood
 ✓ create a walkable neighborhood





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sustainability metrics - inputs

neighborhood design and form factors

sustainability metrics - outcomes

- ✓ WalkScore
- √ H + T Index
- \checkmark annual vehicle miles of travel per household
- ✓ GHG emissions from motor vehicles

WalkScore

active living + public health

Walk Score®		Description
	90–100	Walker's Paradise
70-89		Daily errands do not require a car.
	Very Walkable	
	Most errands can be accomplished on foot.	
	50-69	Somewhat Walkable
		Some errands can be accomplished on foot.
	25-49	Car-Dependent
		Most errands require a car.
	0-24	Car-Dependent
		Almost all errands require a car.
70	70-89 50-69 25-49 0-24	Very Walkable Most errands can be accomplished on foot. Some errands can be accomplished on foot. Car-Dependent Most errands require a car. Car-Dependent Almost all errands require a car.

H + T Index

household affordability

cost of housing + transportation as a % of household income (affordable ≤ 45%)

annual vehicle miles of travel per household

driving driving driving

25,461

70

miles/day

County

average

daily <u>residential</u> vehicle miles of travel on area roadways

1,100 homes:

average weekday VMT

annual household GHG emissions

from driving (tons/household)

transportation = 30% of GHG emissions in Utah

data source: <u>https://nepis.epa.gov/Exe/ZyPDF.cgi?Dockey=P100U8YT.pdf</u> https://www3.epa.gov/carbon-footprint-calculator/

mobility outcomes Summit County Council – 11/16/20

- 1. conformance with local plans
- 2. transit-ready development pattern
- 3. less driving, lower household costs
- 4. sustainability metrics
- 5. traffic study

6. partnership opportunities

traffic study | methodology: vehicle trip generation

traffic study | methodology: intersection analysis

traffic study | input assumptions

2019 traffic counts – seasonally adjusted

mode share = same as Tech Center traffic study

no changes to street network or highways

no gondola, no other transit changes

project external traffic generation at adjacent intersections

(buildout)

AM peak

PM peak

peak hours total (AM + PM)

2,559

- 30%

1,795

project external traffic generation at adjacent intersections

(buildout)

daily traffic

(note change in scale from previous slide)

intersection analysis | level of service

existing peak hour conditions | intersection level of service *

		AM	PM
interchange	1. SR 224 / I-80 ramps	D	C
signal	2. SR 224 / Ute Blvd	В	E
signal	3. SR 224 / Olympic Pkwy	А	C
roundabout	4. Landmark Drive / Olympic Pkwy	В	В
roundabout	5. Landmark Drive / Ute Blvd	В	С
stop sign	6. Landmark Drive / Tech Center Dr	В	С

* based on 2019 traffic counts

2028 peak hour conditions | without project

		AM	PM
interchange	1. SR 224 / I-80 ramps	E	C
signal	2. SR 224 / Ute Blvd	В	F
signal	3. SR 224 / Olympic Pkwy	С	C
roundabout	4. Landmark Drive / Olympic Pkwy	В	С
roundabout	5. Landmark Drive / Ute Blvd	В	С
stop sign	6. Landmark Drive / Tech Center Dr	В	С

2028 peak hour conditions | with project

		AM	PM
interchange	1. SR 224 / I-80 ramps	E	С
signal	2. SR 224 / Ute Blvd	В	F
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roundabout	4. Landmark Drive / Olympic Pkwy	В	С
roundabout	5. Landmark Drive / Ute Blvd	В	С
stop sign	6. Landmark Drive / Tech Center Dr	С	
stop sign	7. Landmark Drive / unnamed	В	В

existing peak hour conditions | intersection level of service *

stop sign

AM

PM

* based on 2019 traffic counts

2028 peak hour conditions | with project

stop sign

recommended mitigation measures

restripe Ute Blvd/SR 224 intersection
 prohibit left turns from Tech Center Drive to Landmark Road
 restripe Tech Center Drive to Landmark Road intersection

(with mitigation all intersections meet LOS criteria in 2028 with project)

"apples to apples comparison"

traffic growth since 2007

traffic growth since 2007

changes in trip generation rates (2008 - 2020)

2008 traffic study: 7th edition ITE Manual 2020 traffic study: 10th edition ITE Manual

residential vehicle trips per dwelling unit

office vehicle trips per square foot

project external traffic generation at adjacent intersections

(buildout)

daily traffic – rates as used

daily traffic - current rates

traffic study | additional topics for Q & A

hourly traffic – 'apples to apples'

intersection of SR 224/Ute Boulevard delay

seasonal traffic variation – worst month

transit mode share – 'apples to apples'

effect of more retail on trip generation

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other mobility needs | future conversations as needed

winter maintenance/snow removal

parking demand/supply analysis

ADA/universal accessibility

bicycle/low speed modes facilities design

residential parking analysis | multimodal, sustainable

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Future Partnership Opportunities

long term transit vision

today's transit system

tomorrow's transit system

2030 transit system

long term transit vision

transit-ready development

regional intermodal hub

intermodal center I

long-range transit vision

LANDMARKDR UTE BLVD **OLYMPIC PKWY**

Kimball Junction Area Plan Utah DOT

KIMBALL JUNCTION

State Rou

The study team is currently working on evaluating multiple solutions based on the Level 1 screening criteria. The team plans to review this analysis and present the solutions proposed for further study to the public in the coming months.

POTENTAL SOLUTIONS UNDER STUDY

A wide range of short- and long-term solutions are being evaluated at a broad level against select measures that reflect the project goals and problems and opportunities. Over 30 solutions have been developed. Some of the solutions being considered include:

- New interchange configurations
- I-80 EB off ramp HOV/transit lane
- A new interchange at Ecker Hill Park and Ride with a Kimball Junction bypass road for general purpose and/or HOV/transit to offer a "back door" to the transit center
 Trenching or tunneling S.R. 224
- and I-80 in the interchange area
 Adding a pedestrian tunnel at Ute
- Blvd • Dual left turns at Lite Blvd

 Dual left turns at Ute Blvd and Olympic Parkway

SCHEDULE

Cre

STUDY INFORMATION NOVEMBER 2020

LEVEL 1 SCREENING

The initial tier of Level 1 screening determines if the solutions have any of the following fatal flaws:

- Does the alternative cause irreconcilable environmental impacts?
- Does the alternative cause irreconcilable community impacts?
- Is the alternative impractical and infeasible?

The second tier of Level 1 screening includes addressing the problems and opportunities by asking the following questions:

- Does the alternative improve interchange area capacity and vehicle mobility to/from I-80 and to/from S.R. 224 through the Kimball Junction area?
- Does the alternative maintain or improve multimodal travel options, health, and safety for pedestrians, cyclists, and transit users in the area?
- Does the alternative support operation and reliability of the Valley to Mountain (S.R. 224) Locally Preferred Alternative (LPA) both-side running Bus Rapid Transit (BRT)?

Potential solutions with a fatal flaw will be dismissed from further study.

LEVEL 2 SCREENING

Solutions moving forward from Level 1 screening will require additional and more-detailed analysis including but not limited to traffic analysis and the ability for the option to incorporate the desired transit and active transportation movements within the area. The analysis will serve to determine how well the solutions perform and to identify the potential impacts for the identified solutions.

The study team will use both qualitative and quantitative measures that align with the area goals that were developed based on coordination with the study partners and input from the public.

Solutions that are advanced passed the Level 2 screening and will require further environmental clearance in future study phases.

IAR 2020	MAY 2020	JUL 2020	SEP 2020	NOV 2020	DEC 2020	JAN 2020	
ate guiding themes nd goals/ ommunity input	Develop evaluation criteria	Determine potential multimodal solutions	Level 1 screening	Level 2 screening/ advance best solutions/ community input	Prioritize remaining solutions/ develop projects	Community input on prioritized projects/ Implementation plan	

SR 224 / Ute Blvd | concept

Wrap Up: The Right Project at the Right Time

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thank you

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Mobility Benefits

EAT WELL . PRAY OFTEN . LOVE ALWA